INDIAN TARIFF BOARD

Match Industry

Volume I

The Written and Oral evidence given by the Indian Match Manufacturers in—

Bengal
Bihar and Orissa
Burma
Central Provinces
Madras
Punjab
United Provinces

सत्यमेव जयते

CALCUTTA: GOVERNMENT OF INDIA
CENTRAL PUBLICATION BRANCH
1928

Government of India Publications are obtainable from the Government of India Central Publication Branch, 3, Government Place, West, Calcutta, and from the following Agents :-

EUROPE.

OFFICE OF THE HIGH COMMISSIONER FOR INDIA, 42, GROSVENOR GARDENS, LONDON, S. W. 1,
And at all Booksellers.

INDIA AND CEYLON : Provincial Book Depots.

MADRAS :—Superintendent, Government Press, Mount Road, Madras.
BOMBAY :—Superintendent, Government Book Depot, Town Hall, Bombay.
SIND :—Library attached to the Office of the Commissioner in Sind, Karachi.
BENGAL :—Bengal Secretariat Book Depot, Writers' Buildings, Room No. 1, Ground Floor, Calcutta.
UNITED PROVINCES OF AGRA AND OUDH.—Superintendent of Government Press, United Provinces of Agra and Oudh, Allahabad.
PUNJAB :—Superintendent, Government Printing, Punjab, Lahore.
BURMA :—Superintendent, Government Printing, Burma, Rangoon.
CENTRAL PROVINCES AND BERAR :—Superintendent, Government Printing, Central Provinces, Nagpur.
ASSAM :—Superintendent, Assam Secretariat Press, Shillong.
BIHAR AND ORISSA :—Superintendent, Government Printing, Bihar and Orissa, P. O. Gulzarbagh, Patna.
COORG :—Office of the Chief Commissioner of Coorg, Bangalore.
NORTH-WEST FRONTIER PROVINCE :—Manager, Government Printing and Stationery, Peshawar.

Thacker Spink & Co., Calcutta and Simla.
W. Newman & Co., Ltd., Calcutta.
R. Cambray & Co., Calcutta.
S. K. Lahiri & Co., Calcutta.
The Indian School Supply Depot, 309, Bow Bazar Street, Calcutta.
Butterworth & Co., (India), Ltd., Calcutta.
Rai M. C. Sarcar Bahadur & Sons, 90-2A, Harrison Road, Calcutta.
Standard Literature Company, Limited, Calcutta.
Association Press, Calcutta.
Chukervertty, Chatterjee & Co., Ltd., 13, College Square, Calcutta.
The Book Company, Calcutta.
James Murray & Co., 12, Government Place, Calcutta. (For Meteorological Publications only).
Ray Chaudhury & Co., 68-5, Ashutosh Mukerji Road, Calcutta.
The Oriental Publishing House, 34, Cornwalis Street, Calcutta.
Scientific Publishing Co., 9, Taltola Lane, Calcutta.
Chatterjee & Co., 204, Cornwallis Street, Calcutta.
B.C. Basak, Esq., Proprietor, Albert Library, Dacca.
Mitra Brothers, Rajshahi.
Higginbothams, Madras.
P. R. Rama Iyer & Co., Madras.
Rochouse and Sons, Madras.
G. A. Nateson & Co., Publishers, George Town, Madras.
Theosophical Publishing House, Adyar, Madras.
Bright & Co., Trivandrum.
The Booklover's Resort, Taikad, Trivandrum, South India.
E. M. Gopalakrishna Kone, Pudumandapam, Madura.
Vijapur & Co., Vizagapatam.
Thacker & Co., Ltd., Bombay.
D. B. Taraporevala, Sons & Co., Bombay.
Sunder Pandurang, Bombay.
Ram Chandra Govind & Sons, Kalbadevi Road, Bombay.
N. M. Tripathi & Co., Booksellers, Princess Street, Kalbadevi Road, Bombay.
New and Secondhand Bookshop, Kalbadevi Road, Bombay.
Mrs. Radhabia Atmaram Sagoon, Kalbadevi Road, Bombay.
A. H. Wheeler & Co., Allahabad, Calcutta and Bombay.
Proprietor, New Kitabkhana, Poona.
The Manager, Oriental Book Supplying Agency, 15, Shukrawar, Poona City.
Rama Krishna Bros., Opposite Vishrambag, Poona City.
S. P. Bookstall 21, Budhwar, Poona.
Mangaldas & Sons, Booksellers and Publishers, Bhaga Talao, Surat.
R. B. Umadikar & Co., The Bharat Book Depot, Dharwar.
The Standard Bookstall, Karachi, Quetta, Delhi, Murree and Rawalpindi.
The Karachi Book Depot, Elphinstone Street, Camp, Karachi.
The English Bookstall, Karachi.
The Standard Bookstall, Quetta.
U. P. Malhotra & Co., Quetta.
J. Ray & Sons, 43, K. & L., Edwardes Road, Rawalpindi and Murree.
The Standard Book Depot, Lahore, Nainital, Mussoorie, Dahousie, Ambala Cantonment and Delhi.
N. B. Mathur, Supdt., Nazir Kanun Hind Press, Allahabad.
The North India Christian Tract and Book Society, 18, Clive Road, Allahabad.
Ram Dayal Agarwala, 184, Katra, Allahabad.
The Indian Army Book Depot, Juhi, Cawnpore.
Manager, Newal Kishore Press, Lucknow.
The Upper India Publishing House, Ltd., Literature Palace, Ammuddaula Park, Lucknow.
Rai Sahib M. Gulab Singh & Sons, Mufid-i-Am Press, Lahore and Allahabad.
Rama Krishna & Sons, Booksellers, Anarkali, Lahore.
Puri Brothers, Booksellers and Publishers, Katcheri Road, Lahore.
The Tilak School Bookshop, Lahore.
The Standard Bookstall, Lahore.
The Proprietor, Punjab Sanskrit Book Saidmitha Street, Lahore.
The Insurance Publicity Co., Ltd., Lahore
The Punjab Religious Book Society, Laho
Manager of the Imperial Book Depot, 63, Chowk Street, Delhi.
Fono Book Agency, New Delhi.
Oxford Book and Stationery Company, D
Supdt., American Baptist Mission Press, Ra
The Modern Publishing House, Ltd., 30 Street, Rangoon.
Burma Book Club, Ltd., Rangoon.
Manager, The "Hitavada," Nagpur.
Bhisey Brothers, Booksellers and Statio baldi, Nagpur.
S. C. Talukdar, Proprietor, Students & C. Behar.
The Manager, Ceylon Observer, Colombo
The Manager, The Indian Book Shop, Ben
The Srivilliputtur Co-operative Trading Un Srivilliputtur (S. I. R.)
Raghunath Prasad & Sons, Patna City.
The Students' Emporium, Patna.
K. L. Mathur & Bros., Guzri, Patna City.
Dandekar Brothers, Indore City.
Pustakalaya Sahayak Sahakari, Ltd., Baro
The Hyderabad Book Depot, Chaderghat, bad (Deccan).

TABLE OF CONTENTS.

Government of India, Department of Commerce, Resolution No. 225-T (14), dated 2nd October, 1926 . . . . . .

Press Communiqué issued by the Tariff Board on the 29th November 1926 . . . . . .

Questionnaire issued by the Tariff Board on the 7th March, 1927 . . . . . .

BENGAL.

A.—WRITTEN.

Representations received from Match Manufacturers:—

1. Mr. M. N. Mehta's Factory
   - (*i*) Letter dated 6th December, 1926 17
   - (*ii*) Letter dated 20th December, 1927 17
2. Calcutta Match Factory—
   Letter dated 13th December, 1926 20
3. Bengal Safety Match Works and Medical House, Ltd.—
   Letter dated 25th December, 1926 21
4. The Jalpaiguri Industries, Limited—
   Letter dated 29th December, 1926 27
5. The New Sunderban Match Factory, Limited—
   Letter dated 30th December, 1926 30
6. Rajfulbaria Match Factory . . . . . .
7. The Bhowani Engineering and Trading Company . . . .
8. Bangia Diasalai Karjalaya . . . . . .
9. National Match Factory . . . . . .
10. Matangi Match Works . . . . . .
11. Bhowmik's Match Factory . . . . . .
12. Radheyshyam Match Works . . . . . .
13. Prasanna Match Factory . . . . . 37—39
14. The Lucifer Limited . . . . . .
15. Pioneer Match Factory . . . . . .
16. Sukul Match Works . . . . . .
17. Messrs. Bishanath Prosad Mahadev Prosad Match Factory .
18. The Bhagirathi Match Factory . . . . . .
19. Karimbhoy Match Manufacturing Company . . . . .
20. The Bengal Match Works—
    Letters of various dates . . . . . .

Replies to questionnaire received from—

1. Jalpaiguri Industries, Limited—
   Letter dated 5th April, 1927 39
2. The Bhagirathi Match Factory—
   - (*i*) Letter dated 19th April 1927, forwarding replies to the questionnaire 46
   - (*ii*) Letter dated 29th December, 1927, forwarding latest works costs 52

BENGAL—*contd.*

A.—WRITTEN—*contd.*

PAGE.

Replies to questionnaire received from—

3. The Prasanna Match Factory—
   Letter dated 19th April, 1927 53

4. Calcutta Match Factory—
   Letter dated 19th April, 1927 60

5. Mr. M. N. Mehta's Factory—
   (*i*) Letter dated 19th April, 1927, forwarding replies to the questionnaire 80
   (*ii*) Letter dated 17th January, 1928, submitting latest works costs 86

6. The Esavi India Match Manufacturing Company—
   (*i*) Letter dated 20th April, 1927, forwarding replies to the questionnaire 86
   (*ii*) Letter dated 6th December, 1927, submitting latest works costs 94
   (*iii*) Letter dated 6th February, 1928, submitting costs of box filling by machinery 95

7. The New Sunderban Match Factory, Limited—
   (*i*) Letter dated 21st April, 1927, forwarding replies to the questionnaire 95
   (*ii*) Letter dated 4th January, 1928, regarding latest works costs 103

8. The Karimbhoy Match Manufacturing Company—
   Letter without date, forwarding replies to the questionnaire 103

9. Messrs. Dharamsey and Company—
   (*i*) Letter dated 26th September, 1927, forwarding replies to the questionnaire 108
   (*ii*) Letter dated 7th February, 1928, submitting information regarding various points raised in the oral evidence 117
   (*iii*) Letter dated 13th February, 1928, regarding prices of matches 117

B.—ORAL.

1. Messrs. Dharamsey and Company—
   Evidence recorded on 17th October, 1927—
   Introductory—Wood supply—Price—Labour—Quality of Indian made Matches—Wood from the Andaman Islands—Price differences—The Company's request—Wood Supply—Other raw materials—Need for imported labour—Machinery—Distribution of Labourers—Wastage in Box making Machines—Market—Prices—Machinery prices—Railway freights—Customs duties—Labour—Spare parts—Economic size for a factory—Capital Account—Works Costs—Working Capital—Assistance from the existing Customs Duty—Factories financed by foreign capital—Connection with the Tobacco Company—Experience of Aspen wood—Consumption of electricity—Depreciation—Agents—Freight Advantage—Extension of output—Unfair Competition—Importance of the retail price 118—153

BENGAL—*concld.*

B.—ORAL—*contd.*

PAGE.

2. The Bhagirathi Match Factory—

Evidence recorded on 18th October, 1927—

Introductory—Wood Supply—Labour—Output. Wood supply—Local Woods compared with Aspen—Freight from the Andamans—Demand in Calcutta for match wood. Transport from the Andamans. Messrs. Martin and Company—Genwa. Sundarbans—Splint and Veneer Factory in the Forest—Use of match woods for other purposes—Railway and steamship freights—Costs of chemicals—Labour—Electricity. Coal—Competitors—Measures to be taken against foreign companies—Protection of the Industry—Cost of Machinery. Quality of the various makes—Capital Account—Handmade boxes. Cottage Industries—Working Capital—Head Office and selling expenses—Industry's claim to protection—Foreign capital. Anti-Trust Legislation—Unfair competition 154—190

3. The Esavi India Match Manufacturing Company—

Evidence recorded on the 6th February, 1928—

Introductory—Warning regarding speculations—Early History of the Company—Value of the prejudice—Wood supply—Wood wastage . . . . . 191—212

4. Mr. M. N. Mehta's Factory—

Evidence recorded on 7th February, 1928—

Introductory—Factory closed for one month—No evidence of unfair competition—Wood—Machinery—Costs—Allegations against the Swedish Match Company—Protection against internal competition . . . . . 213—232

5. Bangiya Diasalai Karjalaya—

Evidence recorded on 9th February, 1928—

Introductory—Costs—Cottage industry *vs.* factories—Probable disappearance of cottage factories . . . . 233—244

BIHAR AND ORISSA.

1. The Puri Match Industries Company, Limited—

Representation dated 29th December, 1926 247

2. Government Demonstration Match Factory—

(i) Letter dated 12th May, 1927, forwarding replies to the questionnaire 249

(*ii*) Letter dated 15th December, 1927, submitting latest works costs 256

BURMA.

1. Messrs. Adamjee Hajee Dawood and Company, Limited—

A.—WRITTEN.

(1) Representation dated 30th December, 1926 261

(2) Replies to the Questionnaire 262

(3) Letter dated 10th March, 1927, forwarding correspondence regarding timber for match manufacture 279

BURMA—*contd.*

PAGE.

A.—WRITTEN—*contd.*

(4) Supplementary Statements:—
(*i*) Prospectus of the Swedish Match Company . . . 290
(*ii*) Directors' Report of the Swedish Match Company for the year 1924 298
(*iii*) Letter from Mr. Krister Littorin to Mr. Adamjee Hajee Dawood, dated 16th April, 1925 . . . 301
(*iv*) Letter from Messrs. Y. Nakamura and Company, Kobe, to Messrs. Adamjee Hajee Dawood and Company, dated 1st March, 1927 302
(*v*) Statement regarding cost of Aspen wood from Europe and Japan 303
(*vi*) Statement showing c.i.f. prices of matches imported from Japan also average selling prices in Rangoon . 305
(*vii*) Statement showing proportion of wastage . . . 305
(*viii*) Aspen Wood 306
(*ix*) Statement showing freight, etc., incurred for matches exported to certain ports 306
(*x*) Statement showing prices of chemicals and other raw materials 308
(*xi*) Statement regarding wood from Siberia . . . 309
(*xii*) Statement showing species of wood used by Messrs. Adamjee Hajee Dawood and Company . . . 310
(*xiii*) Information supplied regarding the Swedish Match Company and the Assam Match Company . . 311
(5) Letter dated 9th December, 1927, submitting latest works costs 357

B.—ORAL.

(1) Evidence recorded on the 21st March, 1927—
Preliminary—The organization and beginning of the Company—The unit of manufacture—Output—Situation of the factory—Quality of Indian made Matches—Characteristics of suitable wood—Size of log required—Extraction, transport and storage of logs—Output per ton of wood—Local Timber Resources—Varieties of wood . . . . . 358—385
(2) Evidence recorded on the 22nd March, 1927—
Varieties of wood—Sources of timber supply—The Company's forest concession—Plantation of matchwood species—Extraction and transport costs—Other raw materials—Labour—Wastage of material—Wages—Welfare—Power—Fuel . . . . 385—414
(3) Evidence recorded on the 24th March, 1927—
Market—Competition . . . . . 414—425
(4) Evidence recorded on the 25th March, 1927—
Plant—Economical production—Capital of the Company—Return on capital—Works costs—Materials—Labour—Power and fuel—Current repairs—Miscellaneous charges—Total costs—Selling price—Conditions of extracting Timber—Sea Freight—Import duty on chemicals, etc.—Excise on factories run by foreign capital—Suits filed against the Company re labels—Price cutting—Anti-Trust Legislation—The Swedish Match Company in Japan—In Germany—In Poland—In France—In Peru—In Greece—In Chili—In America—System of Excise . . . 425—454

BURMA—*concld.*

PAGE.

2. The Rangoon Match Works:—

A.—WRITTEN.

Letter dated 21st March, 1927, forwarding replies to the questionnaire 465

B.—ORAL.

Evidence recorded on the 23rd March, 1927—

Introductory—Manager's qualifications—Match making in Japan—Hand driven and power driven machinery—Finance of the Company—Quality of Indian made matches—Price of imported and Indian made matches—Quality of Japanese matches—Selling arrangements—Raw materials. Timber—Chemicals, etc.—Labour—Market—Competition—Working capital—Costs . 460—485

3. The Muslim Match Factory:—

A.—WRITTEN.

Replies to the questionnaire 485

B.—ORAL.

Evidence recorded on the 23rd March, 1927—

Introductory—Output—Timber supply—Varieties of Wood—Process of manufacture—Costs—Match wood supplies—Works costs . . . . . 490—500

CENTRAL PROVINCES.

1. The Amrit Match Factory—

Representation dated 29th December, 1926 503

2. The Lakshmi Match Works—

Representation dated 30th December 1926 505

MADRAS.

Representations received from Match Manufacturers:—

1. The Malabar Match Manufacturing Company, Limited—

(*i*) Letter dated 16th December, 1926 515

(*ii*) Letter dated 18th December, 1926 515

2. Malabar Match Works—

Letter dated 23rd December, 1926 517

3. The New Madras Match Factory—

Letter dated 23rd December, 1926 518

4. The South Indian Match Factory, Limited—

Letter dated 24th December, 1926 518

5. Swan Match Works—

Letter dated 29th December, 1926 522

6. Madras Swadesh Match Factory—

Letter without date 523

7. The Mysore Match Manufacturing Company, Limited—

Letter without date 524

Replies to questionnaire received from:—

1. The Mysore Match Manufacturing Company—

Letter dated 22nd March, 1927 525

2. South Indian Match Factory Limited—

(*i*) Letter dated 31st March, 1927, forwarding replies to the questionnaire 525

MADRAS—*contd.*

PAGE.

Replies to questionnaire received from :—
(*ii*) Letter dated 13th December, 1927, submitting latest works costs 540
3. The Standard Match Factory—
Letter dated 30th March, 1927 540
4. The Malabar Match Manufacturing Company, Limited—
Letter dated 5th April, 1927 542
5. The Madras Swadesh Match Works—
(*i*) Replies to the questionnaire 546
(*ii*) Letter dated 2nd December, 1927, submitting latest works costs 550

PUNJAB.

The Mahalakshmi Match Factory—

A.—WRITTEN.

(*i*) Representation dated 30th December, 1926 553
(*ii*) Letter dated 4th April, 1927, forwarding replies to the questionnaire 560
(*iii*) Letter dated 14th December, 1927, submitting latest works costs 572
(*iv*) Letter dated 3rd February, 1928, submitting statements of labour, c.i.f. cost of match, machinery, etc. 572
(*v*) Letter dated 14th February, 1928, submitting a note by Sir Daya Kishan Kaul on the subject of duty on matches . 574

B.—ORAL.

Evidence recorded on the 22nd January, 1928—
Introductory—Plant—The Simplex—Labour—Wood—Wood wastage—Costs—Retail prices—Excise duty—Retail Sales—Duty on logs—Development of supply of Indian wood—Cottage Industry—Organization of the supply of Indian wood—The Swedish Match Company 580–569

UNITED PROVINCES.

1. Bhargava Dipshalaka Yantram—
Letter dated 4th April, 1927, intimating that the Company is in the experimental stage 633
2. The Bareilly Match Company :—
Oral Evidence recorded on the 20th January, 1928—
Introductory—Premises—Date of commencing operations. Purchase of machinery, etc.—Details of Equipment—Capacity—Labour employed in the different processes—Suitability of aspen and Indian wood—Quality of Indian labour—Labour employed in lavelling machines, etc.—The Simplex Machine—Size of match made—Varieties of timber used—Cost of timber, supply, consumption, etc.—Costs per gross—Handling of chemicals . . . . . 634—651

No. 235-T. (14).

GOVERNMENT OF INDIA.

DEPARTMENT OF COMMERCE.

Simla, the 2nd October 1926.

RESOLUTION.

TARIFFS.

The present rate of duty on matches imported from abroad is Re. 1-8-0 per gross, which represents a duty of more than 100 per cent. *ad valorem*. The duty was raised to the above figure purely as a revenue measure, and the Government of India have consistently rejected requests from manufacturers in India that the duty should be declared a protective duty. Nevertheless, a high revenue duty naturally has a protective effect, and since 1922, when the present duty was imposed, numerous match factories have been established in India, some of them using indigenous woods, and others wood imported in the log from abroad. Concurrently, there has been a progressive decline in the customs revenue derived from matches. This revenue amounted to Rs. 154 lakhs in 1922-23 and Rs. 138 lakhs in 1923-24, but in 1925-26 it amounted (inclusive of the revenue from splints and veneers) only to Rs. 118 lakhs. As the Indian factories overcome technical difficulties and attain their full production, the decrease in customs revenue is likely to become more serious.

2. In these circumstances, the Government of India consider that the whole position requires investigation, and they have decided to entrust this task to the Tariff Board. The first point for enquiry is whether the three conditions laid down in paragraph 97 of the Report of the Indian Fiscal Commission are satisfied in the case of the match industry in India, and whether the industry should be protected. If the answer to this question is in the affirmative, the Tariff Board will report at what rate the import duty should be fixed in order to give the industry the protection it requires and whether alternative measures of protection could suitably be adopted. If the answer is in the negative, the Government of India theoretically will be free to lower the import duty on matches in the interests both of the consumer and their own revenue from this source. But the Tariff Board will report to what extent vested interests have been created in India as the result of the present rate of duty, how far those vested interests require consideration and what prospect there is of the match industry in India establishing itself, if the present rate of duty is maintained.

If the Tariff Board decides that consideration must be paid to the industry brought into existence by the present rate of duty and that the duty should be maintained at the present figure, or approximately at the present figure, it will further report whether the loss of customs revenue can be made up in whole or in part by any other appropriate form of taxation of the industry. In this connection, the attention of the Board is drawn to the remarks of the Honourable Commerce Member on the 24th March, 1924, in the Council of State. Generally the Tariff Board will investigate the whole question and make such recommendations as seem germane to the subject.

ORDER.—Ordered that a copy of the above Resolution be communicated to all local Governments and Administrations, all Departments of the Government of India, the Director General of Commercial Intelligence and Statistics, the Indian Trade Commissioner in London and the Secretary, Tariff Board.

ORDERED also that it be published in the *Gazette of India*.

सत्यमेव जयते

Press Communiqué issued by the Tariff Board on the 29th November 1926.

In the Resolution of the Government of India in the Commerce Department, No. 235-T. (14), dated the 2nd October 1926, the Indian Tariff Board was directed to investigate the question of granting protection to the Match Industry in India.

2. The Board has been instructed to examine the whole position of the industry but its attention has been specially drawn to the following points. Firstly, whether the three conditions laid down in paragraph 97 of the Report of the Indian Fiscal Commission are satisfied in the case of the Match Industry in India, and whether the industry should be protected. Secondly, if the industry satisfies these conditions and is to be protected, the amount of protection required and the methods by which such protection should be given. Thirdly, if the Board finds that the industry does not satisfy the conditions laid down in the Fiscal Commission's Report, whether it is necessary, in view of any vested interests which may have been created as a result of the present revenue duty, to maintain the duty at the present figure or at approximately the present figure; and if so, whether the loss of customs revenue, which is likely to result from the expansion of the industry in India, can be made up in whole or in part by any other appropriate form of taxation of the industry.

3. Any persons or firms who desire to claim protection for the industry in India or who consider that the present rate of duty *qua* revenue duty should be maintained, are requested to submit to the Tariff Board a full statement of the grounds on which they do so. Persons or firms who claim protection should state *inter alia* the grounds on which the industry can be considered to fulfil the conditions laid down by the Fiscal Commission, and whether any protection which may be found necessary should be given by means of protective duties or in any other form. In the case of those who desire that the present rate of duty should be maintained in view of any vested interests which may have been created, the nature and extent of such interests and their grounds for thinking that the match industry has a fair prospect of establishing itself in India, should be fully set forth.

4. All representations (with six spare copies) must be addressed to the Secretary and reach the office of the Board at No. 1, Council House Street, Calcutta, not later than the 31st December, 1926. After their receipt, the Board will, if necessary, issue questionnaires. The representations, the questionnaires and the replies thereto will then be printed and published, and the opinions, in writing, of those who wish to support or oppose the claims made will be invited. The dates for the oral examination of witnesses who wish to appear before the Board for that purpose will be subsequently fixed.

Questionnaire issued by the Tariff Board on the 7th March 1927.

Introductory.

1. When was the firm which you represent established? Is it a public or private registered Company, or is it an unregistered firm?

2. To what extent is the capital invested in your firm held by Indians? What is the total number of Directors and how many are Indians? How many Europeans are employed and in what capacities?

3. Does your firm undertake the manufacture of splints and veneers only or of matches and match boxes from splints and veneers made elsewhere, or do you undertake the whole process of manufacture?

4. At what date did the factory under the control of your firm commence to manufacture?

5. What is the full capacity of your factory as at present equipped for the manufacture of matches and boxes?

6. Please give the dimensions of the match boxes manufactured by you and the average number of matches in each?

7. What has been the actual output of your factory for each of the last eight years?

8. Where is your factory situated? Do you consider it is advantageously situated in respect of—

(*a*) vicinity to the areas from which your principal raw materials are drawn;

(*b*) vicinity of fuel supply or other sources of power;

(*c*) vicinity to an important market;

(*d*) other considerations such as the existence of an abundant labour supply?

What do you consider the most important factor in selecting the site of a match factory in India?

9. (*a*) It has been stated that Indian manufactured matches are inferior to imported matches? Do you agree with this view? If so, please state in what respects Indian matches fall short of the standard of imported matches?

(*b*) Is there any prejudice apart from the question of quality against Indian matches either generally or in particular markets?

(*c*) What difference in price in your opinion represents a fair measurement of the difference in quality or would be sufficient to overcome the prejudice against Indian matches?

Raw Materials.

Wood.

10. The principal raw material for the manufacture of matches and boxes is wood. Have you found it necessary to import wood for the manufacture of—

(*a*) splints;

(*b*) veneers;

(*c*) packing cases?

If so, from what countries do you import and at what prices?
If possible give—

(1) f.o.b. price per customary unit (in sterling);

(2) port of importation;

(3) freight, insurance, etc.;

(4) landing charges;

(5) transport charges to factory;

(6) duty.

11. If Indian wood is used, please specify the kinds of wood used in the manufacture of—

(*a*) splints;

(*b*) veneers;

(*c*) packing cases.

NOTE.—Both the botanical and the local names should be given.

12. Have you found Indian wood as satisfactory as imported wood for the manufacture of—

(*a*) splints;

(*b*) veneers;

(*c*) packing cases?

If not, in what respects do you consider it inferior to imported wood?

13. What are your annual requirements of wood—

(*a*) according to your present rate of output which should be stated?

(*b*) according to the rate of output equivalent to the full capacity of the plant?

14. What quantity of wood is required for the manufacture of one hundred gross of boxes of finished matches?

15. What is the standard size of the packing case used by you? What quantity of wood is required for one packing case and how many gross boxes of matches can be packed in each case?

16. From what area or areas does the factory draw its main supplies of wood and at what distance from the factory are they situated? If possible, a map should be given showing the site of the factory and the areas from which supplies are drawn.

17. By what agency are the required trees felled and by what means are they transported from the forest to the factory?

18. What royalty is paid to Government or private persons for the wood extracted?

19. Please give the cost per 50 cubic feet delivered at the factory for the last four years under the following heads:—

(1) Royalty.

(2) Labour employed on extraction.

(3) Freight to factory.

(4) Miscellaneous charges.

20. What are the terms of your concession (if any) for the extraction of wood? Do you consider these terms favourable? If not, in what respect do you consider them unfavourable? Please supply a copy of your license or concession.

21. Have you found the supply of wood constant in respect of quality or have you noticed any deterioration? In the latter case, please explain the causes of deterioration.

22. Has the supply of wood been found constant in respect of quantity or has it been found necessary to draw supplies from greater and greater distances as time goes on? If so, do you consider the fact due to—

(*a*) an increase in the output of the factory;

(*b*) the establishment of other match factories which compete for the supplies of the same raw material;

(*c*) a gradual diminution of the supplies from the areas from which they are taken;

(*d*) any other cause?

23. If it has been found necessary to draw supplies from new areas, please state the total quantity taken from each area for the last four years. If possible, the cost per 50 cubic feet delivered at the factory of the wood supplied from each area should be given for each year.

24. Do you consider that your factory is assured of a sufficient supply of suitable wood for a reasonably long period? What measures have been taken to secure this object? In particular, have steps been taken to plant trees of a kind suitable for the match-making industry within a reasonable distance of your factory?

25. Do you receive any special concession in the matter of freight by sea, river or rail for wood required in your factory? Do you consider that you are at any disadvantage in this respect?

Other raw materials.

26. What raw materials other than wood are required in your factory and what is the total requirement of each in one year?

27. What quantity of each of these materials is required per 100 gross of boxes of matches?

28. Which of these materials are—

A.—Imported from abroad.

B.—Manufactured and purchased in India.

C.—Manufactured by you from other materials?

In case A, please give—

(*a*) country of origin,

(*b*) f.o.b. price (in sterling),

(*c*) port of importation,

(*d*) freight, insurance, etc.,

(*e*) landing charges,

(*f*) transport charges to the factory, and

(*g*) customs duty.

In case B, please give—

(*a*) market price, and

(*b*) transport and other charges,

and state where and by whom the materials are manufactured.

In case C, give particulars asked for under A or B for the materials purchased and the cost of manufacture by you according to the customary unit of production.

29. Which of the materials mentioned in the answer to question No. 26, if not already manufactured in India, are—

(*a*) likely to be manufactured,

(*b*) not likely to be manufactured.

Please give reasons for your reply.

LABOUR.

30. Is there any difficulty in securing sufficient labour for the extraction?

31. To what extent is the employment of skilled labour imported from abroad, necessary?

32. What number of imported labourers do you employ and what is their pay?

33. What progress has been made since the factory was established in the substitution of Indian for imported labour? What facilities are given to Indian workmen to acquire training in skilled work?

34. What is the total number of Indian workmen employed; how many of them are women and children; and what are the average rates of wages of the different classes?

35. Is the Indian labour drawn from the vicinity of the factory or from other parts of India?

36. Has it been found that the Indian labourer improves with training? Have you any record of output in your various departments which would indicate such improvements?

37. What arrangements have been made for housing your labour and for promoting its welfare in other directions?

Power.

38. Is the power used in the factory derived from electricity or steam, or from some other source?

39. If electric power is used, from what source is it obtained and what is the cost per unit? How does the cost compare with the rates obtained elsewhere in India and in other countries?

40. If steam power is used, is coal the fuel employed? If not, what is the fuel? Is the latter available in sufficient quantities?

41. What is the total quantity of fuel required per unit of output whether for power production or for the other purposes?

If you purchase electric current from an outside supply, please give also the number of units required per unit of output in addition to the fuel used.

42. From what distance is the fuel brought, and what is the free-on-truck price in the case of coal, and in the case of other fuel at the source of supply? And what is the cost of transport per ton in each case? If fuel is purchased locally, what is the price per ton delivered at the factory?

43. If your fuel is wood, are you able to meet the whole of your requirements from waste wood in your factory? If not, have you obtained any concession from the Government or other person? What is the royalty payable, and what are the conditions of the concessions? (Supply a copy of your concession.)

Market.

44. If possible give an estimate of the total Indian demand for matches.

45. Is the demand likely to increase substantially in the near future? If your answer is in the affirmative, please state your reasons.

46. In what parts of India are your principal markets situated and what are the distances which separate them from the factory?

47. Are there any markets in India in which owing to their distance from the ports, you are more easily able to compete against the foreign manufacture? If so, please state which these markets are and the approximate demand in each?

48. (*a*) To what extent is the market served by imported matches distinct from that served by matches manufactured in India?

(*b*) Have you any reason to suppose that there is any illicit importation of matches into India?

COMPETITION.

49. Which are the foreign countries from which competition in the Indian markets is keenest?

50. With the existing duty do imported matches compete with Indian matches manufactured from indigenous woods or only with Indian matches manufactured from imported woods?

51. Please state—

(1) the price at which imported matches entered the country and had been sold during each of the years 1918-22 and 1922-26;

(2) the prices realized in the same years for your matches made from Indian wood;

(3) the prices realized for Indian matches manufactured from imported wood;

If possible the *f.o.b.* price in sterling of imported matches should be given and the following items shown separately:—

(1) freight;

(2) insurance and trade charges;

(3) customs duty;

(4) landing charges.

If this is not possible, then state the *c.i.f.* price *plus* customs duty and landing charges.

52. From what sources is information obtainable as to the prices at which imported matches enter the country?

53. Have you any reason to suppose that prices at which foreign producers sell for export to India (*a*) are unremunerative or (*b*) leave only a small margin of profit to the producer, or (*c*) are exported at a price below the lowest price current in the home market? If so, please state fully your reasons and the evidence on which you rely.

54. Do you consider that as compared with the foreign manufacturer the Indian manufacturer is at a disadvantage in all or any of the following points:—

(*a*) cost of plant and machinery;

(*b*) cost of expert labour;

(*c*) cost and efficiency of ordinary labour;

(*d*) the collection and transport of raw materials;

(*e*) cost of stores;

(*f*) freights on finished goods;

(*g*) maintenance of stocks of spare parts or of wood;

(*h*) customs duty on imported materials;

(*i*) the raising of capital?

55. Which of the disadvantages mentioned in your answer to question No. 54 do you regard as permanent and which as temporary? For what period in your opinion are the temporary disadvantages likely to operate?

EQUIPMENT.

56. Do you consider that your mill is sufficiently large as an economic unit of production to ensure economy? What in your opinion is the smallest

unit of production which can be operated economically under present day conditions.

57. What percentage of your total capital outlay has been incurred on plant and machinery?

58. (*a*) Give a brief description of your plant and machinery, stating the number and makes of the principal machines operated, and the dates on which they were first brought into use.

(*b*) If your machinery has been purchased under any special arrangements with foreign manufacturers, please state in detail what these arrangements are?

59. (*a*) Do you consider your machinery and other equipment sufficiently up-to-date and efficient to enable you to compete successfully against the foreign manufacturer?

(*b*) What are the chief processes in the manufacture of matches and match boxes which are carried out by manual labour in your factory? Please give, if possible, an estimate of the relative cost of carrying out these processes by hand and by machinery under present conditions?

60. Do you contemplate either:—

(*a*) any important replacement of the existing plant in your mill, and

(*b*) any extension of the plant by the addition of new machinery?

If so, please give particulars?

61. What parts of the machinery, if any, are made in India?

CAPITAL ACCOUNT.

62. What is the block value of your property as stood in your books at the end of the last complete year for which figures are available, under the following heads:—

(*a*) Leases and concessions;

(*b*) Lands;

(*c*) Buildings;

(*d*) Plant and machinery;

(*e*) Other miscellaneous assets?

63. Do the figures given in answer to question No. 62 represent the actual cost of the various assets, or their value after depreciation has been written off? In the latter case, please state the total amount written off for depreciation since manufacture commenced, and in the former case the total of the depreciation fund (if any) which has been accumulated.

64. Apart from any question of an increase in the replacement cost of plant and machinery due to a general rise in the price level, are the sums actually set aside for depreciation since manufacture commenced equal to, greater than, or less than, the sums which ought to have been set aside according to the rates of depreciation which you consider suitable?

65. What do you estimate would be the present-day cost under the heads (*a*) building and (*b*) plant and machinery, of erecting a factory having the same output as your present factory? How does the figure compare with the block value of your present factory under the same heads, and would the operating cost of a new factory established now be greater or smaller than yours?

66. Give brief particulars of the sums spent on the purchase of plant and machinery in each of the years 1917 to 1926, and the rate of exchange at which funds were remitted.

67. What is the total (*a*) authorized, (*b*) subscribed, (*c*) paid-up, capital of the Company? How is it divided between Preference, Ordinary and Deferred shares?

68. At what rate of interest is the dividend payable on the Preference shares? Are these shares entitled to cumulative dividends? If so, state the dates on which they were first entitled to rank for dividends and whether any dividends are in arrears?

69. Under what conditions do the Deferred shares participate in the profits of the Company?

70. Please prepare a statement showing for each year since the establishment of the Company:—

(*a*) the amount of the paid-up share capital (Preference, Ordinary and Deferred) ranking for dividend;

(*b*) the actual amounts distributed as dividends on each class of capital, and

(*c*) the percentage on the paid-up share capital of each class which the dividend represented.

71. What is the average rate of dividend on the Ordinary shares for the full period?

72. What is the amount of the debenture loans (if any) raised by the Company? At what dates were they issued, and what is the rate of interest payable? If any period has been fixed for the redemption of the rebenture loan, it should be stated. Similarly, if a debenture sinking fund has been established, the annual rate of contribution should be given.

73. What is the amount of the Reserve Fund (if any) created by the Company? Has this amount been accumulated from surplus profits, or from other sources, *e.g.*, by the issue of shares at a premium?

74. What additional capital (if any) would it be necessary to raise in order to carry out any scheme of replacement or extension of plant which the Company contemplate?

Works Cost.

75. Please fill up the two forms annexed to the questionnaire regarding works costs?

Note.—The Board are anxious to have as full information as possible regarding the cost of production, but they recognise the difficulty which manufacturers may feel in disclosing to the public the details of their practice and their works costs. Great stress was laid on the importance of publicity in paragraph 303 of the Fiscal Commission's Report, and the Board also have explained the views they hold in paragraph 41 of their Third Report on the Grant of Protection to the Steel Industry. It rests with the manufacturers themselves to decide what information can be given publicly, and nothing will be published which the witness desires to be treated as confidential. At the same time, the Board cannot base their recommendations merely on confidential information. The publication of the details of the works costs of each firm may not be essential because the Board may be able by comparison of the various figures submitted to arrive at a standard or average figure for each item. But it is very desirable that the total of the works costs should be disclosed in all cases.

76. Was the works cost increased in any of the years for which figures have been given owing to the fact that the factory was working at less than its full capacity? If so, which were the items principally affected? To what extent would they probably have been reduced if a full output had been obtained?

77. Have you adopted a system of cost accounting? If so, will you place before the Board, for examination and return, your cost sheets for the last complete year for which they have been prepared?

78. Are you in a position to furnish the Board with information as to the works cost of matches in any competing country for any year since the war?

Overhead Charges.

(i) *Depreciation.*

79. What are the rates of depreciation allowed by the Income-tax authorities? Do you consider that, in calculating the cost of production of matches, these rates of depreciation are suitable? If not, what rates do you suggest, and why?

80. What is the sum required annually for depreciation at Income-tax rates on the total block account—

(*a*) if the assets are valued at cost,

(*b*) if the assets are taken at their value after deducting all depreciation written off up-to-date?

(ii) *Working Capital.*

81. What is the working capital which the Company requires—

(i) according to its present output;

(ii) according to the output equivalent to its full capacity?

82. Is the Company able to provide all the working capital it requires from share and debenture capital, or is it necessary to borrow additional capital for this purpose?

83. If additional working capital has to be borrowed, what is the amount borrowed and the rate of interest payable?

84. Compare the working capital with the cost of one month's output (works cost only, excluding overhead charges).

85. What is the average value of the stocks of finished goods held by the Company? What period normally elapses between production and payment?

86. Do the Company find it necessary to hold large stocks of coal or raw materials? If so, the average value of the stocks held should be stated.

(iii) *Agents' Commission and Head Office Expenses.*

87. Has the Company a head office other than the office of the local management? Is it under the control of a firm of Managing Agents?

88. If the answer to (*a*) is in the affirmative, state—

(i) the annual amount of the head office expenses,

(ii) the Agents' Commission,

89. How is the amount of the Agent's commission determined?

90. What is the amount of—

(i) Head office expenses,

(ii) Agent's commission,

per gross of finished matches according to—

(i) the present output;

(ii) the output equivalent to the full capacity of the plant?

Manufacturer's Profits.

91. What rate of dividend do you consider a fair return on ordinary and deferred shares?

92. If your Company contemplated the establishment of a new match factory, or the purchase of new machinery for the existing factory—whether by way of extension or replacement—what rates of interest do you consider it would be necessary to offer on (*a*) Preference shares and (*b*) Debentures in order to attract capital, assuming that the profits made in the industry showed a substantial margin after providing the interest on the existing shares or debentures?

93. If it were decided to issue ordinary shares, what do you consider would be minimum probable return which would be likely to attract investors?

Claim for Protection.

94. In paragraph 97 of their Report, the Fiscal Commission laid down three conditions which in ordinary cases ought to be satisfied by industries claiming protection. Do you consider that these conditions are satisfied in the case of the Match Industry? And in particular:—

A.—Do you claim that the industry possesses natural advantages, such as an abundant supply of raw materials, cheap power, a sufficient supply of labour or a large home market?

B.—Do you claim that, without the help of protection, the industry is not likely to develop at all or is not likely to develop so rapidly as is desirable in the interests of the country?

C.—Do you claim that the industry will eventually be able to face world competition without protection?

These conditions have been approved by the Government of India and by the Legislative Assembly, and it is therefore of great importance to ascertain whether they are satisfied. If you consider that the Match Industry fulfills these conditions the reasons for your opinion should be fully explained.

95. Do you claim that the Match Industry satisfied either or both of the conditions mentioned in paragraph 98 of the Fiscal Commission's Report, *viz.*:—

(*a*) That the industry is one in which the advantages of large scale production can be achieved, and that increasing output would mean increasing economy of production.

(*b*) That it is probable that in course of time the whole needs of the country could be supplied by the home production.

96. Do you consider that there are any features of the industry which make it peculiarly suitable to Indian economic conditions?

97. What is the amount of protection the industry receives at present owing to—

(*a*) the existing Customs duties,

(*b*) transport charges between the country of production and the port of entry, *i.e.*, freight, insurance, trade charges and landing charges?

98. What is the amount of the protection which you consider necessary?

Note.—The reasons for proposing the particular rate recommended should be explained.

99. Do you recommend any form of assistance other than a protective duty? If so, your reasons should be stated.

FORM I.—*Statement showing total expenditure on the production of Matches during the last four years.*

(See question 75.)

——	1922-23.	1923-24.	1924-25.	1925-26.
1. Cost of wood for splints and veneers.				
2. Cost of paper .				
3. Cost of chemicals . .				
4. Cost of other raw materials				
5. Factory labour . . .				
6. Power and fuel . .				
7. Ordinary current repairs and maintenance of buildings, plant and machinery.				
8. General services, supervision and local office charges.				
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.				
10. Cost of packing cases .				
Total .				
Total production of Matches for the year.				

सत्यमेव जयते

FORM II.—*Statement showing works cost per gross of Matches.*

(See question 75.)

——	1922-23.	1923-24.	1924-25.	1925-26.
1. Cost of wood for splints and veneers.				
2. Cost of paper for labels and wrapper.				
3. Cost of chemicals . .				
4. Cost of other raw materials				
5. Factory labour . . .				
6. Power and fuel . .				
7. Ordinary current repairs and maintenance of buildings, plant and machinery.				
8. General services, supervision and local office charges.				
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.				
10. Cost of packing cases .				
Total .				
Credit for materials recovered (if any).				
Net Total .				
Total production of Matches for the year.				

Bengal.

Mr. M. N. Mehta's Factory, Calcutta.

(1) *Representation, dated 6th December 1926.*

In response to the Press Communiqué issued by you on 29th ultimo, we beg to give you below our reasons as to why the Match Industry in India should be protected.

The Match Industry in India being just in its infancy requires whole-hearted support of the Indian Government by continuing the present protective duty on imported matches for a term of 15 years. In fact for the best development of this new industry, we would suggest the levying of more duty, say, Rs. 3 per gross instead of Re. 1-8. This will surely enable the Match Industry here to stand on its own and to face the keen competition of foreign importation.

We understand that the Government of India are under consideration as to continuing the protective duty or abolishing it. To our opinion if the latter step be taken, then it would mean sheer loss to all parties concerned, who all round India, in the impression of good faith for the development of this industry, have invested considerable sums of money and have wasted their energy. It would mean total ruin staring at them and thus make the demise of the Match Industry here as certain. It will thus of course give great stimulus to the foreign goods from Japan and Sweden at the expense of our industry here. We think our Government to be too benevolent in practice than to adopt ruining methods.

Further, we may mention that the levying of excise duty on the manufacture here at say one anna per gross would be quite adequate to meet the depreciation of the customs duty caused by decrease in imports from foreign countries, chiefly Japan and Sweden.

Our daily output is 1,750 gross which would bring a daily revenue of, say, Rs. 109-6-0 from us, added to this the income derived from other factories will amount to a substantial sum which would be ten times more than that of ours in Calcutta. This would be the best means of placing this trade on a protective duty principle and by so doing we assure you that within the time that is passing, it is feasible and certain that this industry will be able to stand on its own.

---

(2) *Letter, dated the 20th December, 1927.*

With reference to the Resolution of the Government of India in the Commerce Department No. 235-T(14), dated the 2nd October, 1926, and the Press Communiqué of the 29th of November, 1926, asking persons or firms who desire to claim protection for the match industry in India, we beg to submit the following facts and circumstances for the consideration of the Tariff Board.

THE FIRST POINT.

The first point that should be dealt with is "whether the three conditions laid down in paragraph 97 of the Report of the Indian Fiscal Commission are satisfied in the case of the match industry in India, and whether the industry should be protected."

First condition.

The first condition is that "the industry must be one possessing natural advantages such as an abundant supply of raw materials, cheap power, a sufficient supply of labour or a large home market ".

(*a*) *Raw materials.*—The principal ingredient for the purpose of manufacturing matches is certainly wood, and the natural home of wood—wood of innumerable species—is certainly India with Burma. There is such an abundance of this particular commodity and so inexhaustible are the forest resources of our country that it is inconceivable that the Indian match industry will ever suffer from the dearth of suitable wood.

(*b*) *Cheap power.*—In order that the power may be cheap it is necessary that the fuel used for power generating purposes should be inexpensive. The low price of Indian coal and wood fuel contributes to the cheapness of the power, be it steam or electric. In cities where electric current is available, the match plants are worked with the help of electricity; in other places, coal and wood fuel are used for engines. There are instances where the waste pieces of wood left over after the production of splints and veneers are used as fuel for the engines.

The standard of living being low and the question of unemployment being acute, labour is both cheap and sufficient. In India the supply of labour always exceeds the demand, and the Match Industry is not likely to suffer from any shortage of labour.

(*c*) *Large home market.*—It is needless to expatiate on the question of Home Market. It is because the consumption of matches is bound to be large in a thickly populated country like India that the industry ought to receive every encouragement from the Government. It detracts vitally from the economic independence of a people if it has to depend for an article which none can do without, on foreign manufacturers.

The second condition.

The second condition is " that the industry must be one which without the help of protection either is not likely to develop at all or is not likely to develop so rapidly as is desired in the interest of the country ". It is only when an industry is in its infancy when it is incapable of competing with similar industries established in other countries that it should be placed under the shelter of protection. The duty of Re. 1-8 imposed by the Government in 1922 served as a protective measure admirably and the indigenous match industry developed so rapidly that during these five or six years the Calcutta factories alone have produced 6,10,000 gross of filled boxes per month as compared with 7,00,000 gross of boxes of matches manufactured in 1910 by all the firms throughout India (*vide* Indian Forest Memoirs, Vol. II, part I, Chap. 1). The greatest menace to the Indian match industry is the foreign competition launched by the " Swedish American match combine " which threatens to establish a world monopoly by adopting methods both fair and unfair, by buying over the small match factories, by under-selling their goods, by scaring away the dealers in Indian matches, by starting their factories in India where hardly an Indian or Britisher is employed and by inaugurating a system of espionage hitherto unknown in the commercial world.

In this connection it will not be out of place to refer to an incident published by the " Statesman " of the 20th of April 1927 : " Mr. S. Schele, General Manager in India, Burma and Ceylon of the Swedish Match Company, refused to disclose even in confidence costs when under examination by the Tariff Board." It is obvious that the Swedish Match Company with their factories in India, backed as they are with an enormous capital will ultimately crush the match industry of the countries. This powerful syndicate known as the Svenska Trust in Europe is mainly controlled by Swedes and Americans whose only aim is to monopolise the match industry of the world and to sell their own matches at a heavy profit after annihilating all the competitors in the field. It has succeeded in ruining the Japanese match trade in India by a system of destructive dumping and in starving a large number of Japanese factories with a view to eliminate Japanese competition the Trust has taken over some of the match factories in Japan. The Trust has also started purchasing the factories in India, has deliberately adopted a policy of selling their matches in the country at low prices—prices so low as to involve positive loss—so that they may compel the Indian manufacturers to incur such a heavy loss that the latter will be forced either to close down their factories or to sell them to the Trust.

With remarkable impudence it has asked almost all the Indian match manufacturers either to transfer their factories to the Trust or to force the ruin which it declares is imminent. The Trust has lately bought the well known English firm of Messrs. Bryant and May. Its careful activities are not confined only to

factories which are outside the Trust. It is now making an attempt to capture all the manufacturers of chemicals and machinery for the purpose of preventing the establishment of match factories other than those controlled by the Trust. As it is inconceivable that the match industry that is solely organised by foreigners and solely financed by them will contribute to the wealth of the country, it is essential that the Indian Match industry should be protected until it can successfully compete with the rival match industry of the countries beyond Indian, and of India itself when it is a concern of foreigners.

The third condition.

The third condition is that the Industry must be one which will eventually be able to face world competition without protection.

With the exception of unscrupulous foreign competition there is nothing to retard the progress of match industry in India. It is confidently believed that within a space of twenty years this indigenous industry will be able to face the world competition and dispense with the protection which alone can foster its growth at present.

THE SECOND POINT.

The second point is that that " if the industry satisfies the above conditions and is to be protected, the amount of protection required and the methods by which such protection should be given."

(*a*) To make the protection effective against such a powerful combination as the Swedish Match Manufacturing Company it is absolutely necessary that the present import duty of Re. 1-8 per gross should be raised to Rs. 3 per gross.

(*b*) Since the import duty cannot check the rivalry of the factories established in India by foreigners, it is necessary that excise duty of Re. 1 per gross should be levied on the product of the factories financed wholly or mainly by foreign capital.

(*c*) That the import and excise duties should be continued for at least a period of twenty years at the end of which it is hoped that the Indian Match Industry will attain its maturity and will be able to compete successfully with the Match trade established by foreigners.

With regard to the imposition of protective duty, it is well to bear in mind, as Professor Pigon has pointed out, that although the protective duty is a part of the burden inflicted upon consumers, yet it is not a net burden to the Country; it is a mere transfer of wealth to other persons of the country. The import and excise duties mentioned above will put an end to the unscrupulous Swedish American interference in the match industry of India. The foreign Syndicate employs only a limited number of labours for the simple reason that they use labour saving machinery, while on the other hand the Indian Match Factories depend more upon manual labour and give employment to thousands of Indian labourers.

THE THIRD POINT.

The industry satisfies all the conditions and hence it is not necessary to deal with the third point.

It may not be without some interest to the Tariff Board if statistics with a special reference to para. 98 of the Fiscal Commission Report are furnished for the purpose of showing that " the industry is one in which the advantages of large scale production can be achieved, and that it is probable that in course of time the whole needs of the country could be supplied by the Home production."

(*a*) As for large scale production, it has already been mentioned that Calcutta factories alone produce 610,000 gross of filled boxes per month at present as compared with 700,000 gross of boxes of matches manufactured in the whole of 1910 by all the firms throughout India.

(*b*) With reference to the question of supply of the whole needs of the country, it will be clear from the following figures that with the growth of the

indigenous Industry there has been a considerable fall in the importation of foreign matches.

Imports.

Year.	Gross.	Value.
		Rs.
1919-20	1,24,45,163	17,19,402
1921-22	1,17,75,120	1,75,74,322
1922-23	90,50,895	1,29,53,466
1923-24	88,92,594	1,18,50,336
1924-25	52,42,560	66,61,506
1925-26	58,57,675	71,82,549

Calcutta Match Factory, Calcutta.

Representation, dated 13th December 1926.

With reference to the printed Press Communiqué which was sent to me about the Match Industry in India I beg to send herewith my views on the subject.

Grant of protection to the Match Industry in India.

My humble suggestion is that the Government of India, before issuing instructions to the Indian Tariff Board to investigate the question of granting protection to the Match Industry in India, ought to have asked the Director of Industries of every province to submit to the Tariff Board a statement showing how many match factories have been started in each province and how much capital has been invested in them and to ascertain from them their difficulties and obstacles in producing and selling the products of their respective concerns. In Bengal several factories with large capital have been started and they are handicapped in securing the right sort of wood to develop the industry, because the Forest Department of the Government of Bengal do not follow a progressive policy to help these concerns. There are plenty of suitable wood available in the Sundarban and other forests as well but the Forest Department will not move in a progressive way and act according to the suggestion of the Director of Industries and help the factories situated in Bengal.

The import duty should be maintained at this present figure as the industries are still in their infancy and will not be able to withstand competition with the imported matches if the duty is fixed at a lower rate and which will consequently make the present concerns to close their factories. The factories have to import paper, chemicals and other ingredients for the manufacture of matches and all these have to bear freight, duty and other trading charges and consequently these factories are paying certain duty to the Government of India in a roundabout way, and the Government could easily have ascertained this from the Custom Authorities.

Any other form of taxation to make up the loss of revenue from the decreased import of matches will have the same effect as ablation of the duty and the industry which is in its infancy will not be able to hold its own against imported matches by paying this new tax. Sweden and Germany were the biggest importers of matches in pre-war days and during that period Japanese matches began to be imported in India and they used to sell them at a lower price than any of the European matches. After the duty has been levied on the imported matches Sweden with the help of American capital and Japan supported by its Government started two match factories in and around Calcutta and I learn that Sweden have started one factory in Assam and another in Bombay and it is their intention to start all over India factories like these and kill the factory started with indigenous capital and who

have got no one to help them financially and consequently these are small concerns in comparison with Swedish and Japanese concerns. They are selling matches on credit and allowing even the petty dealers to pay them the price at their convenience and which have handicapped the indigenous concerns good deal. My humble suggestion is that these factories started with foreign capital ought to be taxed on their production so that the indigenous concerns may be saved and the Government will make good the loss which they are suffering.

The Bengal Safety Match Works and Medical House Limited, Rungpur, Bengal.

Representation, dated 25th December 1926.

With reference to the Resolution of the Government of India in the Commerce Department, No. 235-T. (14), dated the 2nd October 1926, remitting the match industry of this country to the Tariff Board for investigation as to whether it is entitled to claim any protection from the Government and in compliance with the Communiqué, dated the 29th November 1926, issued by the Board calling for statements, from persons or firms who desire to claim protection, of the grounds on which they do so, we beg to state as follows:—

From paragraph 97 of the Report of the Indian Fiscal Commission it will appear that an industry before it can claim protection from the Government will have to satisfy the following four conditions, *viz.*:—

(1) That no industry, not already established on a commercial scale, be granted any protection.

(2) That an industry claiming protection should have natural advantages.

(3) That it be found unable to develop at all, or as rapidly as is thought desirable, without protection

(4) That ultimately it should be able to flourish without protection.

It seems to us that an examination of the points mentioned above will solve the question at present at issue in the case of the match industry of this country.

(1) From the statistics in the possession of the Government it will appear that this industry is no longer an "assembling industry." Innumerable persons in the country have taken up this business and quite a large number of limited companies also have established themselves all over the country and are doing excellent business. The low import of splints and veneers and the appreciable loss of customs revenue to the Government which has necessitated this investigation also go to show that the industry has already established itself on a commercial scale and is gradually expanding in volume. Apart from the bigger factories there are a large number of smaller concerns also all over the country which are doing brisk business in this direction and the enormous increase in the value of certain imported materials necessary for the manufacture of matches also lend support to the view that the industry has established itself on a commercial scale.

That the industry is no longer in its primitive stage will also appear from the fact that it has affected the foreign trade in this respect with the result that there has been a strong combination on foot among the foreign capitalists for crushing this indigenous industry. The Swedish Match Company has even gone so far as to start a few companies in this country with the ulterior object of crushing the indigenous concerns. Consequently all these are eloquent of the fact that the industry has already established itself on a decent commercial scale and will gradually expand in volume unless, of course, it be not crushed out of its existence by strong foreign combines of which indications are not already wanting.

(2) The second point that deserves consideration is whether the industry has got natural advantages; on this point, we think, we may refer the Board to the very excellent report submitted by Mr. A. P. Ghose on the investigations into the possibilities of Match Industry in Bengal at the instance of the Department of Industries, Bengal. This report may be treated as an annexure to this representation.

From this report, it will appear that so far as Bengal is concerned natural advantages are not wanting in the case of this industry and that on the whole the match industry in this country has great and bright prospects. Two factors seem to be essentially necessary for these advantages, *viz.*, labour and wood, and fortunately the country abounds in both these respects. Indian labour is proverbially cheap and plentiful and as far as Bengal is concerned it has, in the language of Mr. Ghose, " forests the potentialities of which are great from the point of view of the match industry. It has match wood of fairly good quality and in abundance. The existence, sustenance and growth of the match industry will now very much depend on the Forest Department policy. Special royalty rates, conservation of particular species and forest areas and special facilities and help from the Forest Department are essentially needed."

The climatic conditions of the country also are not unfavourable to the growth of this industry except in those few places where rainfall, moisture, fog and storms are abnormal.

From the above it will be perfectly clear that the industry has got all the natural advantages that are requisite for its growth.

(3) The next point that requires examination is whether the industry in its present stage is unable to develop at all, or as rapidly as is thought desirable without protection.

From what has been stated above in the discussion of the point as to whether the industry has established itself on a commercial scale it will appear that already Swedish manufacturers have combined with American Capitalists to crush this nascent industry and have even gone so far as to start a number of factories here and thus to monopolise the Match Industry of this country. On this point we beg to refer the Board to the Industrial and Trade Review for Asia, for October, 1925, a copy of which is annexed herewith for favour of the Board's perusal. From the above it will be clear that strong foreign combinations are already on foot to crush this industry which has not attained its full development as yet. Under the circumstances protection from the Government of the country in some shape or other is essentially necessary for the growth of the industry and to prevent it from being crushed out of its existence by these trusts.

It is well known that in the face of powerful foreign combinations it is not possible for an infant industry to grow without protection. Even free England did not hesitate to forge penal laws at the beginning of her cotton industry. The history of the German bounty-fed sugar industry is also not unknown to the members perhaps. Consequently, if in a free country like England or Germany protection plays so important a part in the case of an infant industry it is not difficult to imagine how much more it is necessary in the case of a nascent industry in India which has to maintain its position and to grow against well-established foreign competitions of colossal magnitude like the Swedish-American Trusts referred to above.

From the Industrial and Trade Review for Asia already quoted it will appear that the principal object of the Trust is to kill this indigenous industry by fair means or foul and to monopolise the match trade of the world. Consequently, we beg to submit that all possible precautions ought to be taken by the Government of the country to frustrate this nefarious object of the Trust. We hope we may be permitted to submit that in furtherance of this object for the preservation and growth of an important industry of the country like the present by which thousands of her unemployed middle class are earning their livelihood and will continue to do so as the industry will gradually expand in volume, the Government should grant protection not

only by the imposition of adequate fiscal duties on all imported matches but also by refusing permission to bodies like the Swedish-American Trusts for starting their own factories in this country unless three-fourths of the capital of any such company have been subscribed by Indians. We venture to suggest that it is only in this way that the Government can frustrate the unholy object of these Trusts and confer real benefit on the teeming millions of the soil if, of course, it really desires to do so.

(4) The last point that calls for our examination is whether ultimately the industry will be able to flourish without protection.

It is no doubt true that in the case of business everything ought to be looked at from the point of view of pound, shilling and pence inasmuch as Government can't be expected to suffer the loss of its revenue indefinitely. But the present loss of custom duties which has necessitated this reference to the Board is, in our opinion, something more apparent than real inasmuch as the Government has left out of its consideration the increased amount of duties it realises from the gradually increased imports of certain materials that are necessary for the manufacture of matches. If these be taken into account then we hope the deficit of revenue under this head will come down to an appreciable extent. That being so we do not think that any protection that may be ultimately given to this industry will have to be given to it indefinitely or will continue to be of such a magnitude that the Government ought to feel any nervousness for it in view specially of the benefit that it will confer on the children of the soil by this measure. Consequently, if the Government does not hesitate to adopt bold measures for the protection of this industry as suggested above and that only for a few years so that the industry may be able to develop in the meantime by overcoming its initial difficulties there is no reason to suppose that ultimately it will not be able to flourish without protection for the resources even of powerful Trusts are not unlimited and they as business concerns are not surely expected to incur heavy losses year after year in the hope that something will turn up to their advantage in the future. It is well known that Indian capital is exceedingly shy. For aught we know it is not unlikely that this is one of the reasons why the country has not been studded with indigenous match factories up till now for the products of this industry are required for daily use by the high and the low alike. Consequently, we think we may reasonably hope that if the industry gets breathing time to develop itself capital will flow in more abundantly and Government will be able to more than compensate its present loss by the increased customs duties that it will realise from the enhanced imports of various commodities required for the industry. With the development of the industry the cost of production is also expected to come down and if some concessions be shown to it by the Railway authorities and the Steamer Companies as in the case of the tea industry there is, in our opinion, no reason to think that ultimately it will not be able to flourish without protection like other industries.

From what has been submitted above it is abundantly clear that the possibilities of match industry in this country are great and that its prospects are bright. We have also shown that it satisfies the conditions laid down in the Report of the Indian Fiscal Commission for enabling an industry to claim protection and that the present is eminently a case where protection ought to be granted by the Government.

The next point for consideration, therefore, is as regards the amount of protection required and the methods by which such protection should be given. As to these we beg to suggest that the Government can substantially help the industry in the following ways:—

(1) By enabling it to obtain match wood from the Government Reserved forests at reduced royalty rates;

(2) By the conservation of particular species and forest areas and by the grant of special facilities and help in the matter of obtaining match wood from these forests as suggested by Mr. Ghose in his report referred to above;

(3) By securing concessions on freights from the Railway and Steamer Companies for raw materials and finished products;

(4) By retaining the duty on all imported matches, splints and veneers at the present figure and by not imposing any tax on the manufactures of concerns financed purely by Indians;

(5) By granting loans or subsidies in some shape to small industries and cottage industries;

(6) By reducing the import duties on chemicals and other raw materials necessary for the manufacture of matches;

(7) By transferring the duty on imported matches, splints and veneers from the schedule of revenue to that of protective duty;

(8) By not permitting foreign companies like the Swedish Match Company to start factories here unless three-fourths of the capital of any such company have been subscribed by Indians and are in the hands of Indians;

(9) By the imposition of an excise duty of annas eight per gross of matches on the outturns of factories financed wholly by foreign capital and in the case of factories financed by mixed capital by the imposition of a like duty in proportion to the foreign capital employed.

We hope and trust that if the Government be really desirous of giving an impetus to industries conducted purely by Indians with the aid of Indian labour and capital and to the industrial education and advancement of the people of this country it will not fail to sympathise with them by affording them protection against foreign competitions in the matter of an important industry like the present and thus help them in their attempt at the industrial regeneration of their country.

Enclosure.

(Copy.)

INDUSTRIAL

AND

TRADE REVIEW FOR ASIA.

For promoting Asia's industrial development and foreign trade relations, 1925.
Berlin, October (First Half). No. 19.

THE FOREIGN DANGER TO INDIA'S MATCH INDUSTRY.

The time is rapidly ceasing to be when India was solely a supplier of raw materials to foreign countries and buyer of manufactured articles. The country is being industrialised, and foreign capitalists, whose only Fatherland is the land which provides the best opportunities for lucrative investment, are not slow in casting their greedy eyes upon the unexplored resources and cheap labour of the Indian continent. The problem has now become extremely acute and Indian opinion is rightly concerned about the alarming growth of foreign private and joint stock companies which not only cause a large drain of India's wealth in the form of interest and dividends, but, what is far more serious, tend to transfer the key-industries of India into foreign hands as well as to prevent the growth of prosperity of a number of industries in which India could be self-dependent and self-supporting.

To this latter category belongs the match industry. It was long believed that the Indian match industry was deemed to failure for want of suitable timbers. But during the last few years it has been clearly proved that this is a fiction. India is one of the largest markets in the world for the con-

sumption of matches and she is obliged to import enormous quantities from foreign countries. The most important of those is Sweden; the import from Austria, Hungary, Japan, Norway, Czechoslovakia or Finland is inconsiderable in comparison with Sweden. That country has, therefore, a very strong interest in preventing the growth of the match industry in India, for it would be a severe blow to Sweden's largest export trade if India should succeed in manufacturing matches on a sufficiently large scale to satisfy the demands of the Indian market.

The Swedes have, therefore, decided to start their own factories in India—a fact that has already aroused considerable indignation in national India circles. But the exact manœuvres of the Swedes still seem to be not clearly understood by the large majority of Indians and it will, therefore, be very instructive to them to read the following facts that have been placed at our disposal by a German Match Expert who has recently returned from India after many years' stay there, who has set up match factories for a number of Indian Capitalists and who is sincerely and enthusiastically interested in the development of the match industry in India. He says: "It is well known that India is to-day the best customer for Swedish matches. This is solely due to India being unable to produce her own matches. And this again was and is still due to lack of enterprise and difficulties in obtaining timbers suitable for match manufacture. Lately, however, things have considerably improved. Since over two years the Indian match manufacturer has been protected by an import duty of Re. 1-8 per gross of boxes of matches. As the cost price of good matches made in India is somewhat below Re. 1-8 per gross, it is obvious that a good return for the capital outlay is assured and there is, no doubt, a fair opening for the match industry in India. In fact, some of the Indian businessmen are at present very keen on starting match factories in India, and lately some well-equipped factories have been started. It is almost certain that, in course of time, India will be able to produce her own matches and then the import of foreign matches, chiefly of Swedish make, will stop automatically. Sweden, or to be quite correct, the Swedish-American Match Combine, is watching this development with keen interest. They have already launched an offensive against the Indian Match Industry on a large scale. They did this in such a cunning way that most of the Indians have been taken unawares. It is worth while to go a little further into the practice of the said combine. Above all one thing is certain, the real aim of the said Match Trust is to monopolise the world's match trade. The means employed by the Trust to attain this end are numerous. According to circumstances they employ fair or foul means. To be just it must be admitted that they employ fair means first. If unsuccessful, they will use foul means unscrupulously. It is impossible within the available space in this paper to depict the various ways and means employed by the Trust. Generally, the practice employed is as follows. After having undersold the matches manufactured in the country for a considerable time (the English call this dumping), they approach the factories with a proposal to buy the whole business. As a rule, the price offered is a decent one. Of course, the owner will be bound over not to do any more business in matches. Very often, after having bought the factory, it will be closed down. Then, of course, the import of matches must commence again. Quite a number of match factories in Europe and elsewhere have come under the influence of the Trust and a great number have been bought by the Trust.

What means is the Trust now employing in India? Before all it must be perfectly understood that the Trust is out for killing the existing match factories in India; in order to attain this end the Trust has started a factory in Ambarnath near Bombay and another one in Calcutta. Both these factories are already working and an extensive underselling of Indian made matches has already begun. In addition, factories at Karachi and Madras are in course of construction. Moreover, two existing factories, one in Colombo and the other in Rangoon, have been bought by the Trust. Further, some of the important factories in India have received very favourable offers, fortunately so far without success. They also have opened the Match Manufacturing Supply Company in Bombay. This Company, besides supplying paper and

chemicals for match manufacture (mostly of Swedish make) is acting as Agent for Messrs. Gerh. Arehn, Stockholm. The last named firm is supplying match making machinery but lost its independence some time ago, or in the other words it belongs to the Trust. The said supply Company comes as a wolf in sheep's clothing to the Indian businessman. They offer materials cheaper than any Continental or English firm. Indeed, this Company undertakes to equip factories almost for nothing. They offer to take payment after years. Why? Any man with a reasonable amount of business brain will feel sure that there must be a "fly in the ointment" somewhere, or as the Indians say "Kuchh dal men kala hai" and so there is. If, for some reason or other, the payment is not forthcoming after the agreed period, the Trust will take over this factory without much ado and thereby strengthen its position in India more and more. Most of the readers of this paper will say there will be comparatively few Indians who will go into this trap. This is not so. It may be mentioned here that lately the Government of Bihar and Orissa has been trapped in the aforesaid way. There in Patna the Swedish-American Match Combine is erecting a small demonstration factory on behalf of the Government. By allowing that, the Government of Bihar and Orissa has assisted the Swedish Match Trust and has acted against the interests of the country and people. It must be mentioned here, however, that the Government did not know at the time that the Match Manufacturing Supply Company and the Swedish-American Match Combine are identical. Unfortunately, only a few Indians are acquainted with this fact.

During the last year, a few big factories have been started near Bombay by enterprising Indians. These factories import suitable wood in logs from Siberia. Their matches are finding a ready sale. The Swedish factories in Ambarnath and Calcutta import wood in logs also. There is no import duty on wood in logs. Now the Trust is feeling the competition of these factories and in order to get rid of them they urged Government to put a high duty on wood in logs also. They did not do this in a straightforward way but got behind some officials and other influential people. Fortunately the Bombay businessmen are wide-awake and the attempt of the Trust failed. If they had succeeded, the Indian factories besides the Swedish factory near Bombay would have had to close down. As the above-mentioned Indian factories are considerably larger than the Swedish factory, this would only mean that the Trust is getting nearer its real aim, *i.e.*, to govern the world's match trade. The last mentioned move of the Trust was a very clever one and quite a number of Indians were unable to see the real object of the Trust. The Trust is keeping up its propaganda regardless of expenses.

It will be of interest to mention a few items about the Trust. The capital of the Combine is 180 million Swedish Kronan (about 15 crores of rupees). On the Board of Directors are names like Percy A. Rockefeller, Samuel F. Pryer, H. Havenmeyer, John McHugh of the Mechanical-Metal National Bank, F. L. Higginson of the Bank Lee Higginson & Co., New York. Chairman is the Swede, Ivar Kreuger.

There is no doubt that, if the Trust is able to monopolise the World's Match Trade, the consumer will have to suffer. Because after attaining their aim, they will fix the prices at such a level that they will more than recover their former expenditure. Moreover, it is of no interest to Indians if their industries are organised solely with foreign capital.

Let us hope that India will be among the countries where the Trust is unable to secure a footing.

Now this same Mr. Kreuger, the Director of the Swedish Match Company, has been clever enough to publish a review of the world's match industry with the special object of throwing sand into the eyes of the Indian people. After showing how Sweden has been able to overcome the difficulties caused by the War and to compete successfully in the world's market, he says:

"It is easy to understand, however, that if the Swedish match industry is to retain its leading position, it cannot rely only on the Swedish factories, and for this reason the Swedish Match Company decided a few years ago to go

an for a programme of taking an interest in match factories abroad on a very large scale. We have now in operation two newly-built factories in India, one in Bombay and one in Calcutta, and we are building two new ones, one in Karachi and one in Madras, and we have acquired two established match factories in Colombo and Rangoon. It is not our intention to try to monopolise the Indian match trade, and we have decided to seek the co-operation of prominent Indians in our Indian undertakings."

We should like these utterances of the Swedish Director to be read in the light of the above statement of the German expert. It is highly important for Indians to know all the facts regarding the methods of the Swedish Match Company, as well as their innocent looking ramifications abroad. It should be known to them that the Norden Export Company of Sweden and the Nord-deutsche Maschinen-Vertriebs Gesellschaft in Berlin are both alleged to have very intimate connections with the Swedish Trust and the main object of these so-called suppliers of match-making machinery is to monopolise India's match trade and make Indian factories impossible except in Swedish hands. We warn all Indians against purchases of machinery on easy terms from suspicious firms, and we advise them to have dealings only with well established German manufacturers of match-making machinery about whom there can be no doubt whatsoever. We shall be happy to supply all intending manufacturers with the names of all the reliable machine firms in Europe and we sincerely trust that Indian capitalists will organise themselves to establish and control match production in India and make it impossible for the Swedish Trust to obtain a footing there.

The Jalpaiguri Industries Limited, Bengal.

Representation, dated 29th December 1926.

With reference to the Press Communiqué, dated the 29th November, 1926, inviting opinions from those who desire to claim protection for the Match Industry in India, we have the honour to make the following representation:—

1. We consider that three conditions laid down in paragraph 97 of the Report of Indian Fiscal Commission are fully satisfied in the case of Match Industry inasmuch as—

(*a*) The chief raw material for the industry is wood and this India possesses in an abundant supply. Investigations undertaken by Mr. R. S. Troup, Imperial Forest Economist to the Government of India, the results of which were published so far back as 1910, conclusively proves that workable match wood can be obtained in sufficient quantity to run big factories in many parts of India. Coming to Bengal, investigations of Mr. A. P. Ghose at the instance of Local Government also led him to report "that on the whole Match Industry in Bengal has great and bright prospects" (*vide* Bulletin No. 16, page 4, of Department of Industries, Bengal).

(*b*) *Mechanical Power.*—A match factory on account of the lightness of the machines requires much less power than perhaps any other factory employing equal number of hands. In Calcutta or other big cities affording suitable sites for match factory electric power can be used and in fact is being used with great advantage. In mofussil centres where electric power is not available, the erection of a modern crude oil engine will do; whereas if the factory is installed in the vicinity of forests, a steam engine using wood fuel and wood waste from match machine would serve equally well.

(*c*) *Labour.*—In most parts of India labour can be obtained at much cheaper rates than in European countries or in Japan. It may be said that Indian labour is unskilled and so is not really cheap; but much stress should not be laid on this point because the works involved in match industry are very simple, and the skill already attained by Indian labour in Calcutta where several big factories are now being run by purely Indian labour are proof posi-

tive of the fact that, given average training Indian labour would be quite efficient for running the industry.

(*d*) *Home Market.*—India is a very big match consuming country. Matches worth more than two crores of rupees were imported in 1921-22 excluding Home production which was all internally consumed. The demand for matches is so steady that in his book "Indian Forest Memoirs" published in 1910 Mr. R. S. Troup opined "if we take the average daily output of a future Indian match factory at seven hundred gross per diem, we find that if India were to manufacture all the matches she now imports, she would require fifty-six fairly large match factories in addition to the few factories already existing" (*vide* Indian Forest Memoirs, page 6). To this statement was added the very significant remark that the foregoing estimate was probably under the mark because it was based on an average consumption of slightly over one match per head of population per diem, as against four to five matches per head in Europe.

(*e*) The greatest advantage of match industry developed in India is a combination of all the natural advantages previously referred to within one compass; and in this respect India is in a much better position than the two countries which even now are having a lion's share in this particular trade with India, we mean Sweden and Japan. Both these countries have the natural advantages of having a large supply of match wood and efficient labour, but none of these has any large home market. Match industry in both the countries derives sustenance from export trade. So that when the manufactures from these countries reach the Indian consumer many extra charges are heaped on the cost of production, *viz.*, charges of the foreign export Agent, Indian dealer at the seaport, ocean freight, excise at home and import duty at the consuming country, Railway freight for long journey from the seaport town, cost of zinc-lined packing which is essential for ocean transport, etc. Now, considering her big consumption, if India is divided into a number of centres, and one or more match factory is set up within suitable radius of each such centre, most of the extra charges aforementioned will be eliminated. Thus Indian match factories, administering to only local needs (excluding possible export trade) have enough scope for development.

2. Inspite of these possibilities to its favour the match industry, however, at its present state is one which in our opinion is not likely to develop at all without the help of State Protection for a considerable number of years. This will be evident if we trace the history of present state of this industry in India. Match industry has become a practical proposition since the imposition of import duty at Re. 1-8 per gross, *i.e.*, more than 100 per cent., *ad valorem* on all foreign matches. Before that Indian factories—we mean the very few that could at all stay on in the face of foreign competition—were leading a very precarious existence. Many attempts miserably failed, the causes of failure being:—

(*a*) want of sufficient capital outlay,

(*b*) wrong choice of factory site, wrong selection of machine, difficulty of selecting suitable match wood, want of expert advice, inefficient labour and management, etc.,

(*c*) fastidiousness of consumers used to better finish of imported matches, lack of patriotic sentiment to support national industries.

The levying of import duty at the rate of Re 1-8 per gross has virtually given protection to match industry with the result that—

(*d*) capital has been forthcoming for the industry,

(*e*) experiences gained by past failures have become safe guide for present attempts so that the causes enumerated in (*b*) are operating to lesser and lesser extent,

(*f*) fastidiousness of the consumers has been gradually decreasing by getting used to Indian matches owing to their lower price in comparison with foreign matches; mass national consciousness has been aroused and this will be a great asset to the industry in the long run.

Thus the imposition of this high import duty has afforded to the Indian match industry the much-needed incentive to sustained effort. Indian capital is proverbially shy and the procuring of requisite capital for an up-to-date factory equipped with highly developed labour saving machinery has become extremely difficult if not impossible, especially after the many failures which have attended this line in the past. Indian manufacturers have therefore even now have to take recourse to obsolete methods and cheap but laborious machines, and a considerable amount of hand labour resulting ultimately in a higher cost of production than their foreign competitors. It may be pointed out as a fact that imported brands of Japanese and Swedish matches even paying the import duty at Re. 1-8 per gross are selling at Rs. 2-5 per gross while the best Indian match cannot lower its price below Rs. 2 per gross without causing loss to the manufacturers. If, however, the industry is protected for a further period of ten years, it can be confidently expected from the results already attained that the difficulties now encountered both financial and technical will be gradually overcome and Indian industry will be established on a firm basis. It will then be able to benefit by the exceptional natural advantages to its favour and stand any amount of competition from foreign countries.

3. As regards vested interests that have been created it may be said on a modest calculation that more than twenty lakhs of Indian capital have been invested in Bengal alone, let alone other provinces of India. A new line of industry has opened up to the young and unemployed youths of the country, and many middle class families are being provided by piece works offered by this industry. India must develop her industries if her sons are to live at all, and from this standpoint alone every effort should be made to establish this industry on a firm basis.

4. There is another aspect of protection, however, which has been urging itself on Indian manufacturers. Swedish and Japanese Trusts have established big factories in many parts of India to avoid the import duty and incidentally to benefit by the protection. This aspect has already become a menace to Indian industry which is yet in an admittedly infant stage. The protection is thus virtually acting to the detriment of the very purpose for which it is intended and far from helping Indian enterprise it is serving the double purpose of depriving the Government of their Customs Revenue and killing Indian industry with the very weapon intended for the latter's defence.

5. We therefore recommend that Indian match industry should be protected in the following manner:—

(*a*) The present customs duty on imported matches should be retained.

(*b*) Import duty on splints and veneers should be retained at its present level.

(*c*) Import duty should be levied on match wood imported as logs in proportion to their splints and veneers manufacturing contents.

(*d*) Excise should be levied on all match concerns established in India, financed fully or in part by foreign capital.

(*e*) That the duties (*a*), (*b*), and (*c*) should be made protective.

6. It may be contended that protection to match industry would mean higher cost for the consumers and loss of revenue to Government. But this higher price will at best be temporary as we are looking forward to a time when the industry will be able to stand on its own legs and dispense with protection. The loss of revenue due to the falling off of import of matches

will be compensated by increased imports of match chemicals and match papers, of machinery and eventually by taxes paid by us. The excise on foreign financed concerns will also bring a substantial revenue.

7. We hope we have established the claims of Indian match industry to be protected. We are firmly of opinion that this industry will be strangled by highly organised competition from Swedish and Japanese Trusts, if no protection is afforded to the industry in the lines we have recommended in paragraph 5. Finally no good can be achieved without sacrifice and any loss or hardship that has to be temporarily borne by the Governmnet or the people may reasonably be regarded as the price that must be paid for a permanent national asset, *viz.*, opening up of a new indigenous industry which will bestow everlasting benefit to our country and its people.

The New Sunderban Match Factory Limited, Calcutta.

Representation, dated 30th December 1926.

With reference to your Press Communiqué, dated 29th November, 1926, regarding the protection of the Match Industry, we beg to submit our views on the subject as follows:—

That the three conditions laid down in paragraph 97 of the Indian Fiscal Commission report are satisfied and that the industry should be protected.

The three conditions laid down in paragraph 97 of the Report of the Indian Fiscal Commission relating to industries claiming protection are that:—

(1) The industry must be one possessing natural advantages such as—

(*a*) abundant supply of raw material,

(*b*) cheap power,

(*c*) sufficient supply of labour,

(*d*) large home market.

(2) The industry must be one which without the help of protection either is not likely to develop at all or is not likely to develop so rapidly as is desirable in the interests of the country.

(3) The industry must be one which will eventually be able to face world competition without protection.

(1) Applying these tests to the Match Industry we find with respect to No. (1), "natural advantages"—

(*a*) That in Bengal there are very large supplies of suitable wood in Sunderbans. In Assam there is also an ample supply of suitable wood. In Bihar and Orissa according to the report of the Government Expert there is sufficient suitable wood, and a Government Model Factory has been started in Patna. The United Provinces, we know, abound in the supply of Simul wood. There are large quantities of Bluepine available in the Punjab and we know that evon if the timber is secured at market prices it is possible for the industry to develop. Poplar wood is also to be had in the Punjab and though the results with this timber hitherto have not been very satisfactory, yet with the improvement of the growth of these trees it may be expected to prove a very useful raw material obtainable at comparatively more economic rates. Mango wood is also to be had in the Punjab and its utility as a match wood may be said to have added to its importance in this province. In Madras Forests plenty of suitable match timber is available. In Kashmir there is a plentiful supply of suitable Poplar, Spruce, and Willow wood; and recent experiments and examination have shown that inspite of the disadvantages of distance to railhead, it could be possible to work economically with these timbers.

(*b*) The question of cheapness of power will vary in different provinces, but it may be observed generally that in the existing conditions the cost of power does not handicap the manufacture of matches. In Western India, Tatas have launched upon a large Electrification Scheme and are supplying power at very cheap rates. In the Punjab the Mendi Hydro-Electric Scheme guarantees power at cheap rates, while in Kashmir, electricity for commercial purposes may be had at under 6 pies per unit. Thus with the electrification which is in progress in different parts of the country, power will be available at cheap rates. Moreover, India is a large coal producing country and Burma abounds in Petroleum.

(*c*) As regards the supply of labour, there is no doubt that there is plenty of it in all provinces of India and that the same may be had at low rates. In fact the earning of an Indian is the lowest in the world. Our experience shows that they are quick at picking up technical knowledge. It is evident that the cost on labour forms a very encouraging factor for the Indian Match Industry when compared with the labour costs in other countries, and with the rise of efficiency it will, after a time, form an important factor in enabling Indian Matches to withstand world competition.

(*d*) As to market, it is well known that there is a large home market which is at present in the hands of foreign capitalist manufacturers.

(2) It is abundantly clear from a study of the history of the industrial development of India for the past quarter of a century or so that inspite of various attempts made from time to time the match industry has not been able to develop at all, and it has not been possible for this industry until lately, when the Government of India levied an import duty on foreign manufactured matches imported into India, that the indigenous Indian enterpriser received an appreciable measure of encouragement to attempt developing the industry. The reason for this industry not being developed inspite of the fact that India possesses various kinds of timber suited for match manufacture is also apparent. Foreign countries have been masters of this industry and the trade connected therewith for a long time. They possess very large organization, and facilities both natural and commercial. Their financial resources make it possible for them, after their flourishing existence for scores of years, to reduce their working cost and profits to a minimum which though bringing them only a small return on their capital, ensure to them the control over the world market in which India furnishes a very large field. They are in a position to kill a new venture by even foregoing profits for a time or even drawing on their reserve and losing a little. Indian enterpriser in this industry has therefore naturally to combat against very powerful competitors; and it is therefore evident that unless he has some kind of support and protection from Government in its early stages of development, he has little or no chance of being fit to stand up to this keen competition.

The Industry is one which without the help of protection is not likely to develop at all.

It is an admitted fact that the match industry in India has been stimulated by the Re. 1-8 per gross duty; and that prior to this although various independent ventures were made, they did not meet with any success, and the few that survived existed through sheer perseverance. It is instructive to note that up till 1921 although the match industry had been in existence for over a quarter of a century the manufacture from Indian wood hardly reached 1,500 gross per day; and that too of a very inferior quality as compared to the imported matches. Subsequent to the imposition of the duty, the manufacture from Indian wood received a steady impetus, and in 1924-25 the figure of production of matches in India rose to about 5,000 gross per day. Considering that there are certain factories under construction, while many are under contemplation, the industry may be fairly claimed to be a progressive one with the help of the duty, which, although it was given effect to only as a revenue measure, has acted simultaneously as a protective measure for

the Indian match industry. It is hardly necessary in the peculiar circumstances of the match industry to prove that without the help of protection the industry is not likely to develop. The unsuccessful ventures prior to the levy of the duty and the successful and progressive work subsequent to it prove most conclusively that without the requisite protection the indigenous match industry in India cannot develop and must, if left alone, die in a short time.

Appreciable as the effects of the duty were in protecting the growth of the Indian Match Industry, the delay on the part of Government in imposing a special duty on imported match *logs*, inspite of the repeated representations of the indigenous match manufacturers, has not only caused a fall in Government revenue, but has adversely affected the indigenous match manufacture. The duty therefore, although it has acted as a protective measure, has not met the aim and object for its imposition. It has been evaded by the foreign manufacturers by employing clever devices; and consequently the Indian manufacturers who took up the enterprise in right earnest, laying their faith in the protection afforded by the levy of this duty, have had to encounter extreme difficulty and to meet a severe handicap in the actual working of their manufactures.

(3) To enable the indigenous match manufacturer to ultimately stand foreign competition he must effectively—

The industry promises to be one which should be able eventually to face world competition without protection.

(*a*) reduce the cost of production, and

(*b*) enable his products to compare favourably with foreign imports.

Considering that the first impetus received by the match industry in India was given only in 1922, a good bit of the last four years has gone in preliminary enquiries, erection of factories, and preliminary arrangements incidental to manufacture and marketing. The cost of indigenous manufacture is therefore still comparatively high and the finished product less attractive to the market. It is premature to gauge the extent to which cost of manufacture can be reduced and the quality of the finished product improved, though we cannot doubt that with economic and careful work results will be appreciable. It will be instructive to study the handicaps which affect the cost of matches manufactured in India from Indian timbers and to show the prospects that may be anticipated.

(*a*) Chemicals and paper are at present very largely imported owing to the fact that India is not yet producing the paper nor the chemicals for the manufacture of matches. The chemical industry in India has a future before it and we may reasonably hope that the increasing demands of the match industry during its course of proper development will afford an impetus to the manufacture of superior chemicals in India. With the various attempts that are being made to manufacture paper in India on extensive and economic lines, the match industry may expect a certain economy in this item. The development of chemical industries and paper to an extent as to materially help the match industry is, however, a question of time; but we may assume that these will in due course form material factors in determining a competitive cost of Indian matches for world competition.

(*b*) Technical knowledge has to be obtained in the initial stages, at a considerable cost, but with the development of the industry in the country and with training being received by Indians, the expert technical knowledge will be obtainable at a much lower cost. With the experience, which is being gained of Indian conditions as applied to this industry, there is much that can be done to improve and organize the working with a view to economy and efficiency.

(*c*) Labour, of which India has more than plentiful, is much cheaper than that available in other countries producing matches.

Trained labour is of course essential for efficient and economic working. It is encouraging to note that Indian intelligence receives that training quite quickly.

(*d*) The question of inland tariff for raw material and finished products is one which deserves a careful and sympathetic consideration of the Government of India, and is one which is worthy of being taken up by Government in the interests of the Indian industries. Considering that the development of the match industry in the country, apart from transport of finished products, ensures to railways an additional revenue on account of the transportation of all raw materials incidental to manufacture, the railways, by allowing concession freights to encourage the industry, would be helping their own revenue. There could be a material reduction of cost as soon as concession freights can be had, and a decided encouragement to the manufacturer dealing with Indian timber.

(*e*) Timber which is of primary importance is abundant in India, and there is plenty that can be suitably employed for match manufacture while most of it at present remains unutilized for want of transport facilities. This is a severe handicap under which the Indian Match enterpriser is labouring at present.

It will be observed that although the question of obtaining timber at present at prices economic enough to withstand world competition is a difficult one, yet the difficulty is not such as to be unsurmountable. There is, however, another important feature connected with the cost of this raw material required for the manufacture of matches. In India the match enterpriser has to purchase it mostly from Government forests and in small quantities from third parties, and in both cases the suppliers of raw material have no direct interest in the development of the industry and consequently no serious effort is made to reduce the cost to a possible minimum.

We believe it should be practicable within a reasonable time to co-ordinate the interests of Government and other timber suppliers with those of the match manufacture to an extent as will ensure—

(*a*) the improvement of the growth of suitable species;

(*b*) the manipulation of supplies to give timber in its most suitable condition;

(*c*) the reduction of extraction costs to a possible minimum.

In view of considerations such as these it will be clear that although the match industry in India has every prospect of being able in course of time to face world competition, it is premature at present to calculate with any precision the time this would take. Much depends upon the progress that can be made in the next five years.

(B)

From a study of the figures given below :—

Year.	Government Revenue in lakhs.	Matches imported in gross.	Matches in terms of daily production gross.	Value in rupees.	Splints. lbs.	Value rupees.	Veneer lbs.	Value rupees.
1921-22	103	13,680,801	15,602	2,03,80,469	...	...	...	...
1922-23	154	11,235,740	37,619	1,61,80,658	...	...	...	...
1923-24	138	11,243,745	37,479	1,45,91,813	..	...	...	...
1924-25	126	7,264,785	24,215	88,88,611	967,305	1,95,413	2,780,063	10,08 935
1925-26	118	7,928,522	26,428	93,45,036	25,521	4,809	1,128,751	3,86,916

we observe that since the duty of Re. 1-8 per gross was levied on matches, the import of finished matches began to fall. The decline of revenue was noticed in the financial year 1923-24 and to counterbalance the decreased revenue the import of splints and veneers in place of the finished matches that accounted for the drop was also taxed. In the year 1924-25 there was a large import of splints and veneer. But in the year 1925-26 a decided fall in the import of splints and veneer was noticeable which undoubtedly indicated an extensive import of match logs.

It is apparent that the first attempt to avoid the import duty consisted in replacing finished matches with splints and veneer, and when the latter were also included in the schedule of special duty, a fresh device was found to evade the duty by the importation of match logs, which has increased by leaps and bounds in the two years 1924-25 and 1925-26. It would be in keeping with the policy adopted by the Government of India in 1924, if they were to impose a special duty on match logs also to safeguard the interests of their revenue.

The fall in Government revenue may be attributed to—

(1) the growth of the match industry based on Indian timber,

(2) evasion of the duty by importation of match logs.

The former as a matter of fact, if at all, can account only for a very small portion of the decrease, while the latter is mainly responsible. If a special duty had been levied as was suggested at the time by the indigenous manufacturers Government would have been saved, we venture to observe, the loss of revenue. We therefore strongly urge the expediency of taxing imported match logs further, in addition to the existing *ad valorem* duty.

Another reason for the fall in Revenue is the suspected abuse of the right of transhipment of Native States. Matches are being imported to some of the Native States through their ports in a much larger quantity than the actual demand of those States and the excess quantities are sent to towns in British Territory a long way off from those States avoiding the customs duty legitimately due to the British Government.

(C)

The vested interests created as a result of this duty.

(*a*) Considerable capital has been sunk in the match industry during the last five years or so. We are alive to the fact that large investments have been made in this direction by the Swedish American Trust who control important match factories in different parts of the world and are therefore keenly interested in importing foreign matches into India. They are essentially out in India with a view to avoid the Re. 1-8 duty and to exploit the country to their own advantage. We cannot for a moment conceive that the Government of India will tolerate the idea of exploitation of the country by the foreigners who are anxious in their own interests to kill the prospects of an indigenous Indian industry and are capable of bearing substantial temporary loss to ensure their ultimate gain. It would be a great catastrophe both for the ultimate revenue to Government and for the industrial benefits that could accrue to the people of India. We do not therefore consider that the investments contracted in India by foreign enterprisers, as opposed to the Indian interests, deserve any protective consideration whatsoever. At their best, the foreign investments were a gamble undertaken to ensure the ruination of India's indigenous interests and should therefore be treated as such.

(*b*) There are however certain Indian firms and individuals who have hitherto developed a business with the use of foreign timber. We however consider that every inducement and facility should be offered to such Indian firms and individuals to employ their enterprise in the interests of Indian timber by which measure a substantial impetus will be afforded to the indigenous industry and a consequential gain to the Forest and Railway Revenue, and to a large amount of labour that could be employed on works preceding the actual manufacture in a factory.

(c) In addition to the factories already in existence and actually working with the Indian timber there are many fresh ventures either under construction or contemplation. We have no doubt whatsoever that in addition to large investments actually made on these constructions considerable sums of money have been spent by Indian enterprisers on preliminary investigations and enquiries.

(d) There has been a decided gain to the Indian Railway owing to the establishment of match factories using Indian wood. Factories based on imported wood, to thrive, must be located on or near seaports, and hence no freight on carriage of Match Timber, Chemicals, Paper, Fuel, and other imported stores, can normally accrue to the Railways from them. Factories using Indian timber must invariably be situated inland, and thus to ensure the delivery of various materials incidental to manufacture a decided Revenue accrues to the railway. With the growth of factories using indigenous timber the increased railway revenue will become an appreciably vested interest.

(e) With the increase in the requirements of timber there is bound to be an increase in the labour employed on its extraction, and with the propagation of suitable species of match wood and their extraction, the increased employment of labour will be a material factor for consideration. Every endeavour is being made in various quarters to place on the market at economic rates timbers which are suitable for match manufacture. We understand that there are in Northern India extensive plantations of suitable timbers in hand which in the course of 10 to 15 years would, it is hoped, be able to furnish timber of very superior quality to manufacture about 10,000 gross of matches a day. Undertakings of this kind will doubtless follow in quick succession in other provinces if only the Indian enterpriser has the guarantee of protection to see him successfully through the period of experiment and development.

(f) With the fixation of the Re. 1-8 duty in the normal course there should have been a tendency for the market rates to have risen. It is the Indian manufacturer that has ensured a further decrease in the price and has ensured to the consumer the rate of 3 pies per box. He has thus materially safeguarded the interests of the consumer, which can by no means be considered to be a negligible factor in the interests of the country.

(D)

Whether the loss in revenue can be made up by any other appropriate form of taxation of the industry.

We have discussed in a previous paragraph the difficulty under which the present Indian manufacturer is labouring in selling his goods against those imported or manufactured with imported logs. It will not be out of place to mention here that the actual fall of revenue due to the import duty is not so high as it appears to be. Match manufacture in India has increased the import of Chemicals, Papers, and Wood, etc., and has increased the consumption of wood from Government forests. The increased revenue on these heads considered along with its apparent fall on matches would show the figure much less. We do not consider it would in the circumstances be at all desirable or justifiable, at such a stage, to contemplate the taxation of the indigenous match industry with a view to make up the actual shortage of Government revenue. If our suggestions summarized at the close are agreed to, the Government will not only be safeguarding its own revenue, but very largely protecting the interests of the consumer. In the circumstances we consider that the question of taxing the indigenous industry does not arise.

It is an acknowledged fact that matches are more or less an indispensable necessity of life, and the match industry is of great economic importance, if India is to be self-contained. We are aware that with the expansion of the indigenous industry, there can be no danger of an undue rise in prices, as competitive conditions within the country will contribute to regulate the minimum price.

In addition to this, there is the important question of India being developed to be self-contained and self-dependent within the Empire. Want for

this was prominently felt during the great war, and if on any grounds Great Britain is ever hereafter drawn into war with the match producing countries or there is any disturbance in the waters separating India from the foreign countries manufacturing matches, the condition of India would be pitiable, unless she has developed her indigenous resources and is self-contained. We believe it should be accepted as a principle that where the questions of the economic development of the internal resources of the Empire are concerned, and the conditions for the development of an industry are not unfavourable, the industry should as far as possible be adequately protected. There can be no gainsaying the fact that the indigenous match industry is decidedly one which comes under this category, and consequently any proposal for taxing it would be most detrimental to the interests of the country and the Empire.

The conclusions arrived at may be summed up thus:—

1. That the three conditions laid down in paragraph 97 of the Indian Fiscal Commission Report are satisfied in regard to the match industry and that the industry should be protected.
2. That the customs duty imposed at present on imported, finished matches, splints, and veneers, should be converted into a protective duty on the same scale.
3. That a suitable protective duty should be imposed on imported match logs.
4. That a suitable excise duty of not less than 8 annas per gross should be imposed on the production of factories of which three-fourths of the capital and Directors are not Indian.
5. That any fresh tax levied on the manufacturers using indigenous timber would be ruinous in the interests of the country.
6. That suitable measures should be adopted for increased facilities for Railway and Steamer transport of Indian match wood throughout the country.
7. That the import of foreign matches through Native States by transhipment methods requires very careful examination.

Rajfulbaria Match Factory,
The Bhowani Engineering and Trading Company,
Bangia Diasalai Karjalay,
National Match Factory,
Matangi Match Works,
Bhowmik's Match Factory,
Radheyshyam Match Works,
Prasanna Match Factory,
The Lucifer Limited,
Pioneer Match Factory,
Sukul Match Works,
Messrs. Bishanath Prosad Mahadev Prosad,
The Bhagirathi Match Factory,
Karimbhoy Match Manufacturing Company,
The Bengal Match Works, Bengal.

Representations of various dates.

Referring to your Press Communiqué, dated the 29th November 1926, inviting opinions from those who desire to claim protection for the Match Industry in India, I have the honour to submit that the above Communique

was considered at a Conference of Match Manufacturers, held on the 13th December last, when the following Resolutions, which have already been published as an Associated Press Message in the Press, were unanimously passed:—

1. That the present import duty on matches, splints and veneers be retained at its present level.
2. That the above duty be made a protective one.
3. That the excise on matches, manufactured by factories, financed fully or in part by foreign capital,—as suggested by the Indian Match Manufacturers' Association,—is indispensable if the Indian Industry is to survive, several factories having already had to close owing to this foreign competition.

The Conference, moreover, unanimously supported all the Resolutions passed by the Executive Committee of the Indian Match Manufacturers' Association, held on the 7th October last, as also the views expressed by them in their Secretary's letter No. 527, dated the 16th October last, to the Secretary to the Government of India, Department of Commerce.

Dealing categorically with the questions contained in paragraph 3 of your Communiqué, we beg to state as follows:—

First, as to the grounds on which we consider that the present rate of duty should be maintained, we beg to submit that the industry arose only under the protection of this duty. Many attempts were made to establish the industry before the present duty was imposed, but failed. We would point out also that some Japanese matches, even paying this duty, are selling now at about Rs. 2-5 per gross, whereas the first class indigenous product is selling at about Rs. 2 per gross, so that it is apparent how small the margin is.

Secondly, as regards the fulfilment by the industry of the conditions laid down by the Indian Fiscal Commission, we beg to submit that:—

(*a*) It has already been established in this country on a commercial scale, as will be seen by comparing the statistics of imports of matches for the last few years.

(*b*) There are in this country extensive tracts of land covered by forests containing the essential raw material for this industry, namely, wood, suitable to be used for splints and veneers and these resources are capable of immense development. Labour, moreover, being both cheap and abundant, there are prospects for the expansion of the industry both on factory and on cottage scale.

(*c*) The industry requires both a protective duty and a protective excise, as stated in the above Resolution, the former for about ten years.

Thirdly, as regards vested interests that have been created, we believe that it will be found that no less than twenty lakhs of Indian money have been invested in Calcutta alone in match manufacturing and, of course, many times that sum in India as a whole.

Fourthly, as regards the nature of these interests middle-class families of small means have, to a great extent, subscribed this money in the hope of providing employment for some of their members, and training them industrially, whilst getting reasonable interest for their investment, and capitalists have financed undertakings hoping to see an Indian Industry develop. (The number of men earning their livelihood with this small industry cannot be accurately ascertained and we believe that no less than ten thousand people are engaged in it in Calcutta and its suburbs only and many times the sum in India as a whole. As the manufacture of "Bidis" has removed hooliganism to a great extent from big cities such as Calcutta, Delhi, etc., so we believe that the wrapping of match boxes alone may do the same. The Tariff Board may witness it if they be pleased to have a walk through the suburbs of Calcutta such as Ultadanga, Paikpara, etc Thousands of poor men are earning their bread by doing this part of the business. The match Industry in this

country has increased the import of Wood, Paper, Gum, Chlorate of Potash and other commercial chemicals to a huge extent and the import and manufacture of machineries also are developing day by day. So the industry embraces various classes of business and the interest is public and wide-spread. In such hard times as these and in such days of unemployment hundreds of young and educated gentlemen at the mere sight of the Revenue Duty devoted themselves to this industry and are earning their poor bread in an honest way though they all know that the industry still rests on uncertain basis. Now if the industry be crushed down, these people both educated and illiterate will be rendered unemployed and unemployment in a well-governed country is not a good sign both for the rulers and the ruled.)*

Fifthly, as regards the grounds for hoping that the industry will develop, we beg to point out that India is a vast country with great regions, far from Railways or even from good roads, and there is every reason for people in such localities to manufacture for themselves articles of universal use, like matches. It may be pointed out also that, as the investigations of the Royal Commission on Agriculture have already emphasised, one of India's great needs is industries in rural districts using materials that are, and could be, easily produced locally.

Finally, we beg to point out that all these possibilities can materialise only if foreign competition in every form is effectively prevented from strangling the Indian industry which is now struggling to establish itself and overcome its technical difficulties which, of course, can be done only gradually. As has been rightly insisted upon by the President of the Indian Match Manufacturers' Association in his Address, delivered at the last Annual meeting, held on the 13th of January, 1926, foreign capitalists are organised in a way that small Indian concerns cannot be, so that the latter are liable to be crushed by the former; as indeed has already happened in the case of many. (The foreigners, both Swedish and Japanese, have long-standing experience and huge capital behind their business and their average rate of sale per gross will remain at the same level with those of the native manufacturers even after paying an Excise Duty; as the Technical difficulties of the latter are still many in their infancy. So the Protective Excise is, we think, the only remedy to remove our difficulties and to establish ourselves in the world of industry.)*

Numerous examples can be given of steps taken by different countries to limit foreign-capitalised activities that threaten to be injurious to the interest of their people.

We beg, in a word, to request that the people of India should be protected in the same way. This was the idea that inspired the Resolutions, mentioned in the beginning of this letter.

In conclusion, we beg to refer to the fact that the loss of revenue, due to the falling off of imports of matches, is compensated by increased imports of materials used for their manufacture, in this country, of machinery, and finally by taxes paid by us. We might point out also that the excise, suggested by us, would be a source of income.

We cannot insist too strongly that it is impossible for this industry to establish itself under modern conditions of world-competition carried, as these Trusts show, by foreigners into the country itself, without this new form of protection against the new form of competition.

Jalpaiguri Industries Limited, Bengal, Match Factory Department.

Letter dated 5th April 1927.

We have the honour to submit the following replies to your questionnaire on the subject of protection to match industry, enclosed in your letter No. 209, dated Rangoon, the 7th March 1927.

1. "Jalpaiguri Industries Limited" which we represent was established in 1925. It is a registered public Limited Company.

---

* Additions made in the representation by the Bengal Match Works.

2. The share capital subscribed is entirely Indian. The total number of Directors is seven, all of them being Indians. No European is employed in any capacity.

3. We undertake the whole process of manufacture. We cut our own splints and veneers from local indigenous wood.

4. The factory owned by this Company was established towards the later part of 1926, and the manufacture of matches commenced from January 1927.

5. The cutting machines are sufficient to produce veneers and splints for two hundred gross of matches per day of eight hours, but the finishing machines can cope with only forty gross of matches.

6. Full size match box. Dimensions $2\frac{5}{16}'' \times 1\frac{7}{16}'' \times \frac{11}{16}''$ 80 to 90 sticks per box.

7. Does not arise.

8. The factory is situated in the Town of Jalpaiguri, Bengal. It is advantageously situated in respect of (*a*), (*b*), (*c*), (*d*). The most important factor in selecting the site of a match factory is the vicinity of, or easy and cheap, communications with the area from which match wood is to be drawn, such area containing sufficient match wood to give the factory a regular and uninterrupted supply.

9. (*a*) Indian manufactured matches are inferior to foreign, particularly Swedish matches in so far as—

(*i*) Splints and veneers are of dark colour and are of an inferior finish to Swedish matches.

(*ii*) Swedish matches are impregnated while Indian matches are not so.

(*iii*) Swedish matches ignite with silent explosion and maximum flame while Indian matches ignite with noisy explosion and rapid but low flame.

(*b*) We do not think that generally speaking at the present time there is any other prejudice apart from quality (as enumerated above) against Indian matches.

(*c*) We think a difference of annas nine per gross or three pice per dozen would be sufficient to overcome the prejudice against Indian matches.

10. (*a*), (*b*), (*c*). No.

11. (*a*) Simul (*Bombax Malabaricum*).

Kadam (*Anthocephalus Cadamba*).

(*b*) Simul.

(*c*) We are not making any packing cases just now; but in case necessity arises for such we propose to use Simul.

12. We have not used imported wood, but from matches turned out by Calcutta Factories using foreign wood, we are of opinion that imported wool is better than Indian wood in colour and strength.

13. (*a*) 5,000 c.ft. of wood.

(*b*) 25,000 c.ft. of wood.

14. About 40 c.ft. of wood.

15. Does not arise as we have not been making any packing cases as yet.

16. The principal areas from which supplies of wood are obtained are:—

(*a*) *Baikunthapur Forest.*—At a distance of ten to thirty miles from the town of Jalpaiguri to the north and is connected with the latter by the river Teesta navigable throughout the year, as also by District Board Roads which can be used throughout the year up to a distance of 14 miles from the town.

(*b*) *Berubari Forest.*—At a distance of 10 to 15 miles from the town of Jalpaiguri to the south and is connected with the latter by means of District Board Road which can be used throughout the year.

17. At present we are using Berubari Forest. Contracts have been made with certain cartsmen of the locality for felling the trees and sending the same to the Factory in their carts.

18. Royalty paid to private owners is annas five per c.ft. on the average.

19. We can give only the rate at which we have been working for the last four months:—

	Rs.	A.	P.
Royalty for 50 c.ft. at annas five per c.ft.	15	10	0
Felling and extraction at Re. 0-1-6 per c.ft. . . .	4	11	0
Cart hire, etc. at Re. 0-3-6 per c.ft.	10	15	0
	31	4	0

or at annas 10 per c.ft. at the factory.

20. We get no concessional rate. The schedule of rates at the Baikunthapur Forest is already very high being on an average at annas 5 per c.ft. excluding costs of felling and extractions, and so will act to our detriment in competing with big factories of Calcutta who get their wood at much cheaper rates.

21, 22, 23. From our short experience we are not in a position to answer these questions.

24. Yes. Baikunthapur Forests are amply provided with suitable match wood.

(*b*) and (*c*). No steps have been taken.

25. No. We do think that the present railway freight for wood is prohibitive. A big factory of an output of one thousand gross per day can be run at Jalpaiguri, being fed by supplies from Government Forests of Jalpaiguri, Kurseong, and Kalimpong Divisions, provided concessional rates for carriage of match wood be granted by B. D. Railway, E. B. Railway and D. H. Railway.

26. Other raw materials are paper, chemicals, glue, paraffin, coal and wood fuel.

27. For 100 gross of matches:—

Paper for wrapping inner and outer boxes (demy size blue paper)	30 quires.
Paper for making dozen packets (black double demy paper)	5½ quires.
Paper for making ¼ gross packets (Kraft double royal paper)	2½ quires.
Chemicals for tipping	32 lbs.
Chemicals for side painting	5 lbs.
Glue	4 lbs.
Paraffin	4 lbs.
Coke	20 lbs.
Kerosine oil for the engine	2 gallons.

28. We buy these things generally from Calcutta market.

Chemicals.

	Rs.	A.	P.			
Potash Chlorate at . .	28	0	0	per	cwt.	Railway freight from Calcutta to Jalpaiguri at Rs. 1-12-1 per maund by goods train and Rs. 3-8 per maund by parcel train.
Sulphur Powder at . .	12	8	0	„	„	
Red Phosphorus . .	2	0	0	„	lb.	
Bychromate of potash . .	40	0	0	„	cwt.	
Ferrice Oxide at . .	14	0	0	„	„	
Manganese Dioxide at . .	14	0	0	„	„	
Glass powder at . . .	9	8	0	„	„	
Lamp black at . . .	0	12	0	„	lb.	
Sulphide of antimony . .	42	0	0	„	cwt.	
Glue at	56	0	0	„	„	
Paraffin at	0	4	0	„	lb.	
Wrapping paper . . .	0	6	0	„	„	Railway freight annas 11-5 per goods and Rs. 3-4 per parcel train.
Packing paper at . .	0	8	0	„	„	

All these are subject to further charges under headings forwarding, packing, V. P. commission, postage, cartage, loading, and unloading at Calcutta and Jalpaiguri, etc., involving altogether annas four to the rupee over and above the Calcutta rates in reaching the Factory at Jalpaiguri.

29. Considering the many industries which are establishing themselves in recent years in India we are very hopeful that papers, chemicals and other raw materials will be manufactured in India if a sufficient and continued demand for them be created by setting up an appreciable number of match factories within the country.

30. No.

31—32. None.

33. Since the very beginning the labour employed has been entirely Indian and by gradual experience they are acquiring the requisite skill.

34. There are 22 paid workmen in all. Of these 8 are boys. No women have been employed. Men are paid on an average Rs. 25 per month and boys Rs. 12 per month.

35. Labour drawn entirely from the vicinity of the factory.

36. Yes.

(*b*) Yes. Box wrapping, box filling, packetting, labelling all these, are done manual labour, and the workmen have shown distinct and marked improvements, both as regards quality and quantity on practice. Other departments involving machine work give the same indications.

37. Labour is partly residential. They have been supplied with free well ventilated, corrugated tin roofed houses, free fuel and medicines and good drinking water.

38 We use one oil engine consuming kerosine oil.

39 Does not arise.

(*b*) We do not know.

40. Does not arise.

41. Oil fuel for the engine at ·12 lbs. per gross, coal fuel for other purposes at ·2 lbs. per gross.

42. Fuel purchased locally. Kerosine oil at Rs. 4-4 per tin of 4 gallons at the factory. Coal (coke) at Re. 1-1 per maund at the factory.

43. Does not arise.

44. We do not know for certain. We presume it is nothing less than 15,000,000 gross in the year.

45. We are not in a position to forecast this.

46. Our prospective market is the whole of Rajshahi Division, particularly the districts of Jalpaiguri, Darjeeling, Rangpur and Dinajpur, all within a distance of less than 100 miles by railway from the town of Jalpaiguri where the factory is situated.

47. The places mentioned above are at a distance of more than 300 miles from Calcutta which is the nearest port where matches are imported or manufactured. The districts of Jalpaiguri and Darjeeling consume more than 6,000 gross of matches per month.

48. (*a*) In these districts (Jalpaiguri, Darjeeling, Rangpur and Dinajpur) about 40 per cent. of total matches put up for sale are imported brands as distinct from matches manufactured in India.

(*b*) We have seen in newspaper reports that there is a strong rumour of matches and splints (in order to avoid duty) being smuggled through ports belonging to Native States. Although for ourselves we have no information about it.

49. Sweden undoubtedly, and Japan to a certain extent.

50. The competition is between imported matches and matches manufactured in India from imported woods on the one hand and Indian matches manufactured with indigenous wood on the other.

51. (*i*) The prices of imported matches varied between Rs. 2-14 at the highest in 1922 per gross down to Rs. 2-7 at the lowest in 1926.

(*ii*) In the same period Indian matches sold at Re. 1-14 at the highest down to Re. 1-8 at the lowest.

(*iii*) Indian matches manufactured from imported wood varied from Rs. 2-14 at the highest down to Re. 1-12 at the lowest.

52. Director General of Commercial Intelligence.

53. We have no information.

54. (*a*) Yes.

(*b*) Yes.

(*c*) Yes, at present.

(*d*) Yes, every raw material except wood is indented from foreign countries to Calcutta and we get the same from Calcutta to Jalpaiguri involving many extra charges over the original cost.

(*e*) Yes. The same difficulty as in (*a*).

(*f*) Yes. Freight by railway and steamer service is very high.

(*g*) Yes. On account of lack of adequate finance.

(*h*) Yes.

(*i*) Yes. This is the greatest difficulty as we have emphasised in our written statement paragraph 2 closing portion.

55. (*a*) Temporary. Serviceable match machines are already being manufactured in India and we may confidently look forward to a not remote time when India will be in a position to make all her match machines.

(*b*) and (*c*) Temporary. As labour both rank and file will improve with time and experience.

(*d*), (*e*) and (*f*). Will be relieved to a very great extent if railway and steamer services introduce concessional rates for the industry.

(*g*) and (*i*) If the existing or recently started factories can be run on successfully for a number of years so as to create the confidence of investing public in the future of this industry as a sound commercial proposition then difficulties about these items will surely be removed.

(*h*) It is a matter for Government.

It will take at least ten years if not more to overcome these difficulties as we have tried to prove in the concluding part of paragraph 2 of our written statement.

56. Ours is a small concern run to a great extent on cottage industry lines. In our opinion a factory equipped with machinery and appliances sufficient for an output of 250 gross per day will be the smallest unit for economical production under present day condition.

57. Slightly over 50 per cent. of the total outlay has been incurred in plant and machinery.

58. (*a*)

One 6 B. H. P. Kerosine oil engine . .	American.
One Double Geer peeling Machine . .	Indian.
One Single Geer peeling Machine . .	Do.
One Splint Chopper	Do.
One Veneer Chopper	Do.
One Polishing Drum	Do.
One Centrifugal Machine (for bleaching)	Do.
One Levelling Machine	Do.
One Paraffin Hearth	Do.
One Dipping apparatus	Do.
One Splint cleaning machine . . .	Japanese
One Frame filling machine . . .	Do.
One Frame Emptying machine . .	Do.

These have been brought into use since January 1927.

(*b*) No.

59. (*a*) No. Our machinery and equipment are too poor and we have to depend largely on expensive and untrained hand labour and plenty other drawbacks which increase our cost of production. At present we cannot compete if the present duty is not maintained and an excise at at least annas nine per gross be not imposed on the products of factories in India financed by foreign capital.

(*b*) There are some machines used specially for drying, box filling, side painting, packetting, sawing, barking, inner and outer box pasting, etc., which owing to their prohibitive cost we have not been able to introduce in our factory. The operations involving these machines are therefore done by manual labour and so we are unable to state the comparative costs of these operations by hand and machine work. We are, however, giving below the rates we are paying for manual work:—

Box wrapping	Rs. 1-4-0 per thousand.
Box labelling	Re. 0-4-0 Do.
Box filling	Re. 1-0-0 Do.
Box side painting	Re. 0-0-6 per gross.
Box packetting	Re. 0-1-0 Do.
Log sawing	Re. 0-1-0 per section.

60. (*a*) No.

(*b*) Yes. A machine saw for log cutting; one labelling machine; one splint selecting machine.

61. None of the machines referred to above is made in India.

62. (*a*), (*b*) None.

(*c*) Building, Rs. 3,934-14-0.

(*d*) Plant and machinery, Rs. 8,950-7-6.

(*e*) Stores, furniture, implements, etc., Rs. 1,059-2-9.

63. Actual cost. There has been no depreciation fund.

64, 65, 66. Does not arise.

67. (*a*) Authorised capital Rs. 50,000.

(*b*) Subscribed capital Rs. 32,410.

(*c*) Paid up capital Rs. 16,037.

All ordinary shares.

68, 69, 70, 71, 72, 73, 74. Does not arise.

75. Follows on pages 45 and 46.

76. Does not arise.

77. No. We, however, know how we stand by periodical stock taking.

78. We have no information.

79. Facts not available.

80. Does not arise.

81. (*a*) Rs. 2,500.

82. It is found necessary to borrow the working capital.

83. The amount borrowed up till now is Rs. 1,500 at 9 per cent. per annum.

84. Working capital at Rs. 2,500 to works cost at Rs. 800 per month or the former is about three times the latter.

85. About Rs. 1,000; about three months after delivery.

86. Not cold. Wood to the average value of Rs. 200 has got to be kept in stock.

87. Head Office and the office of local management are the same.

(*b*) Yes.

88. (*i*) Head office expenses Rs. 360 per annum.

(*ii*) Managing Agent's commission Rs. 360 per annum.

Selling Agents' commission at one anna 6 pies per gross.

89. Managing Agent's remuneration has been fixed at Rs. 30 per month.

90. (*i*) 6 pies to the gross. Head office expense.

(*ii*) Two annas per gross. Managing and Selling Agents' commission per gross of finished matches according to the present rate of output.

91. Ten per cent. on ordinary shares.

92. Does not arise.

93. Does not arise, as the authorised share capital has not yet been subscribed in full.

94. Yes.

A, B, and C. Yes. We have explained these in our written statements paragraphs 1 and 2.

95. (*a*) and (*b*) Yes.

96. Yes. *Vide* our written statement paragraph 1, sub-heading (*e*).

97. (*a*) Re. 1-8 per gross on finished matches. Re. 0-4-6 per lb. of splints. Re. 0-6-0 per lb. of veneer per boxes.

(*b*) We do not know. We opine they are not at all excessive.

98. The retention of the existing duty on matches, splints and veneers. Levying of import duty on wood imported as logs (if such duty is not already existent) in proportion to its splints and veneers manufacturing contents. For reasons *vide* our written statement already submitted as also the views expressed by the Indian Match Manufacturers Association in their letter No. 527, dated 16th October 1926 to the Commerce Department, Government of India.

99. (*i*) Excise at the rate of annas nine per gross on the products in India of factories financed by foreign capital.

(*ii*) The existing freight on the carriage of matches, match chemicals, match papers, etc., and matchwood and other raw materials for the manufacture, is a great burden and the Railway and Steamship Company be moved to grant facilities in this matter.

(*iii*) Everything should be done to prevent anything of the nature of monopoly or cornering the market in the matter of wood.

75. Form I.—Showing total expenditure on the production of matches during *the months of January to March 1927.*

	Rs.	A.	P.
Item 1	335	0	0
,, 2	210	0	0
,, 3	347	0	0
,, 4, 6, 7, 9	345	0	0
,, 5 and 8	720	0	0
TOTAL	1,957	0	0

Total production of matches in the three months—1,150 gross.

75. Form II.—Statement showing works cost per gross of matches.

	Rs. A. P. per gross.
Item 1	0 4 0
,, 2	0 3 0
,, 3	0 4 0
,, 4	0 1 6
,, 5	0 11 0
,, 6	0 1 0
,, 7, 8 and 9	0 2 6
Net total	1 11 0

Total production of matches for the three months—1,150 gross.

The Bhagirathi Match Factory, Bengal, Calcutta.

(1) *Letter, dated the 19th April 1927.*

We beg to submit herewith 7 sets of our answers to the questionnaire issued by you in connection with the enquiry into the claims of the Indian match industry to protection which your Board is now engaged in. As we started work only a few months ago it has not been possible for us to answer some of the questions. The particulars asked for under Table I of the appendix to the questionnaire cannot for the same reason be furnished by us.

In this connection we beg to submit that if required we shall be prepared to give oral evidence on any points that may not have been made clear in our written statement and in the accompanying answers to your questionnaire.

Answers to questionnaire regarding Match Industry.

1. The firm was established in February 1926. It is a private firm.

2. There is neither any foreign capital nor any European employee in our factory.

3. The firm make complete matches from veneers and splints manufactured in our own factory.

4. The factory commenced manufacturing from the middle of November 1926.

5. The present capacity of the factory is about 200 gross full sized complete matches per diem.

6. Full size with about 90 matches in each box.

7. About 500 cases during the last 5 months.

8. 1, Jogen Bysack Road, Barnagore (24-Parganas).

(*a*) No, as heavy cartage is being paid to draw raw materials from Calcutta.

(*b*) Yes, in respect of electric power.

(*c*) Yes.

(*d*) No. Great difficulties are experienced in getting a good number of trained labour.

9. Yes, mainly in splints and partly in box veneers. Regarding chemicals though we are improving it will still take some years to reach the standard of foreign matches. There are difficulties also is securing good raw materials.

(*b*) There are prejudices in favour of white splints against the dark ones.

(*c*) People will pay 1½ pice for a box of imported matches (with white splints) but a pice for the native matches.

10. Though we are not importing foreign timber, we are keenly feeling the need in view of the demand for white splints.

11. We generally use Genwa (Excoccoria Agallocha) for all purposes.

12. No. In strength, colour and quantity (one cubic foot of Aspen timber imported from Japan gives sufficient quantity of splints and veneers for about 5 gross of full sized matches against 2 gross obtainable from Genwa wood of average girth).

13. About 700 tons per year.

14. 50 cubic feet.

15. 2′ 1″×2′ 1″×3′ 3″ for 50 gross full sized matches. We generally buy ready made boxes from saw mills.

16. We generally buy from Ultadingi market. The distance is about 4 miles from our factory.

17. See above.

18. We buy wood from Ultadingi market. We understand that a royalty of Rs. 4-11 is paid to Government for 100 maunds of wood.

19. (3) About Rs. 8 per ton; (4) About Rs. 2 per ton.

20. As we buy wood from Calcutta market, the question does not arise.

21. No. Match manufacturing requires green wood and wood generally keeps green up to a month from the date of felling; with longer delay it becomes dry and unsuitable. Owing to the difficulties of the waterways and dependence on wind, the wood is apt to arrive too dry. Power-driven boats and regular dredging are absolutely needed.

22. No. Sometime scarcity of wood is felt for days together.

(*a*) We do not know.

(*b*) Partly true.

(*c*) We do not know.

(*d*) Owing to its very large use for other purposes.

23. We do not know.

24. (*a*) We believe that if the Genwa wood is reserved exclusively for manufacturing matches, it may be assured of a sufficient supply for a considerably long period.

B. and C. We do not know.

25. (*a*) No.

(*b*) Yes, we consider that the present freight charged by Railways and Steamship Companies for the carriage of wood to be excessive.

26. Raw materials, besides wood and the total requirement of each per annum is given below against each item.

(1) Chlorate of Potash	10 tons.
(2) Bichromate of Potash	1 ton.
(3) Ferric Oxide	1 ton.
(4) Manganese Dioxide	4 tons.
(5) Sulphur	1¼ tons.
(6) Lamp black	6 cwts.
(7) Glass powder	5 tons.
(8) Sulphide of Antimony	1½ tons.
(9) Umber	½ ton.
(10) Red Phosphorus	1 ton.
(11) Zinc Oxide	½ ton.
(12) Gum	5 cwts.

(13) Glue	5 cwts.
Gellatine	3 tons.
(14) Paraffin	12 tons.
(15) (*a*) Inner pasting paper	3½ tons.
(*b*) Outer pasting paper	2½ tons.
(*c*) Dozen packing	6 cwts.
(*d*) Gross packing	3 tons.

2*f*. (1) to (15) (*d*).

	lbs.	
(1) Chlorate of Potash	30	C. Rs. 25 per cwt.
(2) Bichromate of Potash	3	C. Rs. 56 per cwt. (powdered,
(3) Ferric Oxide	5	C. Rs. 15 per cwt.
(4) Manganese dioxide	12	C. Rs. 15 per cwt.
(5) Sulphur	4	C. Rs. 14 per cwt.
(6) Lamp black	1	C. Rs. 112 per cwt.
(7) Glass Powder	14	C. Rs. 9 per cwt.
(8) Sulphide of Antimony	4	C. Rs. 70 per cwt.
(9) Umber	2	C. Rs. 56 per cwt.
(10) Red Phosphorus	3	C. Rs. 224 per cwt.
(11) Zinc Oxide	2	C. Rs. 28 per cwt.
(12) Gum	2	C. Rs. 56 per cwt.
(13) Gellatine	8	C. Rs. 84 per cwt.
(14) Paraffin	25	C. Rs. 28 per cwt.
(15) (*a*) Inner pasting paper	14	C. Rs. 23-12 per cwt.
(*b*) Outer pasting paper	8	C. Rs. 23-12 per cwt.
(*c*) Dozen packing paper	2	C. Rs. 28 per cwt.
(*d*) Gross packing paper	10	C. Rs. 19-2 per cwt.

N.B.—The above quantities are for 100 gross full sized matches.

28. (A) All the materials are generally purchased from Calcutta.

(B)(*a*) Market prices have been quoted against each item above.

(*b*) Cartage, loading and unloading are paid at Rs. 6 per ton.

29. We do not know.

30. *Vide* our answer to question 16.

31. We can hardly afford to pay for foreign labour. Indian labour, if properly trained, becomes efficient.

32 and 33. We do not employ any imported labour and hence these questions do not occur.

34. About 100 in all, out of which 50 are men, 35 women and 15 boys. Men at Re. 1 to Re. 1-8; women at 12 annas to Re. 1; boys at 8 annas to 12 annas per head per diem.

35. About 25 per cent. local and 75 per cent. from outside Bengal.

36. *Vide* our answer to question 31.

(*b*) No.

37. They generally make their own housing arrangement.

38. Electric power.

39. Current is supplied by the Calcutta Electric Supply Corporation, Limited.

(*b*) The cost is 2 annas per unit.

(*c*) We cannot say.

40 and 41. *Vide* answer to question 39.

42 and 43. Fuel is partly supplied by waste wood and partly by coal. Coal is generally purchased from Ultadingi at 10 annas per maund.

44. We do not know.

45. We are unable to forecast this.

46. We generally sell our matches in Calcutta.

47. Practically no.

48. (*a*) and (*b*) We do not know.

49. Japan and particularly Sweden.

50. The serious competition is from Indian matches manufactured with imported wood.

51. We do not know.

52. The Government Commercial Intelligence Department may be consulted.

53. We do not know. But this seems to be their trade secret.

54. (*a*) Yes.

(*b*) Yes.

(*c*) Our labour is dear as estimated by its output.

(*e*) Same disadvantage as in respect of machinery.

(*f*) Yes, freight is one of our main cause of grievance.

(*g*) Shortage of capital is commonly a difficulty in this respect.

(*h*) Yes,

(*i*) Our greatest difficulty. It may take some couple of decades to overcome these difficulties.

55. (*a*) Temporary, till we manufacture more in India.

(*b*) Temporary, till we train sufficient number of labour.

(*c*) Ditto.

(*d*) Temporary, till Railway and Steamship Companies give concessions.

(*e*) Same as above.

(*f*) *Vide* our answer to (*d*).

(*g*) If suitable measures are adopted to establish confidence in the future of the industry, this will improve.

(*h*) This is a matter for Government.

(*i*) See answer to question (*g*).

A couple of decades may be necessary to overcome these difficulties.

56. No. A factory equipped with up-to-date machinery and appliances, sufficient to manufacture 1,000 gross of matches per diem, can in our opinion, be operated economically under present day conditions.

57. About 45 per cent.

58. (*a*) One peeling and chopping for splints (Japanese—Imafukur).

(*b*) One water grinding stone (Japanese—Imafukur).

(*c*) One peeling and chopping for outer boxes (Indian—Bhowani Engineering and Trading, Calcutta).

(*d*) One peeling and chopping for inner boxes (Indian—Bhowani Engineering and Trading, Calcutta).

(*e*) One automatic grinder.

(*f*) One Emery grinder.

(*g*) One splint polishing drum.

(*h*) Two exhausters and blowers for box drying.

(*i*) One outer box pasting machine (Borrman—German).

(*j*) Three inner box pasting (one by Borrman and 2 by Arhens, Sweden).

(*k*) Two box labelling (one Kirao and one Maidzemi both of Japan).

(*l*) Two splint selecting (Hiraw—Japan).

(*m*) Two splint sieving (Bhowani Engineering and Trading Company, Calcutta, India).

(*n*) Two splint labelling (Hirao—Japan).

(*o*) Four frame filling (Hirao—Japan).

(*p*) Two emptying (Hirao—Japan).

(*q*) Paraffining apparatus (Maidzemi—Japan; one heating apparatus—Indian).

(*r*) Dipping (Bhowani Engineering and Trading Company, Calcutta, India).

(*s*) Chemical mixing (Hirao—Japan).

(*t*) Cone grinder (German).

All the above machinery came to be used from when the factory was started.

(B) Practically nothing.

59. No. If the present duty is not maintained and an excise at 8 annas at least per gross be not imposed on the products of factories financed by foreign capital, it would be practically impossible for Indians to compete successfully with the foreign manufacturers in India.

(*b*) Side-painting; box filling, packetting, dipping, paraffining; outer and inner box pasting. We can hardly obtain half the quantity of inner and outer boxes required by us by machine—the rest is to be had by hand pasting. The hand pasted boxes are badly finished and are much inferior to those done by machine. Moreover, the hand process costs us more by Re. 0-1-6 per gross, but matches filled in these boxes fetch us 2 annas less than those boxed in machine pasted ones. Regarding the relative cost of other machines we are unable to give any idea.

60. (*a*) and (*b*) No.

61. *Vide* our answer to question 58 (A).

62. As our factory commenced manufacturing only 5 months ago it is difficult to give quite accurate figures under all headings. Some works are still under construction. The figures given, below are, however, nearly accurate:—

	Rs.
(*a*) and (*b*)	1,000
(*c*)	10,000
(*d*)	35,000
(*e*)	4,000

63. The above figures do not represent the entire cost. We have no provision for any depreciation fund.

64. *Vide* our answer to question 63.

65. Costs more owing to various requirements of the Factory Inspection Department having been lately enforced.

Plant and Machinery.—Cost more owing to a general rise in the prices of imported ones. In view of the general fall in the prices of machines throughout the whole world, it is a puzzle to us as to why the prices of match machines, specially those made in Sweden, should rise enormously if not to make it impossible for Indian factories to be adequately equipped and to compete more advantageously with those established in India by the Swedish Trust.

(*Example.*—During the middle of April, 1926, the price quoted by a Swedish firm for an inner pasting machine was about Rs. 1,400, whereas to-day's quotation for the same machine is about Rs. 2,400. The German machine does not seem to be suitable for this country.)

66. *Vide* our answer to question 62.

67 to 74. Ours is a private concern as has been already mentioned.

75. *Vide* Appendix.

76 and 78. No.

79 to 80. Ours is a new concern and so we cannot say anything.

81. Rs. 25,000.

82. We are often required to borrow at a high rate of interest, exceeding in some cases, 24 per cent. The industry looks to Government for help in this matter through Co-operative Societies.

83. *Vide* answer to the above.

84. About Rs. 75,000.

85. About Rs. 20,000 at present. About 90 days.

86. Regarding coal—No. Regarding raw materials—about Rs. 35,000.

87. Yes, under direct employment of the proprietors.

88. (*i*) About Rs. 1,200.

89.

90. About 2 pies.

91. As ours is a private concern we cannot say anything at present.

92 and 93. No.

Claims to Protection.

94. (A), (B) and (C). Yes, we have already explained them in the written statement, already submitted.

95. (A) and (B) Yes.

96. We cannot say.

97. (*a*) Re. 1-8 per gross on finished matches and Re. 0-4-6 on one lb. of splints and 6 annas on one lb. of veneers for boxes.

(*b*) We do not know but we think that they are very small items.

98. The retention of the existing duty on imported matches, splints and veneers. The above duty should be transferred to the Protective head from that of Revenue. For reason *vide* our written statement already submitted as also the views expressed by the Indian Match Manufacturers' Association in their Secretary's letter No. 527, dated the 16th October 1926, to the Department of Commerce, Government of India.

99. (*a*) An excise at the rate of at least 8 annas per gross on the products of factories in India financed by foreign capital.

(*b*) The existing freight especially on the carriage of matches, chemicals and wood causes great hardship and the Railway and Steamship Companies be directed to grant facilities in the matter.

(*c*) Everything should be done to prevent anything of the nature of monopoly or cornering the market in wood.

APPENDIX.

Form II.—Statement showing works cost per gross of matches.

Last five months of 1925-26.

		A.	P.	
1.		6	0	
2.		2	0	
3.		4	0	
4.		3	0	
5.		4	0	
6.		1	0	including cases, zinc sheets, nails, etc.
7.		1	0	
8.		3	0	
9.		0	6	
	Rs.	1-8-6		

(2) *Letter No. 248, dated the 29th December 1927.*

With reference to your letter No. 927, dated 28th November 1927, asking us to give our latest works costs as per Form II of questionnaire, we have the honour to submit the following as asked. In this connection we beg to request you to treat it as confidential. Herewith we also attach a table showing the distribution of labour in the factory and botanical name of some timbers which the President asked to submit during the oral examination.

Latest works costs as per Form II.

	Rs.	as.	p.
(1)	0	6	0
(2)	0	2	0
(3)	0	3	3
(4)	0	0	6
(5)	0	4	0
(6)	0	0	6
(7)	0	0	6
(8)	0	3	0
(9)	0	0	6
(10)	0	1	9
TOTAL	1	6	0 per gross.

Distribution of labour.

	Men.	Women.	Boys.	Girls.
Splint peeling and chopping department	6	12	...	...
Box peeling and chopping department	8	...	...	...
Veneer sorting and chopping department	4	5	1	...
Box pasting and chopping department	6	...	1	...
Box labelling and chopping department	1	6	1	1
Splinting, selecting and levelling department	7	3	...	...
Frame filling and emptying department	8	...	...	...
Tipping and paraffining department	7	...	...	...
Box filling and chopping department	10	10	5	2
Side painting and packing department	7	...	1	...
Case packing and chopping department	2	...	...	...
General services and chopping department	5	2	...	...
	71	38	9	3=121

Andamans Timbers.

Local name.	*Botanical name.*
Papita	Stercaliu campanulata.
Bakota	Not known.
Didu	Bombax Insigne.
Dhup	Canarium euplyllum.

The Prasanna Match Factory, Dacca, Bengal.

Letter, dated the 19th April 1927.

We beg to enclose herewith the 6 copies of the answers as asked for in your No. 209 of the 7th March 1927 for favour of your kind consideration and necessary action.

We are the pioneer of the match manufacturer of the Eastern Bengal even our existence will not remain longer by the Calcutta Swedish factory if proper protection be not given to this poor cottage industry at an early date by imposing taxes on those foreign factories established in India.

INTRODUCTORY.

1. (*a*) The firm which we represent is called the Prasanna Match Factory which is established in December 1921.

(*b*) It is a private unregistered firm.

2. (*a*) It is an Indian Factory, and the Capital invested in this factory by the sole proprietor Babu R. K. Mojumder is about Rs. 5,000.

(*b*) No Director.

(*c*) No Europeans.

3. Our Factory undertakes the whole process of manufacture, *i.e.*, Veneers, Splints, Matches, Match Boxes, but we use to purchase foreign splints for our full size matches.

4. In December, 1921.

5. The machines can produce 100 gross complete veneers and splints of match boxes, but owing to the scarcity of wood the machines cannot work more than 3 days in each week, and the factory can produce 20—30 gross matches, but as the factory depends wholly to the labourers, owing to their constant irregularity the outturn differ.

6. We manufacture medium and full size matches, the medium boxes contain 70—80 matches and full size contains 90—105.

7.

	Gross.
1921	93
1922	2,520
1923	3,960
1924	4,320
1925	5,400
1926	7,920

8. The Factory is situated at 30 Becharam Dewry, Dacca.

(*a*) and (*b*) The site we have selected is most unsuitable for our Factory partly because it is far off from the forest which supplies us with wood, and partly it is far off from Calcutta from where we purchase other raw materials.

(*c*) Yes, from here we can transport to the important market of the Eastern Bengal at a cheap rate.

(*d*) Here labourers can be had at a cheap rate up to last Janmastamy festival, but after Hindu-Moslem riots that advantage is gone. In selecting the site, its proximity to forest supplying suitable wood at a cheap price with convenient means of communication and transport is considered as the most important factor.

9. Yes, mainly in respect of splints and to some extent box veneers made of native wood, regarding chemicals we have made considerable improvements.

(*b*) Yes. There are strong prejudices in favour of white splints against the dark ones.

(*c*) People will pay 1½ pice for a box of imported matches (with white splints) but not more than 9 pice per dozen for the native article.

RAW MATERIALS.

Wood.

10. If we can be supplied with an abundant quantity of native wood suitable for the industry, we may dispense with the necessity of using foreign timber for articles mentioned under sub-heading (*a*), (*b*) and (*c*).

11. We generally use Gnwa (bot. name) wood for all purposes but sometimes we purchase white foreign splints from Calcutta, and purchase foreign packing cases from the local market.

12. No. In respect of strength and colour and wastage of Gnwa wood is larger, but we have used a piece of native wood which in respect of quality, colour and strength are not inferior to foreign wood, they can be had at Shillong; but it is very costly to get unless Government help.

13. (*a*) and (*b*) Average 180 tons Gnwa wood required annually.

14. 50 cubic feet of Gnwa or 30 cubic feet of foreign wood (Aspen) on an average.

15. The measurement of packing case for full sized matches which contains 50 gross is 24″ height, 26″ breadth and 40″ length. We use packing case for full sized 50 gross and 57 gross medium size.

16. Our factory draws its supply of wood from Khepupara in Sunderban where Government Forest Office is situated, it is about 400 miles off from Dacca.

17 and 18. The Gnwa wood are cut by the local forestmen, from forest the wood is carried by local boat up to Jhalakati (an important bazar of Bakhergunge district) and from where by large boats they are transported to Dacca. It is for these loading and unloading at different places, the cost of wood goes higher and higher. We applied the Rivers Steam Navigation and India General Navigation Company, Limited, for carrying these woods from the neighbouring Sunderban forest, but the charge is so exorbitant, that it is impossible to carry any business with them. Above all they refuse to carry during the rainy season, when they get more money in jute market so at that season we are absolutely helpless.

19. The machines are set up in 1926 and logs are purchased piece by piece, and we do not keep any account separately.

20. We do not get any concession at the time of purchasing, people from various parts of Eastern Bengal go to cut Gnwa wood for fuel, consequently

the price is gradually increasing. The Forest Office has not laid down any law that nobody except match factories will be entitled to cut Gnwa wood. There is no reserve forest, so very soon it will be finished.

21. No. Match manufacturing requires green wood and the wood keeps green up to a month from the date of felling, with longer delay wood becomes dry and unsuitable owing to the difficulties of the waterways and dependence on wind and weather, the wood is aft to arrive too dry. Power-driven boats and regular dredging are absolutely needed.

22. No. Sometimes scarcity of wood is felt for days together.

(*a*) No.

(*b*) Partly true.

(*c*) No.

(*d*) Due to this wood being used largely for other purposes.

23. We do not know.

24. We believe that if the Gnwa wood is reserved exclusively for the manufacturer of matches, it may be assured of a sufficient supply for a reasonably long period.

Not to our knowledge. No.

25. (*a*) No.

(*b*) Yes, we consider the present freight charged by Railway Steamship Companies for the carrying of wood to be excessive. Had we been favoured with a special rate by the Rivers Steam Navigation and India General Navigation Company, Limited, for carrying wood from the forest to Dacca. We could have worked our machines throughout the whole year round.

OTHER RAW MATERIALS.

26. Raw materials, besides wood are (1) Chlorate of Potash, (2) Bichromate of Potash, (3) Ferric Oxide, (4) Manganese dioxide, (5) Sulphur, (6) Glass Powder, (7) Lamp Black, (8) Black Sulphide of Antimony, (9) Umber, (10) Red Phosphorus, (11) Oxide of Zinc, (12) Gum, Glue, Gelatine, (13) Paraffin, (14) Paper for wrapping, (15) Paper for packing.

27.

No. 1	30 lb.	
No. 2	3 ,,	
No. 3	2 ,,	
No. 4	10 ,,	
No. 5	4 ,,	
No. 6	10 ,,	
No. 7	1 ,,	
No. 8	3 ,,	
No. 9	2 ,,	
No. 10	3 ,,	
No. 11	2 ,,	
No. 12	4 ,,	
No. 13	20 ,,	
No. 14	5 ,,	of reels.
No. 15	1 ,,	packing paper (dozen and gross) for full sized matches.

28. We buy them from Calcutta market.

(*b*)

	Rs.	A.	
(1)	28	0	per cwt.
(2)	56	0	,,
(3)	15	0	,,
(4)	18	0	,,
(5)	12	8	,,
(6)	9	0	,,
(7)	90	0	,,
(8)	68	0	,,
(9)	290	0	,,
(10)	15	0	,,
(11)	82	0	,,
(12)	0	6	per lb.
(13)	0	4	,,
(14)	0	6	,,
(15)	0	8	,,

(*c*) In addition to these we have to pay average Re. 1-6-6 per maund as steamer freight from Calcutta to Dacca Ghat and 14 annas for each cart loaded goods from Dacca Steamer Ghat to our factory.

29. We cannot forecast this.

Labour.

30. In spite of all disadvantages, we started our factory at Dacca, considering labours were cheap here, but owing to the gradual increase of cost of living and specially after the Hindu-Moslem riots during last Puja festival the Moslem labourers who are the backbone of our factory not to work in our factory, most of the labourers have resumed to other lucrative works, for, we cannot increase the rate of wages of the labourers for foreign matches and Swedish matches manufactured in Calcutta have overflooded the local market at a cheaper rate, so we cannot but reduce our rate for matches but at the same time we are forced to increase the rate of labourers as asked and other raw materials—such difficulties we are facing.

31. We can hardly afford to pay for foreign labour, Indian labour if properly trained becomes efficient.

32. We do not import any labourer.

33. Nothing. As we do not import? We personally train the labourers and teach them again and again until they are skiled in various departments.

34. About 25 in all, about ¼ children and ¾ men and women, children 4 annas to 6 annas, women 6 annas to 10 annas, man 1 rupee to Re. 1-4 per day.

35. All labourers are local.

36. We are too poor to pay for foreign labour, Indian labour if properly trained becomes efficient. We have no record.

37. This does not arise in our case, as all are local.

Power.

38. The power used in our factory derived from electricity.

39. The motor we use is 7½ horse-power, and the electricity supplied by the Dacca Electric Company, Limited. Cost per unit 3 annas 3 pies. We have not made any comparative study.

40. No concern.

41. We have not been able to calculate this.

42. We have no record.

43. We have no idea.

Market.

44. We do not know.

45. We are unable to forecast this.

46. As our matches are not sold in the local market we are to send it to other markets, and they are far off from 20 to 150 miles.

47. Practically no.

48. (*a*) All our products are sold, but at prices out to a ruinous extent.

(*b*) There is a persistent rumour that matches are smuggled into ports belonging to Native States and brought into British India.

Competition.

49. Undoubtedly Sweden and Japan.

50. The serious competition is from Indian matches manufactured with imported wood.

51. (1) We have no information on this head.

(2) In—

	Rs.	A.
1922	2	8
1923	2	6
1924	2	6
1925	2	0
1926	1	12
1927	1	8

(3) We cannot give you any idea.

52. Commercial Intelligence Department.

53. (*a*), (*b*) and (*c*) These seem to be a question about their trade secret.

54. (*a*) Yes.

(*b*) Yes.

(*c*) Our labour is dear estimated by its output.

(*d*) Yes. It has to be brought overseas and conveyed long distance by rail.

(*e*) Same disadvantage as machinery.

(*f*) Yes, freight is one of our main cause of grievance.

(*g*) Shortage of capital is commonly a difficulty in this respect.

(*h*) Yes.

(*i*) Our greatest difficulty.

55. (*a*) Temporary till we manufacture more in India.

(*b*) Temporary we have trained people.

(*c*) Temporary we have trained people.

55. (*b*) Temporary we have trained people.

(*c*) Temporary we have trained people.

(*d*) Temporary till Railways and Steamship Companies give concessions.

(*e*) Same as above.

(*f*) Same as above.

(*g*) If suitable measures are adopted to establish confidence in the future of the industry this will improve.

(*h*) This is a matter for Government.

(*i*) Shortage of Capital is commonly a difficulty in this respect. It may take a couple of decades to overcome this difficulties.

Equipment.

56. Ours is a cottage industry. A factory equipped with machinery and appliances sufficient to manufacture at least 500 gross a day can, in our opinion, be operated economically under present day condition.

57. Half of our invested capital.

58. (*a*) One peeling machine, one splint chopper, one veneer chopper, one polishing drum, one cleaning machine.

(*b*) We did not make any special arrangement.

59. (*a*) No, we cannot, if the present duty is not maintained and an excise at least at 8 annas per gross be not imposed on the products of factories in India financed by foreign capital.

(*b*) There are some machines used specially for drying, box filling, side painting, packetting, sawing, barking, outer and inner box pasting, etc., which owing to cost and difficulty of handling we have not been able to introduce in our factory and this prevents us from giving any estimate of the relative cost.

60. (*a*) At present financial difficulties is standing on our way.

(*b*) The same difficulty.

61. Peeling, splint chopper, veneer chopper, frame emptying machines are manufactured in India.

Capital Account.

62. (*a*), (*b*), (*c*), (*d*) and (*e*) We do not keep any record.

63. (*a*), (*b*), (*c*), (*d*) and (*e*) We do not keep any record.

64. (*a*), (*b*), (*c*), (*d*) and (*e*) We do not keep any record.

65. *Building.*—Cost more owing to various requirements of the factory paying heavy rent for our factory.

Plant and machinery.—Cost more owing to a general rise in the prices of imported ones. In view of the general fall in the prices of machines throughout the whole world, it is a puzzle to us as to why the prices of match machines, especially those manufactured in Sweden, should rise enormously if not to make it impossible for the Indian factories to be equipped with up-to-date machinery so as to enable them to compete with matches manufactured in India by the Swedish Trust.

Example.—In the middle of May 1926 the price quoted by a Swedish firm for an inner pasting machine was about Rs. 1,400 whereas to-day's quotation for the same is about Rs. 2,400. The German machine is not so suitable for Indian condition.

66 to 74. Our is a private concern. We work with our own capital.

Work cost.

75. See Appendices A and B attached herewith.

76. The working cost is increased in the following ways:—

(*a*) Machines cannot work owing to the scarcity of wood hence they are lying idle.

77. No.

78. We are unable to answer this.

OVERHEAD CHARGES.

(*i*) *Depreciation.*

79. We are unable to answer this.

80. We cannot say.

(ii) Working capital.

81. Our working capital is about Rs. 5,000.

(*i*) Our working capital is about Rs. 5,000.

(*ii*) About Rs. 10,000.

82 and 83. We are often required to borrow at a high rate of interest exceeding in some cases 24 per cent. The industry looks to the Government for help through Co-operative Society.

84. We cannot say.

85. The tendency of the market is to pay 3 to 4 months after delivery.

86. We hold large stock of raw materials, as we cannot buy them immediately from the local market when we want.

87 and 88. No.

89 to 93. Our factory is a private company.

Claim for protection.

94. A, B, C. Yes, we have explained them in the written statement already submitted.

95. (*a*) Yes.

(*b*) Yes.

96. In India we have more or less isolated district, difficult of access, where there is cheap labour and where suitable could easily be produced. The agriculturists not being occupied wholly of their time will work in an industry very cheaply such district ought to supply their own needs in the matter of matches. Besides the labour there are unemployed educated people in such districts who being to live cheaply are satisfied with small earning.

97. (*a*) Re. 1-8 per gross on finished matches and 4 annas 6 pies on one pound splints and 6 annas on one pound veneers for boxes.

(*b*) We do not know. But we think that they are a small item.

98. The retention of the existing duty on matches, splints and veneers. For reason, *vide* our written statement already submitted as also the views expressed by the Indian Match Manufacturers' Association, in their letter No. 527, dated the 16th October 1926, to the Commercial Department, Government of India.

99. (*i*) An excise at the rate of at least 8 annas per gross on the products of factories in India financed by foreign capital.

(*ii*) The existing freight specially on the carriage of chemicals, matches and wood causes great hardship, and the Railway and Steamship Companies be moved to grant us facilities in this matter.

(*iii*) Everything should be done to prevent anything of the nature of monopoly or cornering the market in wood.

APPENDIX B. FORM II.

PER GROSS FOR DACCA.

	1922-23.	1923-24.	1924-25.	1925-26.
	Rs. A. P.	Rs. A. P.	Rs. A. P.	Rs. A. P.
1	0 5 0	0 5 0	0 6 0	0 6 0
2	0 3 0	0 3 0	0 2 6	0 2 0
3	0 7 0	0 6 6	0 5 0	0 4 0
4	0 10 0	0 9 0	0 8 0	0 7 0
5—10	0 7 0	0 6 6	0 6 6	0 5 0
Total	2 0 0	1 14 0	1 12 0	1 8 0

Calcutta Match Factory, Calcutta.

Letter, dated the 19th April 1927.

With reference to your letter No. 209, dated 7th March 1927, I beg to enclose herewith the answers to the questionnaire enclosed with your above letter.

Answers to questionnaire.

1. The factory was started in 1911 and it was closed down from 1914 to 1921 and began working since 1922. It is an unregistered firm and I am its sole proprietor. No European is engaged.

2. My own capital is invested in it and there are no Directors, I being its sole proprietor. No European is engaged.

3. My factory manufactures splints and veneers; match boxes and matches and whole process of manufacture is made in my place.

4. Since 1925.

5. 200 gross of finished matches per day.

6. Mine is a ¾th size box of the size 52×37×17 mm. and used to hold 55 to 60 sticks, and now I am making thinner sticks 1·8 mm. and it now contains 80 to 85 sticks.

7. The output in 1925—5,000 gross, in 1926—4,000 gross.

8. The factory is situated at 38/1, Russa Road South, and it is advantageously situated in respect of (*a*), (*b*), (*c*) and (*d*). In my opinion a match factory ought to have two branches, one in the forest where good wood can be had and making splints and box veneers and send them down to a place near a big town with a Port like Calcutta, Madras, Bombay, Karachi.

9. (*a*) Matches manufactured in my factory are not inferior to any imported matches except Swedish and they are not liked because the sticks are not pure white.

(*b*) I think if white wood can be used in the manufacture of matches then there will be no prejudice against Indian made matches.

(*c*) It is very difficult for me to answer this question for I am myself a manufacturer of matches. There will be no prejudice against Indian matches if the sticks are white.

RAW MATERIAL.

Wood.

10. I have never imported for (*a*), (*b*) and (*c*).

11. I have used the following Indian wood—

(1) Genwa, *Excœcaria agallocha*,
(2) Khanakpa, *Evodia fraxinifolia*,
(3) Kapasi, *Acer Campbelli*,
(4) Sisi, *Lindera pulcherrima*,
(5) Kharani, *Symplocos* sp.,

for (*a*) and (*b*).

For (*c*) I purchase old packing cases from the market and do not make them.

12. Except (1) Genwa, which becomes decomposed if it is allowed to remain a long time after felling; others are as good as the imported ones.

13. (*a*) 3,200 c.ft.

(*b*) 37,000 c.ft.

14. 65 c. ft. for 100 gross.

15. The standard size (inside measurement) of the packing case is 33″×23″×24″ and 1¼ c.ft. of wood is required for one case. 50 gross of ¼th size boxes can be packed in one case.

16. From the Sunderbans which is about 100 miles from the factory and they are purchased locally from the Canal side.

17. The contractors hire boats and fell the trees in the forest and bring them by country boats to Belliaghata and Ultadingi and they are purchased by the shop-keepers or *Aratdars* and from them I purchase and bring them to the factory by bullock carts.

18. Cannot say.

19. Cannot say.

20. A copy of the lease which I got from the Government of Bengal and copies of the correspondence are enclosed. If the Government had made their forest policy a little progressive then Bengal would have been in a position to supply wood for manufacture of matches to whole India. After the lease I asked the Forest Department to mark the trees but it was found that the quantity is not sufficient for my purpose and I found that the royalty for the same wood has been charged more than they were sold to the local public. I pointed this out to the Secretary, Revenue Department, and he asked me to give up the lease and the Forest Department will mark out trees one year in advance in the forest and I will fell them by my agency. The royalty demanded is three times the royalty which is taken from the local contractors for the same timber and I was asked to sign an agreement, from which I found that I will be allowed only in the area which was leased out to me and from which it was found I could not get sufficient timber. I understood that I would be able to fell timber required by me from the whole forest which will be felled in the next year and which I ascertained it to be 150 acres or more in that division. There was another clause in the agreement that I will be criminally prosecuted if my agents or coolies fell any tree other than which has been marked for me. For the above reason I am purchasing local Genwa wood.

21. The quality of the local wood is not deteriorating.

22. Quantity is increasing daily and most probably the contractors are felling them at a greater distance.

(*a*), (*b*), (*c*) and (*d*).

There was no demand for Genwa wood 25 years ago and its price was Rs. 30 per 100 maunds, and now on account of the demand of the match factory and for making packing cases of all kinds its price has gone up to Rs. 125 per 100 maunds.

23. Cannot say.

24. There is no assurance of any kind about the supply of wood from anyone for any period. As far as I know no steps have been taken for planting sufficient suitable trees at a reasonable distance of my factory. This can be done by Government alone.

25. I received special concession from Railway Companies for bringing logs to my factory; probably it has lapsed by this time.

Other raw materials.

26. The following are the other raw materials required for my factory:—Papers, Chemicals.

Papers—

Packing paper for 15,000 gross—7 cwts. nearly.

Roll paper for 15,000 gross—14 cwts. nearly.

Chemicals for 15,000 gross—53 cwts. 2 qrs. nearly.

27. Packing paper for 100 gross nearly 5 lbs. Roll paper for 100 gross 10½ lbs. Labels for 100 gross 150,000. Chemicals 40 lbs. nearly.

28. All of them are imported from Europe. Chemicals can be had at a cheaper price from Germany and papers from Sweden.

29. Cannot say.

Labour.

30. Cannot understand.

31. No skilled labour need be imported from abroad.

32. None.

33. Some of my labourers were trained by a German expert.

34. Total number is 22, of which boys 9, and no woman is employed.

35. From the vicinity of the factory.

36. There is no doubt of the Indian labourers improving with training. There are records in my factory.

37. All of them live in their own huts at a distance of 3 miles from the factory.

Power.

38. Electricity.

39. From the Calcutta Electric Supply Corporation at 2 annas per unit.

40. Does not arise. But I use coal for my boiler for heating purpose and it can be had in abundance.

41. Cannot definitely say.

42. The price of coal delivered to the factory is Rs. 12 per ton.

43. Does not arise.

Market.

44. Cannot say definitely.

45. Cannot say.

46. At a radius of 500 miles from Calcutta.

47. None.

48. (*a*) Cannot say.

(*b*) Cannot say.

49. Sweden and Japan.

50. Japanese matches are almost out of market. Small quantity of Swedish matches come to Calcutta. Cannot say the exact quantity.

51. (*i*) The price of imported matches in 1922, 1923, 1924, 1925 and 1926 cannot say.

(*ii*) In 1925, Re. 1-10-0 and in 1926 Re. 1-6-0.

(*iii*) Cannot say.

52. From importers.

53. I have no personal knowledge on this subject.

54. The foreign manufacturer has an advantage over the Indian manufacturer about (*a*), (*b*), (*c*), (*d*), (*e*), (*f*), (*g*) and (*i*).

55. Excepting (*c*) all the rest are permanent disadvantage. In 15 years this temporary disadvantage will disappear, when the labourer will be fully trained and will be able to turn out finished articles by working the machines.

56. No. The smallest quantity which can be turned out by a factory to make it pay is in my opinion 500 gross a day.

57. Nearly 40 per cent. on plant and machinery.

58. (*a*) It is difficult to answer this question briefly. I have got all up-to-date machinery purchased from Germany in different years and I humbly invite the members to visit my place and see them and form their own opinion.

(*b*) They have been purchased by paying cash and by no special arrangement.

59. (*a*) My machinery and equipment are up-to-date and efficient and I am able to compete successfully with the foreign manufacturer on the present condition but I want some sort of protection against those foreigners who have established their factories in and around Calcutta and have come here with the ostensible purpose of killing these local industries.

(*b*) I do all the processes by machinery except some portion of filling the boxes with sticks, putting labels on the boxes and packeting.

60. (*b*) As soon as the unhealthy competition in the market ceases I will bring some more frames and box pasting machine to increase the output of my factory to 500 gross a day.

61. None.

Capital Account.

62. The block value is nearly rupees two lakhs and they are as follows:—

	Rs.
(*b*) Lands	44,445
(*c*) Building	20,000
(*d*) Plant and Machineries	80,000
(*e*) Other miscellaneous assets	40,000

63. Actual cost and no depreciation has been calculated and written off

64. Cannot say.

65. Cannot say.

66. 6th February 1924 . . . £15 at 1*s.* 4 $\frac{8}{177}$*d.*
4th September 1925 . . . £75 at 1*s.* 5 $\frac{3}{8}$*d.*
1st May 1925 . . . £185 at 1*s.* 5 $\frac{13}{16}$*d.*
16th July 1925 . . . £2-17-9 at 1*s.* 5 $\frac{13}{16}$*d.*
7th November 1926 . . . £21-4-6 at 1*s.* 5 $\frac{19}{32}$*d.*

67. In my case it does not arise.

68. In my case it does not arise.

69. In my case it does not arise.

70. In my case it does not arise.

71. In my case it does not arise.

72. In my case it does not arise.

73. In my case it does not arise.

74. A lakh of rupees will be necessary for the extension of the plant

Works cost.

75. The two forms have been filled and enclosed and they can be published.

76. Factory did not work in its full capacity.

77. Cannot supply any cost sheet as none has been preserved.

78. No.

Overhead charges.

79 to 93. No reply.

Claim for protection.

94. As regards claim for protection, I have stated my views fully in reply to the Press Communiqué, dated 29th November 1926, and I have submitted my views to the Secretary, Tariff Board, on 31st October 1926.

A. Industry possesses abundant supply of raw materials in the shape of wood, cheap power and a sufficient supply of labour and a large home market. The chemicals and papers will be manufactured in the country, if there is a regular demand for the same in the country.

B. It is known to everyone how many factories have been started in the country with Indian capital after this duty has been levied and if this protection continues for another 10 years then all these factories will be developed rapidly in the interest of the country.

C. I am morally sure that the industry will be in a position to hold its own against the world competition and will be in a position to export the excess matches abroad. I have stated my reasons fully in my statement submitted on 31st December 1926.

95. (*a*) I have shown in that increase in production will cause economy in production.

(*b*) It can be easily seen how many gross of matches are being turned out locally and in no distant future India will not import any of this article from abroad.

96. The principal raw material (wood) is available in this country.

97. (*a*) Re. 1-8-0 per gross.

(*b*) Cannot say.

98. The same as it is at present, *viz.*, Re. 1-8 per gross. The present selling price of Indian made matches is below Re. 1-8 per gross, and if the duty remains at Re. 1-8 then the foreign matches cannot be imported in the country.

99. The Swedish factory with American capital is out here to kill this industry of the country and then to sell their goods and derive enormous profit at the expense of consumer. The Japanese have started one or two factories with Japanese capital and they are selling at a credit in the market so not a gross can be sold in cash and no business with a limited capital like the Indians can flourish side by side amidst this unhealthy competition; so I request that a further duty of 8 to 12 annas per gross be levied on all the factories who are dependent on foreign capital and who have got some connection in one shape or other with the foreigners. I enclose herewith the cuttings from the "Times of India."

Form I.—Statement showing total expenditure on the production of matches during the last four years.

—	1925.	1926.
	Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers . . .	1,971 6 0	667 14 0
2. Cost of paper	334 0 11	219 9 0
3. Cost of chemicals	739 11 9	592 3 0
4 Cost of other raw materials	432 8 0	360 9 9
5. Factory labour	3,793 14 9	4,105 3 0
6. Power and fuel	1,476 14 9	863 6 3
7. Ordinary current repairs and maintenance of buildings, plant and machinery.	...	...
8. General services, supervision and local office charges.	500 0 0	500 0 0
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	178 12 0	178 12 0
10. Cost of packing cases . . .	...	216 4 0
Total production of matches .	5,000 gross	4,000 gross

Form II.—Statement showing works cost per gross of matches.

—	Cost per gross calculated from a production of 1,000 gross in one month.
	Rs. A. P.
1. Cost of wood for splints and veneers	0 2 4
2. Cost of paper	0 0 9
3. Cost of chemicals	0 1 6
4. Cost of other raw materials	0 1 0
5. Factory labour	0 6 3
6. Power and fuel	0 2 3
7. Ordinary current repairs and maintenance of buildings, plant and machinery.	...
8. General services, supervision and local office charges	...
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	...
10. Cost of packing cases	0 1 0

"TIMES OF INDIA."

Dated 13th March 1925.

When the grant for the Industries Department came up for discussion in the Bombay Legislative Council, the Minister-in-charge, Mr. B. V. Jadav, came in for severe criticism. Members, one after the other, accused the Minister of want of any knowledge in matters industrial, and a motion was brought forward for reducing the grant by a thousand rupees. Mr. Hoossanbhai A. Lalji, who is an enterprising businessman, emphatically declared that the Minister did not know anything about the match or any other industry. He revealed a very serious state of things for the match industry in India. There were, he said, four match factories in the Bombay Presidency, one of which at Ahmedabad was struggling for existence for the last twenty years. They were importing into Bombay the logs of wood required from Siberia, as it was found the steamer freight from Siberia to Bombay cost less than the railway freight on wood from Northern India to Bombay. This was not all. An American Syndicate with a capital of about two crores sterling had started a big factory at Ambarnath, near Bombay, and were going to build factories at Karachi, Calcutta and Rangoon, not with a view, he declared, to supply India's needs but for the purpose of killing the existing factories in India. This Syndicate, he said, had already taken in hand the match industries of Sweden, Czechoslovakia and China, though they failed to secure a footing in Japan owing to the Japanese Government's resistance. This American Match Trust, he added, had cornered a chemical most essential for match manufacture, which could not be bought except through this Syndicate. They were also offering higher wages to experienced Indian workmen from the existing match factories. He urged for intervention by the Government of India.

Enclosure No. 1.

Agreement, dated 10th March 1925.

AN AGREEMENT dated the Tenth day of March One thousand nine hundred and twenty-five made BETWEEN THE SECRETARY OF STATE FOR INDIA IN COUNCIL (hereinafter called " the Secretary of State ") of the one part and SAILENDRA NATH MITRA carrying on business as Managing Proprietor of the Tollygunge Match Factory in the city of Calcutta residing at No. 94, Bakulbagan Road, Calcutta (hereinafter called the " Firm " which expression where the context so admits or implies shall include his executors administrators and assigns) of the other part.

1. The Secretary of State with the object of providing for the manufacture in India of matches hereby grants to the Firm liberty to enter upon that portion of reserved forest situated in the Darjeeling District and known as Block II of Senchal Range of the Darjeeling Forest Division and shown in the plan hereto attached and to cut and remove therefrom all trees in the manner and upon the conditions hereinafter prescribed.

2. The Firm shall each year clear fell the annual coupe of the said Block which shall be laid out in advance by the Divisional Forest Officer, Darjeeling, in accordance with the prescriptions of the working plan at that time in force and shall work in a regular and systematic manner to the satisfaction of the Divisional Forest Officer, Darjeeling. In the event of a shortage of matchwood occurring in the coupe of the current year the Firm may with the permission of the Divisional Forest Officer, Darjeeling, in writing fell and remove such trees as may be marked for that purpose by the Divisional Forest Officer, Darjeeling, in the coupe of the subsequent year.

3. The Firm shall have the option of purchasing any timber and firewood marked in any " clear felling or selection felling or improvement felling or thinning " specified by the Divisional Forest Officer, Darjeeling, within the area of this concession but without the current annual coupe due notice of which requirement shall be given to the Firm in writing provided that if the Firm fail to inform the Divisional Forest Officer, Darjeeling, within three months of service of such notice of its willingness to purchase and further to remove such timber and firewood within twelve months the Divisional Forest Officer, Darjeeling, may dispose of such timber and firewood as he may think fit without further reference to the Firm.

4. The Firm shall fell all trees and cut all brushwood in the coupe or coupes from time to time specified by the Divisional Forest Officer, Darjeeling, as provided in clauses 2 and 3 work in which shall be undertaken by the Firm and shall fell everything as *close to the ground* as is practicable in the opinion of the Divisional Forest Officer, Darjeeling. The Firm may utilize all such timber matchwood and firewood as it thinks fit subject to the conditions of clause 5.

5. The Firm shall remove the timber obtained from all trees felled under this Agreement to a depôt or depôts the sites of such depôts to be determined by mutual agreement between the Conservator of Forests, Bengal, and the Firm. The Firm shall not remove the timber from such depôts or firewood from the coupe until it has been measured and passed by an Officer of the Forest Department who shall do so with all reasonable despatch and until royalty thereon has been paid by the Firm subject to the provisions of clause 10 hereafter. Except with the previous written permission of the Divisional Forest Officer, Darjeeling Division, no timber may be split squared or converted until it has been measured and passed for royalty. Matchwood will be measured on the cart as soon as extracted.

6. The Firm shall commence work within three months from the date of this Agreement and complete its Factory and have it in running order within two years from the date of this agreement failing which this agreement shall be null and void under the provisions of clause 16 hereafter. Provided that if in the interests of the Firm a factory should not be necessary in Senchal II it shall then lodge with the Divisional Forest Officer, Darjeeling a security deposit of the value of Rupees five thousand in lieu thereof.

7. The Firm shall pay to the Divisional Forest Officer, Darjeeling, for the construction of a cart-road within the Reserved Forest in continuation of the Simkuna Rangbi road on an alignment to be determined by mutual agreement between the Divisional Forest Officer, Darjeeling, and the Firm from Rangbi to Sonada or Tung railway station a sum not exceeding Rupees One thousand five hundred each year until the road is completed. The Divisional Forest Officer, Darjeeling, shall be at liberty to prohibit the passage of carts of the Firm over the whole or part of any road or roads within Reserved Forests at any time if for any reason he deem it necessary. Provided that all means of exit for carts from the area to the Railway is not closed for a period exceeding two weeks in every three months excepting during the months of July, August and September when the road will be closed to all cart traffic.

8. The Firm shall be entitled to such building stone road metal timber or other forest produce from reserved forest as it may require for the purpose of erecting buildings or aerial ropeways or constructing and maintaining roads necessary for its work royalty free. All forest produce required by the Firm shall be first selected and marked by a Forest Officer and the Firm shall not fell or remove any such produce which is not so selected and marked.

9. The Firm shall be allowed the free use of water from any stream within the reserved forest with the previous consent of the Divisional Forest Officer, Darjeeling, in writing provided that the use thereof is in no way prejudicial to any pre-established rights of any tea estate village or of any other persons and provided that the water habitually used by such persons be not polluted and that due precautions be taken by the Firm to prevent any water in any way polluted by its machinery or otherwise by its act from polluting any regular water-supply of any person and provided that the Firm undertake to make all dams tanks water channels and the like which may be necessary for the carrying out of its work in a secure and proper manner so as to minimize the risk of their causing landslips flood or soil erosion and that if in the opinion of the Divisional Forest Officer, Darjeeling, all proper precautions are not at any time being taken to effect any or all of the said purposes the Divisional Forest Officer, Darjeeling, may from time to time prohibit the use of such water by the Firm until such precautions shall have been taken and the Firm shall be bound by such prohibition.

Provided that nothing contained in this clause shall permit the Firm to do any act specified in sub-section (*b*) of section 76 of the Bengal Embankment Act, 1882 (Bengal Act II of 1882) without the previous permission of the Deputy Commissioner.

10. The Firm shall not erect any building nor clear sites for buildings or other purposes inside reserved forest without the previous consent of the Divisional Forest Officer, Darjeeling, in writing. For all such ground as is made available for such purposes as aforesaid ground rent at the rate of five rupees per acre per year shall be paid in advance by the Firm to the Secretary of State.

11. All wood extracted under this Agreement shall be classified as " timber " " matchwood " and " firewood " by an officer of the Forest Department.

For the purposes of this clause " timber " shall mean pieces of wood suitable for use otherwise than as fuel trees of girth exceeding 3′ at 4′ from the ground or logs exceeding 3′ in girth at 3′ from the thick end and " matchwood " shall mean pieces of wood which are *bonâ fide* intended for manufacture into match splints or match boxes and mentioned hereafter. " Firewood " shall mean pieces of wood not included in the description " timber " or " matchwood." The Firm shall pay royalty on all timber matchwood and firewood so classified at the following rates:—

Timber.

(*a*) Trees (girth exceeding 3 feet at 4 feet from the ground) or logs (girth exceeding 3 feet at 3 feet from the thick end). Rates vary according to localities and according to special and these are arranged as follows:—

Localities.

I. Singalila Range, except locality II.

II. The areas of Little Rangit and Tonglu closed to grazing.

III. Sambong, Pashok, Mangwa, Sim and Sureil.

IV. Mim 3, 4 and 5, Nagri 1, 4 and 5, Tasiding 3 and 4, Takdah, Takdah Cantonment Forests, Senchal 2, Bara Senchal, Chatakpur and Senchal 1 (*c*) (coupes 7 to 10).

V. Senchal 1 (*b*), Senchal 4 above old Military Road, Senchal 3 (South of Kalikhola), Posambing 1 to 4, Mim 1 and 2, Nagri 2 and 3, Tasiding 2, Jorpokri, Dungdungia, Riang and Badamtam.

VI. Soom, Patlaybas, Senchal 1 (*a*), Senchal 1 (*c*) (coupes 1 to 6), Senchal 3 (North of Kalikhola), Senchal 4 below old Military Road, Senchal 5, Senchal Pasture, Tasiding 1 and 5 and Posambing 5.

Species.

A. Safed Champ, Onlia Champ, Pipli, Toon (*Cedrela microcarpa*), Haluri Toon (*Cedrela toona*), Walnut and Malagiri.

B. Buk, Phalat, Sungre Katus, Katus, Sampati, Dudleay Sampati (*Artocarpus chaplasha*) and Angare.

C. Paieli, Onlia Sali, Kawla, Sepcha Kawla, Dar, Maya, Kimbu, Arupate, Kainjal, Kala Siris, Gambari, Panisaj and Chickrassi.

D. Phusre Champ, Tite Champ, Ghoghay Champ (*Cryptomeria*), Gobre, Dabdabe, Sisi, Chilauni Ulis, Chinde, Bhadrashi, Simul, Kadam, Sauer, Malatta Kappasi, Gokuldhup, Mowa, Maina Kat, Madani, Lapshi, Lisse, Pakasaj and all other oaks and chestnuts, except those mentioned under " B ".

E. All other species.

Minimum rates per cubic foot of timber in the logs.

Locality.	Species.					Remarks.
	A.	B.	C.	D.	E.	
	A. P.	A. P.	A. P.	A. P.	A. P.	
I . . .	3 0	2 0	1 6	0 6	0 3	Simul from Pashok and Mangwa, annas 3 per cubic foot.
II . . .	5 0	3 0	2 0	1 6	0 6	
III . . .	7 0	4 0	3 0	2 0	1 0	
IV . . .	8 0	6 0	4 0	2 6	1 6	
V . . .	9 0	7 0	5 0	3 0	2 0	Sampati and Dudhay Sampati from Riang and Badamtam, annas 5 per cubic foot.
VI . . .	10 0	8 0	6 0	3 6	2 6	

Sal timber in Tista and Ranjit Valleys.

	Rs. A.	
Badamtam and Riang	1 0	per cubic foot.
Sambong, Mangwa and Pashok . . .	0 14	

Note.—(*a*) A reduction of annas 4 per c.ft. may be made for sal trees 4′ 6″ and under in girth at the discretion of the Divisional Forest Officer.

(*b*) Trees (girth not exceeding 3 feet at 4 feet from the ground) or poles (girth not exceeding 3 feet at 3 feet from the thick end).

Minimum rates per pole.

Locality.	Girth Measurements.			Species.
	Up to 12″.	Over 12″ to 24″.	Over 24″ to 36″.	
	Rs. A. P.	Rs. A. P.	Rs. A. P.	
Rangit and Tista Valleys	0 4 0	1 0 0	2 0 0	Sal.
	0 1 0	0 3 0	0 6 0	Other species.
Other forests	0 2 0	0 6 0	0 12 0	All species.

Note.—Special rates to graziers under rule 7 of the Darjeeling Division Grazing Rules, annas 4 per tree of less valuable kinds and under 18″ in girth for construction and repairs of bathoms (dry fallen wood free).

Firewood.

Minimum rates per 100 c.ft. stacked.

Locality.	Oaks.	Mixed.	Soft woods.
	Rs. A.	Rs. A.	Rs. A.
Singalila Range except the areas of Tonglu and Little Rangit closed to grazing.	1 8	1 0	0 8
The areas of Tonglu and Rangit closed to grazing.	2 0	1 8	1 0
Senchal 2, Bara Senchal, Chatakpur, Takdah 3 and 4, and Takdah Cantonment Forest.	4 0	3 0	2 0
Senchal 3 (South of Kalikhola), Mim 3 to 5 and Nagri 1, 4 and 5.	4 8	3 8	2 8
Tasiding 3 and 4, Jorpokri, Takdah 5, Nagri 2 and 3 and Mim 1 and 2.	5 0	4 0	3 0
Senchal Pasture, Senchal 1 (below cart road), Senchal 4, Posambing 1 to 4, Dungdungia and Tasiding 2.	5 8	4 8	3 8
Soom, Patlaybas, Senchal 1 (above cart road), Senchal 5, Senchal 3 (North of Kalikhola), Tasiding 1 and 5 and Posambing 5.	6 0	5 8	5 0

Locality.	Sal.	Mixed.	Soft woods.
	Rs. A.	Rs. A.	Rs. A.
Rangit and Tista Valleys Sim	2 0	1 8	1 0
Geille Coppice and Badamtam	2 8	2 0	1 8
Riang, Mangwa, Pashok and Sambong	2 0	1 4	0 8

Sungre Katus (an oak) will be charged as oak charcoal burning and as soft wood for split firewood billets.

"Mixed" firewood may not consist of more than one half oak or sal. Firewood to be used for a making charcoal is assessed on stacked measure in the kiln before burning.

Dry sticks including dry fallen wood and the branch wood of felled trees unsuitable for use as poles, of 3 inches in diameter or less, to be collected without the use of any cutting implement, are sold on the following terms:—

Locality.	Per Cooly load.	Monthly permit for one cooly load daily.	Tea Garden Coolies.
	As.	Rs. A.	
Senchal 1 and 3 (above cart Road), Senchal 5, Senchal Pasture, Tas'ding 1 and 5 Posambing, Soom and Patlaybas.	2	3 0	Annas 4 per acre under ten.
The rest of Senchal, Tasiding, Mim Nagri and Takdah.	2	2 0	
Rangit, Tista Valley and Singalila	1	1 0	

General Note.—The above prices for timber and firewood are fixed on the assumption that purchasers will bear the cost of cutting, collection and removal. When trees are felled at the cost of the Forest Department, the following additional charges may be levied:—

For each tree, of which the whole or part is sold for timber . . . . . Annas 6 to Rupee 1.

For each 100 cubic feet of stacked firewood . Rupees 2.

Bamboos.

Locality (range).	Choya Bans.	Mal.	Bans.	Small kinds.	
	Per 100.	Per 100.	Small lots.	Per 100.	Small lots.
	Rs. A.	Rs.		As.	
Soom and Patlaybas . .	12 8	...	...	8	1 anna per ten.
Singalila	...	...	..	4	
Tista Valley	2 0	3	6 pies each	6	1 pie each.
Others	...	..	...	8	1 anna per ten.

Bamboo off-shoots at Re. 1 per 100 in Senchal and Ghoompahar Ranges. Special permits for making mats, baskets, ghooms, etc., in the forests may be granted at the following rates:—

I. For the Little Rangit, Tonglu, Rilling and south Rimbick Blocks of the Singalila Forest at Re. 1-8 per man per month.

II. For the other blocks in the Singalila Forest at Re. 1 per man per month.

Notes.—Under rule 7 of the Darjeeling Division Grazing Rules, graziers are allowed bamboos and canes free of charge (on permit from Range Officer) for construction and repairs of bathoms.

Provided that the Firm shall not be required to pay royalty for a period of five years from the date of this Agreement on matchwood of the following species:—

Acer Campbelli . . .	Kapasi.
Acer sikkimense . . .	Labara Kapasi.
Alnus nepaleusis . . .	Utis.
Caseari glomerata . .	Barkholi.
Echinocarpus Dasycarpus .	Gobre.
Elaeocarpus lanceaclolius .	Bhadrasi.
Engelhardtia spicata . .	Mohua.
Eciobotrya petioalta . .	Maya.
Evodia fraxiuifolia . .	Kanakpa.
Lindera pulcherrina . .	Sisi.
Lindera assamica . .	Paielli.
Litsoea elongata . .	
Macaranga spp. . . .	Mallata.
Macropanax undulatum .	Chinde.
Michelia Campbelli . .	Ghogay champ.
Erithoyna indica . . .	Phalida.
Ostodes paniculata . .	Bepari.
Symplocos spp. . .	Kholme. Kharain.
Leucosceptuum canum .	Gurupis.
Eurya spp.	Jhingui.

And provided that the Firm will be allowed a royalty free allowance of firewood of 50 c.ft. per person per mensem for a staff of fifteen persons only. At the expiration of the first five years of the said term the rates shall be fixed by the Government of Bengal from time to time. Such rates shall not exceed the Schedule rates fixed for residents of the Darjeeling district at the time on timber and firewood of species of similar classes and in the same localities.

12. The Firm shall provide every person employed by it in the cutting and collection of timber and firewood with a suitable badge for the purpose of identification.

13. The Firm shall abide by and observe the Forest rules in force for the time being in the locality and should there be any neglect of the said rules by the Firm or by any of its employees the Divisional Forest Officer, Darjeeling, shall have power at once to suspend for such time as he shall think fit the work of the Firm or its employees in any such locality. The Firm shall not employ any person in any of the areas allotted under this Agreement who in the opinion of the Divisional Forest Officer, Darjeeling, is not a fit and proper person to be so employed.

14. Officers of the Forest Department in the discharge of their duties shall have at all times free access to the premises, factories, depôts and godowns erected and maintained in pursuance of this Agreement.

15. This Agreement shall subject as in clause 16 mentioned remain in force for a period of thirty years from the date hereof, *i.e.*, up to the Ninth day of March one thousand nine hundred and fifty-five.

16. The Firm may before the expiration of the said period terminate this Agreement on the thirty-first day of March in any year by giving notice to that effect in writing to the Conservator of Forests, Bengal, on or before the first day of April of the year previous to that in which they desire to so terminate this Agreement.

17. In the event of the Firm failing to comply with any of the terms of this Agreement or in the event of the Firm not at any time carrying on the business of manufacturing matches or in the event of the Firm becoming insolvent or in the event of this Agreement being assigned to a Company and such Company going into liquidation it shall be lawful for the Secretary of State by notice in writing to the Firm under the hand of Secretary of the Government of Bengal in the Revenue Department to terminate this Agree-

ment at any time without prejudice to any other right or remedy of the Secretary of State hereunder.

18. In the event of this Agreement being terminated under clause 16 or on the expiration of this Agreement on the ninth day of March one thousand nine hundred and fifty-five the Firm shall be entitled to remove within six months all machinery and other stores, tools and plant, buildings and timber, matchwood and firewood on which royalty has been paid in full. It shall also be entitled to remove within six months such timber and other forest produce with the exception of road metal obtained under clauses 7 and 8 of this Agreement on payment of the full Schedule rates thereof. On the expiry of the said period of six months it shall be lawful for the Secretary of State to appropriate such machinery, stores, tools and plant, buildings, timber, matchwood and firewood as may remain in the said area or depôts or godowns without payment of any compensation to the Firm and such machinery and other property moveable and immoveable, shall become the property of the Secretary of State.

19. In the event of this Agreement being terminated under clause 17 it shall be lawful for the Secretary of State to appropriate such machinery, stores, tools and plant, buildings, timber, matchwood and firewood as may in his opinion be necessary to cover loss and damage incurred by him and for which the Firm shall be liable and to dispose of the same as his own property.

20. On the expiry of the period specified in clause 15 above the Firm shall have the option of a renewal of this concession upon such similar terms as may then be agreed upon and for a further period of thirty years.

21. The rights of the Firm under this Agreement shall not be assigned transferred or disposed of to any other party without the previous sanction in writing of the Secretary of State under the hand of the Secretary to the Government of Bengal in the Revenue Department. If the Firm becomes Limited Liability Company sanction will not be withheld.

22. In the event of any dispute arising with regard to the terms of these presents or the construction of meaning thereof or of any part thereof or as to the performance of any act thereby required to be done or as to any other matter or thing in connection therewith the decision of the Governor of Bengal in Council upon the matter of such dispute shall be final and binding upon the parties hereto.

IN WITNESS whereof the Secretary to the Government of Bengal in the Revenue Department for and on behalf of His Excellency the Governor of Bengal in Council acting in the premises for and on behalf of the Secretary of State for India in Council has hereunto set his hand and seal and the said Sailendra Nath Mitra has hereunto set his hand and seal the day and year first above written.

Signed sealed and delivered by the Secretary to the Government of Bengal in the Revenue Department for and on behalf of His Excellency the Governor of Bengal in Council acting in the premises for and on behalf of the Secretary of State for India in Council in the presence of. } (Sd.) W. S. HOPKYNS.

Witness:

S. S. LATIF,

Asst. Secy., Revenue Dept.

Signed sealed and delivered by the abovenamed Sailendra Nath Mitra in the presence of } (Sd.) SAILENDRA NATH MITRA.

(Sd.) SUDHINDRA NATH MUKERJEE,
Pleader, Judge's Court, Alipore,
24, Pudda Puker Road,
Bhowanipore, Calcutta.

Enclosure No. 2.

Agreement, dated 22nd December 1926.

AGREEMENT made this 22nd day of December one thousand nine hundred and twenty-six between the Divisional Forest Officer, Darjeeling Division (hereinafter called the Forest Officer) and Mr. Sailendra Nath Mitra of 94, Bokul Bagan Road, Calcutta (hereinafter called THE CONTRACTOR) to work in the coupe of 1928-29 of Senchal 2 of the Darjeeling Division for matchwood.

WHEREAS the Forest Officer undertakes:—

(*i*) to lay out the Annual Coupe of 1928-29,

(*ii*) to mark the trees therein with the Forest Department marking hammer,

(*iii*) to sell the trees of the following species available therein to the contractor at 1 anna per c.ft.

1. Sisi.
2. Kharani.
3. Kapasi.
4. Khanakpa.
5. Chinde.
6. Ghogay Champ.

(*iv*) to supply to the contractor the impression of the marking hammer and the list of trees mentioned in (*iii*) above before the 28th of February 1927,

(*v*) to allow them to be felled, converted and extracted by the contractor before the 31st day of December 1927,

(*vi*) to sale mark the trees after the royalty is paid.

The said contractor hereby agrees so to supervise and direct the work of all coolies, workmen and servants employed by or under him that no unnecessary damage shall be done in the said Government Reserved Forests and in particular the said contractor undertakes to see that no unmarked tree and no portion thereof, and no marked tree and no portion thereof other than the marked trees above specified in clause (*iii*) above as allotted to him and made over to the contractor shall be felled, cut, converted or removed.

2. The contractor further undertakes that no portion of sawn timber shall be removed from the site of sawing until it shall have been marked with the Government sale mark.

3. The contractor specifically undertakes that no part of the outturn of the trees specified in the schedule shall be disposed of in any other manner than for the sole use of manufacturing match sticks or boxes for which only the said trees have been supplied at this rate.

4. If as a consequence of any neglect on his part to control and direct the work of all the coolies, workmen and servants employed by or under him any unmarked tree or any marked tree not specified in the schedule hereto as shown and made over to the said contractor be felled, cut, converted or removed by any of the said coolies, workmen and servants he the said contractor shall be liable to prosecution together with any or all of the said coolies, workmen or servants who may actually have felled, cut, converted or removed in contravention of section 25 of the Indian Forest Act, VII of 1878, any such unmarked tree or such marked tree as shall not have been allotted to him or any portion thereof respectively.

5. The contractor has deposited a sum of Rs. 250 (two hundred and fifty) as security for due observance and fulfilment of all the conditions of this agreement which sum or any part thereof shall be liable to forfeiture if any breach of these conditions is committed which forfeiture shall not debar the Divisional Forest Officer from taking criminal proceedings also as he may deem fit.

6. The cost of the stamp, if any, on this agreement shall be borne by Government.

IN WITNESS WHEREOF the parties aforesaid have hereunto set their hand and seal.

Enclosure No. 3.

26th November 1925.

To

The Revenue Secretary,

Government of Bengal.

Sir,

With reference to the Agreement, dated the 10th March 1925, regarding Senchal II Forest having an area of nearly 1,200 acres of which 40 acres nearly to be felled every year, I have the honour to make the following representations as a result of my recent visit to the place.

It has been agreed that I should pay a sum of Rs. 1,500 a year in lieu of royalty for the extraction of matchwood from an area of about 40 acres every year. It has been found from the valuation of 3 lots with a total measurement of 16 acres made by the Local Ranger that only 4,631 c.ft. of matchwood would be available for extraction. At this rate, 40 acres would yield 11,577 c.ft. which at the rate which they are sold to the public, *viz.*, at Rs. 2 per 100 c.ft. works out at Rs. 231 against which I would have to pay Rs. 1,500 yearly thereby causing a loss to me of Rs. 1,269 every year.

On the above basis, I have been asked to deposit with the Conservator of Forests a sum of Rs. 5,000 according to paragraph 6 of the agreement in case I do not erect a factory at Darjeeling after two years.

As Senchal II is situated far away into the forest and as the expenses of labour and carting run high, it would be difficult for me to complete with local contractors who work at more advantageous localities the following table will show: —

——	Royalty per c.ft.	Cutting and carrying charge to Darjeeling per c.ft.	Cost per c.ft.	Selling price per c.ft.
	As.	Rs. A. P.	Rs. A. P.	Rs. A. P.
Chap	8	0 12 6	1 4 6	2 0 0
Pipli	8	0 12 6	1 4 6	1 3 0
Bup Phalat Kalus .	6	0 12 6	1 6 6	1 3 0
Kowlaw Lalli . . .	4	0 12 6	1 0 6	1 1 0

Charcoal.

13 bags of charcoal—130 c.ft. of wood.

	Rs. A. P.
Royalty at Rs. 2 per c.ft.	2 12 0
Cutting	5 8 0
Carrying to Sisis Kusa	4 0 0
Cart hire to Darjeeling	4 0 0
	14 4 0

Selling price at Darjeeling varies from Rs. 14 to Rs. 16. Rs. 14 in the off season from November to March and Rs. 16 from April to October.

It may be mentioned that felling in Senchal II is backward on account of its inaccessibility.

According to paragraph 5 of the agreement, I shall remove the timber from all trees felled under this agreement to a depôt or depôts and the measurements are to be made by the Forest Officer but from the contractors I learn that it is impossible for me to remove those trees to the depôts before they are sawed. But they are to be sawn at the place of felling, and also charcoal has to be made inside the forest from the firewood. Hence, the standing trees are to be estimated according to the current forest rules.

Under the circumstances I humbly beg that you may be pleased to grant me the following prayers:—

(1) That I shall be exempted from paying Rs. 1,000 a year and be allowed to pay the actual royalty for the matchwood which I will extract.

(2) That I shall be exempted from paying the security deposit of Rs. 5,000 mentioned in paragraph 6 of the agreement.

(3) That the royalty be lowered for (1) Pipli from 8 annas to 6 annas, (2) Buk, Phalat and Katus from 6 annas to 4 annas and (3) Kowla from 4 annas to 2 annas per c.ft. and for firewood (*a*) hardwood from Rs. 4 to Rs. 3-8, and (*b*) soft wood from Rs. 2 to Re. 1-8 per 100 c.ft.

(4) That standing trees are to be estimated according to the current forest rules and that the depôts mentioned in paragraph 5 of the agreement be omitted.

(5) That in case the Government are not willing to reduce the annual royalty for other timbers and firewood, I would be permitted to extract only matchwood by selection felling, that is to say, felling those trees which are suitable for matches by my own agency and taking from me the royalty at the current rate. This is to continue for 20 years until plantations suitable for matchwood are ready.

(6) That pending the disposal of this representation, I may be exempted from paying Rs. 1,500 which will fall due in March 1926.

I have the honour to be,

SIR,

Your most obedient servant,

(Sd.) SAILENDRANATH MITRA.

Enclosure No. 4.

GOVERNMENT OF BENGAL.
REVENUE DEPARTMENT.
FOREST BRANCH.
No. 227-T. R.

From

W. S. HOPKYNS, Esq., O.B.E., I.C.S.,
Secretary to the Government of Bengal,

To

Babu SAILENDRA NATH MITRA,
94, Bokulbagan Road, Calcutta.

Darjeeling, the 15th May 1926.

SIR,

I am directed to refer to your letter of the 20th March.

Government do not propose to make any claim against you for damage or compensation on account of the cancellation of the lease.

With reference to the question of rates, it appears that under the present scheduled rates, part of the wood which you would require for the manufactory of matches would be classed as timber and part of firewood. As this would probably cause inconvenience to you as well as to the Forest Officers, the Conservator of Forests has arranged that there shall be a separate rate for matchwood taken from Senchal Block II; he has fixed this for the present at one anna per cubic foot, and matchwood is defined as "pieces of wood of species classed "D" and "E" which are *bonâ fide* intended for conversion into match splints and match boxes." If you remove timber or firewood not covered by this definition, you will be charged for them at the ordinary scheduled rates; but if you take only the matchwood, then any timber or firewood left by you will be sold by the Forest Officer to other persons.

A copy of this letter is being sent to the Conservator of Forests, to whom any further communication should be addressed.

I have the honour to be,
SIR,
Your most obedient servant,

(Sd.) W. S. HOPKYNS,
Secretary to the Government of Bengal

Enclosure No. 5.

GOVERNMENT OF BENGAL.
REVENUE DEPARTMENT.
FOREST BRANCH.
No. 285-T. R.

From

W. S. HOPKYNS, Esq., O.B.E., I.C.S.,
Secretary to the Government of Bengal,

To

Babu SAILENDRA NATH MITRA,
94, Bokulbagan Road, Calcutta.

Darjeeling, the 26th May 1926.

SIR,

I am directed to refer to your letter of the 20th May 1926, in which you agree to the cancellation of the lease, dated the 10th March 1925. The Conservator of Forests is being informed that the lease is cancelled.

I think that you must be mistaken in stating that I asked the Divisional Forest Officer to charge firewood rates for the wood which you require. I do not remember making any such request to him and my letter No. 3136 of the 19th March 1926 shows that it was agreed that royalty should be paid at the ordinary scheduled rates. If you are unable to pay the rate of one anna per cubic foot, the proposed arrangement for the supply to you of matchwood must be dropped. As requested in my letter of the 15th May, any further communication which you may wish to make on this matter should be addressed to the Conservator of Forests and not to me.

I have the honour to be,
SIR,
Your most obedient servant,

(Sd.) W. S. HOPKYNS,
Secretary to the Government of Bengal.

Enclosure No. 6.

8th January 1927.

To

The Divisional Forest Officer,
Darjeeling Division,
Darjeeling.

SIR,

I have the honour to acknowledge the receipt of your letter No. 1349—17-7 of the 21st ultimo last enclosing two copies of the agreement. I am willing to deposit Rs. 250 as you have stated in your letter but I would request you to consider the clauses 3, 4 and 5 and to modify them as I am suggesting below: -

Clause 3.—As all the portions of the trees will not be required for match sticks and boxes such as the branches and the portions which are with knots or which may be hollow so I will be permitted to sell them locally to the persons who will require them for making charcoal and fuel.

Clause 4.—That if any of my agents fell any trees which are not marked for me then I will be liable to pay to the Forest Department the price of the said tree and the Forest Department may prosecute the coolies, workmen or servants of mine criminally under section 25 of the Indian Forest Act, 7 of 1878, for in that case I can realise by fines the price which I will have to pay to the Forest Department.

Clause 5.—The whole of the security money may be forfeited if the price of such trees felled amounts to that amount and the Forest Officer shall not take any criminal proceedings against me for I will be far away in Calcutta when this felling will be done and I cannot be made responsible criminally for this.

Kindly modify these three clauses accordingly and send them to me and I will duly execute it and send the same back to you with Rs. 250.

In the last paragraph of my letter of the 2nd ultimo I requested to send me two pieces each 18" long and 3' or 4' in girth of the following species and if they are found to be suitable for matchsticks or boxes then kindly include them in the Agreement and they are to be marked as well with the other six kinds.

1. Bhadrasi.
2. Maya.
3. Jhingi.
4. Barkholi.
5. Gobra.
6. Mallata.

I have the honour to be,

SIR,

Your most obedient servant,

(Sd.) SAILENDRANATH MITRA.

Enclosure No. 7.

GOVERNMENT OF BENGAL,
OFFICE of D. F. O., DARJEELING DIVISION.
FOREST DEPARTMENT,
No. 92—17-12.

From

S. CHAUDHURI, Esq.
Divisional Forest Officer,
Darjeeling Division,

To

Mr. SAILENDRA NATH MITRA,
94, Bakulbagan Road, Calcutta.

Dated 19th/20th January 1927.

SIR,

With reference to your letter No. *Nil*, dated the 8th instant, received in this office on the 13th instant I have the honour to send herewith the draft agreement in duplicate after modifying clause 3 to enable you to dispose off parts not suitable for matchwood as fuel or charcoal. As it will not be paying for you to buy parts at 1 anna a c.ft. and sell them as fuel item (iii) of clause 1 and line 2 of clause 2, have been modified according to the current schedule of rates of this Division.

Referring your objections about clauses 4 and 5 please note all contractors of this Division have been working on those terms for all kinds of forest produce and they cannot be modified in your case.

As for your request to send certain pieces for experiment please inform if you are prepared to pay the royalty at the rate of 5 annas per c.ft. for Maya and 3 annas per c.ft. for others and the cost of conversion and extraction up to the nearest railway station, say, at 5 annas a c.ft. I shall only charge for parts despatched to you and not for the whole tree as it is for experiment. I do not think it will be advantageous to either side to include these six species in the list for the current year.

Please note further that unless the security is deposited before the 31st of the current month and the agreement executed, it will not be possible to mark the area and submit the list of available trees within the 28th of February 1927.

I have the honour to be,
SIR,
Your most obedient servant,

(Sd.) S. CHAUDHURI,
Divisional Forest Officer,
Darjeeling Division

6th February 1927.

Enclosure No. 8.

To

The Divisional Forest Officer,
Darjeeling Division,
Darjeeling.

Mr,

I have the honour to acknowledge the receipt of your letter No. 92—17-12 of the 20th ultimo enclosing a modified agreement which reached me on the 24th, because I am now staying in the interior of the Midnapur District and hence the delay in my answering your letter.

I beg to point out that the entire Senchal II Forest was leased out to me by the Government of Bengal but when the annual coupe of 40 acres was marked then it was found that the species required for matchwood are very small and I pointed this out to Mr. Hopkins, the Secretary, Revenue Department of the Government of Bengal, and also other facts on the subject and he has very kindly asked me to give up the lease and ask the Divisional Forest Officer to allow me to fell the species which I want for match sticks and boxes from the whole of the Darjeeling Division Forest and which will be sold in the next year and which as far as I remember will be nearly 150 acres or more. Kindly put the same in the top of the agreement.

As regards the paragraph III of the agreement I beg to suggest that I will only pay one anna per cubic foot of the portion of the trees which I will take out and the remaining portion which will be unsuitable for my purpose will be left in the forest and the Forest Department will sell them.

As regards paragraph IV, I beg to suggest that you shall not classify me in the same class of contractors who fell your forest for the purpose of making money by felling the timber and selling them in the locality. So kindly omit that clause about prosecuting me if my people fell any other trees than which are marked for me.

I am willing to pay the royalty and cooly hire which the Forest Department will incur for sending the sample of the six species mentioned in my previous letter. Kindly arrange to mark them distinctly and send them with bark on and the ends covered with cowdung or mud by Goods Train to Kalighat Station, Eastern Bengal Railway, and in the letter which will enclose the Railway Receipt the names of species will be mentioned against each number and enclose your Bill for this and the price will be sent by Money Order.

I am at present staying in the interior of the Midnapur District and will return to Calcutta by the middle of this month, so you will kindly excuse me for the delay in sending you the amount and executing the agreement.

I have the honour to be,
Sir,
Your most obedient servant,

(Sd.) SAILENDRA NATH MITRA

Enclosure No. 9.

GOVERNMENT OF BENGAL.
OFFICE OF THE DIVISIONAL FOREST OFFICER,
DARJEELING DIVISION.
FOREST DEPARTMENT.
No. 258—17-12.

Dated the 17th February 1927.

To

MR. SAILENDRA NATH MITRA,
94, Bakulbagan Road, Calcutta.

Memorandum.

Your letter, dated the 6th February 1927.

Reference.—Paragraphs 1 to 4 and 6 no further consideration can be made; and in case you propose to work you will please send the security money and the agreement without further delay.

Reference.—Paragraph 5, the specimen will be despatched when ready.

(Sd.) S. CHAUDHURI,
Divisional Forest Officer,
Darjeeling Division.

Mr. M. N. Mehta's Factory, Calcutta.

(1) *Letter dated the 19th April 1927.*

In reply to your letter we herein enclose 6 copies duly replied to all the questions and shall be pleased to give our evidence before your Board whenever we are called for.

The following are the replies of the Match Industry questionnaire :—

1. The firm of M. N. Mehta was established in the year 1879 by Mr M. N. Mehta in person. The firm is a private one and a registered one.

2. Rs. 5,00,000. Doing business in partnership. All are Indians (Parsees). Not a single European is employed by us.

3. We manufacture the whole process of matches at our plant.

4. The match factory was started on the 15th November 1925.

5. The full capacity of our daily output is 2,500 gross for the manufacture of complete matches and boxes.

6. The dimensions of the match boxes, half size are $1\frac{3}{4} \times 1\frac{1}{4} \times \frac{8}{10}$, and for the full size $2\frac{1}{2} \times \frac{13}{8} \times \frac{1}{8}$. The half size boxes contain 60 to 70 sticks and the full size 80 to 90.

7. The actual output of our firm in the year 1925-26 was 6,000 cases or 3 lakhs gross.

8. Our factory is situated at Nos. 104 and 80, Ultadingi Main Road, and we find advantageous under the items (*a*) Yes; (*b*) Yes; (*c*) Yes; and (*d*) Yes. We consider the most important factor in selecting the site of a match factory is the place where abundant matchwood and labour are available, together with transport facilities.

9. (*a*) Yes. Indian matches fall short of the standard of imported matches, owing to inferior quality of local wood used at present, and the second cause is that the industry is in its infancy.

(*b*) There is a prejudice against Indian-made matches for the present, owing to the importation of Japanese and Swedish matches. They are gaining in reputation in the market up till now. The Indian matches in comparison to two years before were inferior, but since the last two years all Indian match factories have been manufacturing matches under expert directions, and hence there remains a likelihood to overcome the prejudice.

(*c*) We consider the difference of Re. 1-6-0 to Re. 1-8-0 in price per gross to be sufficient to overcome the prejudice against Indian matches.

Raw materials.

10. (*a*) Yes. A portion from Siberia for keeping the standard of the quality with imported matches.

(*b*) No.

10. (*c*) No.

(1) C.i.f. price per ton is £9.

(2) Kobe.

(3) Do not know.

(4) Rs. 6 per ton.

(5) Rs. 4 per ton.

(6) 15 per cent.

11. Genanwa.

12. The local wood is not as satisfactory as the imported Aspen. It is inferior in respect of colour and slightly in strength.

We understand that best Indian wood is available, but on account of the heavy transfer charges, the business in Indian wood falls off.

(*a*) No.

(*b*) Yes.

(*c*) No.

13. (*a*) The annual requirement of wood according to the present rate of output is 6,000 logs of Espen wood for making sticks.

(*b*) According to the rate of output equivalent to the full capacity of the plant, it should be 10,000 logs. With the above we buy local Genanwa and Jury woods for making boxes and splints. Monthly about 10,000 logs.

14. The quantity of wood required for the manufacture of 100 gross boxes of finished matches for sticks 12½ cubic feet of Aspen and for boxes 35 cubic feet.

15. The standard size of the packing case, full size is $40'' \times 26'' \times 27''$, and for half size $36'' \times 31'' \times 20''$, and the quantity required we do not know. 50 gross boxes can be packed for full size and 100 gross for half size.

16. We buy the local wood from the canal situated very near our factory where the same comes in boats from the Sunderbands. We regret we are unable to produce a map showing the site of the factory and the areas from which supplies are drawn.

17. We have no connection with agencies.

18. We do not pay anything as we simply buy.

19. As we do not extract the wood ourselves we are unable to answer the questions.

20. Same reply as above.

21. The local wood has been found to contain deterioration sometimes, but otherwise the supply has been O. K. The supply up to the present moment has been constant.

22. As the supply has been found at present to be constant and boats always ready, we have always been able to get our supplies without seeking greater distances.

(*a*), (*b*), (*c*) and (*d*) do not require answers.

23. Till late we have found unnecessary to draw supplies from new areas

24. The factory is short of its sufficient supply of suitable wood and no steps have been taken to plant trees suitable for the match making industry within a reasonable distance of our factory.

25. We have not yet extracted any wood.

Other raw materials.

26. Raw materials other than wood are:—

Chlorate of Potash, Emorphos Phosphorus, Glue, Zinc sheets, manganese, Rosin and Paraffin.

27. Chlorate of Potash	12 lbs.
Flour sulphur	1 lb. 6 oz.
Glass powder	3 lbs.
Manganese	2 ,,
Rosin	1 lb.

28. (*a*) All those stated in question 26 are imported from abroad.

(*b*) Paraffin wax from India.

(*c*) We do not manufacture.

29. Manufactured in India:—

Chlorate of Potash, Manganese oxide, Antimony-sulphide black.

Labour.

30. We are not extracting.

31. It is necessary to some extent to get skilled labour from abroad, as the match industry is in its infancy. We have 5 experts at present.

32. About 6 imported labourers.

33. The Indian workmen are being trained under skilled Japanese experts and are thereby conversant with the machines for the match manufacture.

34. The total number of Indian labourers employed by us are about 600: 150 women, 200 boys and 250 men, and the average daily wages come to about Re. 1-8-0 a day.

35. Yes. All the workmen are drawn from the vicinity of the factory.

36. Yes. The Indian labourers all seem to be improving with the training. Owing to the lack of proficiency, the output was less when the plant's capacity was much more, but now by experience we are able to cope with the desired output as per the plant.

37. No arrangements have been made for the housing of our labourers except the skilled workmen from Japan whereas all the Indian labourers being of the near vicinity live in their own houses.

Power.

38. All by electricity.

39. From the Calcutta Electric Supply Corporation. The cost per unit is 2 pice, *plus* Rs. 5-4-0 per killowatt.

We do not know the cost of comparison between India and other countries.

40. We use no steam and hence we have no necessity of fuel.

41. One unit produces 18 gross of matches.

42 and 43. Cannot answer. No arrangement of steam.

Market.

44. In India consumption of about 20 millions gross boxes per year, out of which Bengal alone consumes 6 millions gross boxes per year.

45. The demand for the matches will be the same.

46. Our chief market is the whole province of Bengal.

47. We are in port.

48. (*a*) Large importation of foreign matches in all the markets of India is from Sweden.

(*b*) Yes. We have reason to suppose that there is illicit importation of foreign matches in India. Many Native States such as Jamnagar, Porbandar and other places, without paying the duty as is paid in British India, could successfully compete with Indian markets.

Competition.

49. From Japan and Sweden.

50. Even with the existing duty the foreign made matches are still being imported owing to the prejudice for local matches, but in years to come, we are of opinion that we can stand on our own.

51. (1) The price at which imported matches entered the country in the year 1925-26 was Rs. 2-6-0 per gross and sold at Rs. 2-10-0 and Rs. 2-12-0.

(2) We established in 1925 and we are not using the Indian wood for splints, but at present we make them out of the Indian wood. We realise about Re. 1-8-0 per gross for Genwa.

(3) The price realised from matches manufactured from imported wood when we established was Re. 1-15-0 and Re. 1-13-0. The c.i.f. price for imported matches comes to about annas 14 to Re. 1, on which, if the landing and duty be added, it works out to about Rs. 2-6-0 to Rs. 2-8-0 per gross.

52. From local merchants.

53. (*a*) Yes.

(*b*) No.

(*c*) Yes. From our Japan friends.

54. (*a*) Yes.

(*b*) Yes.

(*c*) Much higher.

(*d*) As regards costs, it is higher on account of unskilled labour.

(*e*) Much higher.

(*f*) Same.

(*g*) We import.

(*h*) Should be abolished.

(*i*) No.

55. Items (*a*), (*d*) and (*h*) are permanent; and the rest are temporary, but will be alright as soon as the match industry is on its footing. We require the protection for 12 years.

Equipments.

56. Yes. The smallest unit of production should be about 1,250 gross daily.

57. 50 per cent. outlay.

58. (*a*) 11 Veneering machines.

3 Splints-chopping machines.

4 Box-chopping machines.

25 Box-making machines.

25 Frame-filling machines.

10 labelling machines.

8 Emptying machines.

1 Box-filling machine.

1 Dozen packetting machines.

2 Paraffin machines.
6 Splints-levelling machines.
2 Circular saws.
3 Side-painting machines.
1 Compound-mixing machine.
1 Gilletting machine, etc.

(*b*) Nothing special.

59. (*a*) Are quite up to date and are capable to successfully compete with imported matches.

(*b*) Except the box-filling everything is done by machinery.

60. (*a*) Nothing is at present necessary.

(*b*) We cannot say anything definite.

61. Almost all particulars of machinery can be made in India.

Capital Account.

62. (*a*) On lease.
(*b*) On lease.
(*c*) Rs. 54,000.
(*d*) 2 Lakhs.
(*e*) 1 Lakh.

63. Actual cost 3 Lakhs. We have written off Rs. 6,000 as for depreciation last year.

64. Depreciation ought to be Rs. 15,000.

65. Would be the same.

66. Have started only last year.

67, 68, 69, 70, 71, 72, 73 and 74. Being private company requires no answers.

Working cost.

75. (1) Cost of wood for splints and veneers .	7	annas	per	gross.
(2) Cost of paper	1½	,,	,,	,,
(3) Cost of chemicals	2½	,,	,,	,,
(4) Cost of other raw materials . . .	2	,,	,,	,,
(5) Factory labour	7½	,,	,,	,,
(6) Power and fuel	1	,,	,,	,,
(7) Ordinary current repairs and maintenance of buildings, plants and machinery .	1¼	,,	,,	,,
(8) General services, supervision and local office charges	1	,,	,,	,,
(9) Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	1	,,	,,	,,
(10) Cost of packing cases	2	,,	,,	,,
TOTAL Rs. . .	1	11	0	

76 and 77. We have not adopted the cost-sheet system.

78. Do not know.

79. 6¼ per cent. on the machinery and 2½ per cent. on building. We consider that the rates of depreciation should be 20 per cent. on account of Japanese match-machines not being durable.

80. Rs. 6,000, for machinery and Rs. 1,500, for building.

Working capital.

81. (1) 1½ Lakhs.
(2) 2 Lakhs.

82. Yes.

83. Not borrowing.

84. Rs. 75,000 per month.

85. (*a*) About Rs. 2,600 daily.

(*b*) About 3 months.

86. The raw materials stored up to the average value of Rs. 1 lakh.

87 to 90. Being a private company have no agents.

Manufacturer's profit.

91, 92 and 93. Being a private company we have no need for all that.

Claim for protection.

94. (*a*) The chief raw material in the manufacture of matches is wood, which is available in abundance in Burma as well as in India, and if some of the factories have to rely upon imported wood, it is because of the lack of proper development of forest resources rather than to the advance of suitable wood in sufficient quantities.

As for chief power the industry has not experienced any difficulty. The supply of labour required for this industry is more than what it is required, and with India it will never be a question of anxiety. It has, for the present, to rely to some extent upon imported skilled technical labour but in a few years' time this kind of labour will also be available in sufficient number. The third advantage which India possesses naturally is an extensive home market at hand.

(*b*) The industry must be one which, without the help of protection is not likely to develop at all, or is not likely to develop so rapidly as is desired in the interests of the country. It was in 1922 that when the duty of Re. 1-8-0 was levied by the Government for revenue purposes, this high rate of duty served as a protective measure to the match industry and now it promises to develop if there is no interference from foreign competition.

(*c*) We confidently believe and claim that the match industry, if allowed to develop on the lines suggested above, will in a few years' time, be able to face the world competition without any protection from the Government.

95. (*a*) Yes.

(*b*) Yes.

96. Yes. Large Indian labour is being utilised by this industry and whatever profit is derived remains in India.

97. (*a*) The existing duty is Re. 1-8-0 per gross.

(*b*) The landing and other charges are annas 2 per gross.

98. The amount of protection which we consider necessary is Rs. 3 per gross. It is the sole aim of the foreign manufacturers to cripple Indian industry which is still in its infancy.

99. The following form of assistance, other than protective duty, is recommended :—

(*a*) That suitable wood which we believe exists in abundance in Indian forests and which is the chief raw material in the manufacture of matches, must be made available to the match manufacturers by Government taking up the research work in all seriousness and by affording every facility for its transport by cheap railway and steamer freights.

(*b*) A special protection should be given against the foreign competition of the Syndicate, which is not a *bonâ fide* concern and whose activities should not be allowed to be successful. It is, therefore, suggested that a discriminating excise duty on the products of the factories, financed wholly or mainly by foreign capital, should be levied, but under no circumstances should any burden be

imposed on the factories run purely by Indian capital and Indian enterprise.

(*c*) That the present import duty of Re. 1-8-0 per gross should be raised to Rs. 3 and declared as a protective duty and should be maintained at the same rate, as this industry—if allowed to develop on right lines—will soon be in a position to get over the technical difficulties and that the industry will provide employment to thousands of labourers.

(*d*) That proper control should be exercised on the imports of foreign matches into Native States by transhipment methods which are likely to result in a deficit in the Custom duty by the transhipment right being abused.

(*e*) That in course of time, if proper encouragement is given by the Government, it is believed that even all the chemicals and paper required in the manufacture of matches will be available in India and the match industry will be in a position to cope with the full demand of the country in a few years' time. So it should be allowed to develop on right lines and the industry be treated as a national industry as it supplies an every day's necessity of life.

---

(2) *Letter dated the 17th January 1928.*

We have received your telegram of yesterday's date as follows :—" Your letter eighth December, please send immediately your latest works costs " and as requested we give below our present cost of making matches :—

	per gross. Rs.	A.	P.
(1) Cost of wood for splints and veneers . . .	0	7	0
(2) ,, ,, paper	0	1	6
(3) ,, ,, chemicals	0	2	6
(4) ,, ,, other raw materials	0	2	0
(5) Factory labour	0	4	0
(6) Power and fuel	0	1	0
(7) Ordinary current repairs and maintenance of buildings, plants and machinery . .	0	1	0
(8) General services, supervision and local office charges	0	1	0
(9) Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	0	1	0
(10) Cost of packing cases	0	1	0
Total	1	6	0

We give the above figures in confidence for the information of the Board and we do not wish them to be published either in the Board's report or in any other way.

The Esavi India Match Manufacturing Company, Calcutta.

(1) *Letter, dated 20th April 1927.*

We beg to enclose herewith our answers to your questions and shall thank you to acknowledge receipt.

Answers to questionnaire.

1. The firm was established in October 1923. It is a proprietory firm.

2. Capital subscribed by Indians 70 per cent.; 30 per cent. held by Japanese. Under Indian control and management. No Europeans are employed.

3. We undertake the whole process of manufacture.

4. In December 1923.

5. At present we produce about 4,000 gross of matches and boxes per day.

6. The dimensions of match boxes are:—

Full size $2\frac{1}{4}'' \times \frac{3}{16}'' \times \frac{11}{16}''$ and contains about 80 to 90 splints.

Half size $1\frac{3}{4}'' \times 1\frac{1}{4}'' \times \frac{9}{16}''$ and contains about 60 to 70 splints.

7. Our output in the year 1924 . . . . . 33,650 gross.
1925 . . . . . 600,500 ,,
1926 . . . . . 864,500 ,,

8. At 36-A, Hogulkuria Gully and at 46/1/1, Muraripukur Road, Manicktola in the town of Calcutta.

(*a*) Yes.

(*b*) Yes.

(*c*) Yes.

(*d*) Yes.

The most important factor in selecting the site of a match factory is where wood is in abundance and all transport facilities cheap enough to compete with imported matches.

9. (*a*) Yes, Indian matches fall short of the standard of imported matches where local wood is used owing to the inferior quality of the wood. Second cause is its infancy.

(*b*) There is a prejudice against Indian made matches for the present. Up to the present the market was held by Swedish and Japanese matches only and what was manufactured here was much inferior in comparison and so they gained the reputation, but since the last 2/3 years, big factories have started under expert advice and there is every likelihood of getting over the prejudice.

(*c*) We consider a difference of annas 12 to annas 14 in price per gross to be sufficient to overcome the prejudice against Indian matches.

10. (*a*) Yes. A portion from Siberia to keep up the standard of quality with imported matches.

(*b*) No.

(*c*) No.

We import Siberian wood from Japan.

(1), (2), (3) C.I.F. price Rs. 120 per ton of 50 cubic feet.

(4), (5) Rs. 10 per ton.

(6) 15 per cent.

11. (*a*), (*b*) and (*c*) Gangwa wood (Excoecaria Agallocha).

12. (*a*) The local Gangwa wood is not as satisfactory as the Aspen wood. It is inferior in respect of colour and slightly in strength.

(*b*) and (*c*) Satisfactory.

13. (*a*) Annual requirements of wood are 6,000 tons. Daily output is about 3,500 gross.

(*b*) About 6,900 tons.

14. 35 cubic feet per 100 gross of boxes of finished matches of full size.

15. *Size of the packing cases.*—Full size 40×26×27 inches containing 50 gross of matches. Half size 36×31×28 inches containing 100 gross of matches.

16. We purchase from local markets.

17. Wood is transported by means of boats from the Sunderbands into the Canals at Manicktolla, Calcutta.

18. We buy from the local dealers.

19. We make local purchases.

20. We ourselves do not extract wood from forests. We make local purchases.

21. Fresh wood can always be had from local markets.

22. At present the supply of wood is quite ample as long as it is used for making match boxes only, we may feel the scarcity as time goes on owing to a gradual diminution of the supplies from the areas from which they are taken. Suitable wood exists in abundance in Indian forests, and must be made available to the match manufacturers by the Government undertaking the research work and by affording every facility for its transport by cheap railway and steamer freight. Government should also take steps to replant these places from which trees have been cut down.

23. No necessity as yet has arisen to draw supplies from new areas.

24. Yes, we are assured of a sufficient supply of suitable wood for a few years. No steps have been taken to plant trees of a kind suitable for the match making industry.

25. We ourselves have not as yet extracted wood from forests.

26. Other than wood, the following raw materials are required, namely :—

Paper, Zinc Sheets, Glue, Amorphous Phosphorus, Chlorate of Potash, Dextrine and other Chemicals.

Total amount of raw material required in one year.

	lbs.
Chlorate of Potash	259,350
Iron Dioxide	8,645
Iron Manganese	6,484
Infusorial earth	4,322
Sulphur	17,290
Glass powder	1,080
Dextrine	12,967
Bichromate of Potash	8,645
Glue	4,322
Red Phosphorus	17,290
Sulphuric Antimony	2,161
Iron Oxide	2,882
Soot	4,322
Paraffin	86,450
Paper	432,250
Zinc sheets	134,400

27. Quantity of materials required per hundred gross matches :—

	lbs.
Chlorate of Potash	35
Iron Dioxide	1
Iron Manganese	½
Infusorial earth	1
Bichromate of Potash	1
Sulphur	2
Glass powder	¼
Dextrine	1½

	lbs.
Glue	½
Red Phosphorus	2
Sulphuric Antimony	¼
Iron Oxide	½
Paraffin	13
Soot	½

28. (*a*) All as stated in answer to question No. 26 are imported from abroad.

(*b*) None.

(*c*) None.

Case—(*a*) Chlorate of Potash, Amorphous Phosphorus, Paper and Zinc are imported from the continent and other Chemicals from Japan.

(*b*) Chlorate of Potash per ton £33 c.i.f. Amorphous Phosphorus per ton £220 c.i.f. Blue match paper £31 per ton c.i.f. Zinc sheets £50 per ton c.i.f. Green paper £24 per ton c.i.f.

(*c*) Calcutta from Europe and Japan.

(*d*) We buy c.i.f.

(*e*) Rs. 3 per ton.

(*f*) Rs. 7 per ton.

(*g*) Customs duty 15 per cent.

29. Chlorate of Potash, Manganese Dioxide, Sulphide black, Sulphuric Antimony are manufactured in India, but are not as yet up to the standard. If the match industry is allowed to be developed, there is every hope that they will be improved and all the remaining chemicals will be ultimately manufactured in India.

30. We are not extracting yet.

31. Three or four experts are required during its infancy.

32. We have no imported labourers under our employment save the experts.

33. The labourers are being trained by the said experts and the labourers personally do all works requiring skill under the directions and advice of the experts. The labourers are now working in every branch of the factory.

34. 1,500 workmen of whom about 700 are women and children. A male worker gets from Re. 1-8-0 to Rs. 2 per day. Women and children get from annas 8 to Re. 1-4 per day.

35. From the vicinity of the factory.

36. Yes. They are improving gradually with training.

37. Arrangements for housing the labourers are not necessary because the labourers have got their own houses in the neighbourhood of the factory.

38. Electricity and steam power. (Mostly electricity.)

39. Electric supply by the Electric Supply Company, Limited, cost from ½ anna to 1½ annas per unit.

40. Coal and waste wood are used as fuel. Available in sufficient quantities.

41. Mostly electricity used. 1 unit of electricity produces about 20 gross of matches.

42. Coal Rs. 13 per ton free factory delivery.

43. Mostly electricity.

44. About 14,000,000 gross boxes.

45. We think the demand will increase with the necessary Government protection.

46. In Bengal.

47. None, because we are in port and from where railway and steamer freight is the same for locally made and imported matches.

48. (*a*) At present about ⅓rd of the total consumption of matches in India is imported from abroad.

(*b*) It is alleged that matches are being imported through the Native States into British territory thereby evading a certain portion of the duty with the result that they successfully compete with Indian manufactured matches.

49. Sweden and Japan.

50. The competition is really coming from the matches made in India as against the matches made abroad. This is only possible as long as protective duties are imposed, during the early exploitation in local industry.

51. Swedish matches were sold at the average rate of :—

In the year 1924	Rs. 2	11	0 per gross.
1925	Rs. 2	11	0 ,,
1926	Rs. 2	11	0 ,,

Japanese matches were sold at the average rate of :—

In the year 1924	Rs. 2	10	0 per gross.
1925	Rs. 2	8	0 ,,
1926	Rs. 2	6	0 ,,

Our and Indian matches were sold at the average rate of :—

In the year 1924	Rs. 2	4	0 per gross.
1925	Rs. 1	15	0 ,,
1926	Rs. 1	11	0 ,,

52. From local merchants.

53. (*a*) Yes.

(*b*) No.

(*c*) Yes. This is current knowledge in the local market.

54. (*a*) The Indian manufacturer is at a disadvantage with regard to freight and duty.

(*b*) Cost of expert labour is much higher.

(*c*) As regards costs it is higher on account of inexperienced hands. As stated above, the ordinary labourers are inexperienced but they are improving daily under the directions of the experts and within a further eight years they will be efficient.

(*d*), (*e*) and (*f*) We are not at a disadvantage.

(*g*) We have to keep two months' extra stock.

(*h*) Customs duty on imported materials should be abolished to protect match industry in India and to enable us to compete with imported matches.

(*i*) Not at a disadvantage.

55. With regard to items Nos. (*a*) and (*h*) disadvantages are permanent. The rest temporary and are likely to operate for a period of about 8 to 10 years.

56. Yes. The smallest unit of production should be about 1,500 gross per day.

57. 60 per cent.

58. (*a*) (*i*) 50 gross frame-filling machines. (*ii*) 15 frame-emptying machines. (*iii*) 20 labelling machines. (*iv*) 35 box-wrapping machines. (*v*) 12 veneer-peeling machines. (*vi*) 10 splint-making machines. (*vii*) 2 grinding machines.

(*b*) No special arrangement.

59. (*a*) Our machinery and other equipment are quite up to date and efficient to compete successfully with imported matches.

(*b*) Box-filling, box-painting, dipping, packing and a certain portion of box-wrapping are done by manual labour.

60. (*a*) No important replacement of the existing plant in our factory is at present necessary.

(*b*) We may extend.

61. Any part of the machinery can be made in India.

62. (*a*) and (*b*) On lease. Leasehold property.

(*c*) The value of some buildings erected by us is about Rs. 97,000.

(*d*) Rs. 2,43,000.

(*e*) Rs. 1,25,000.

63. The actual cost has been set out. Depreciation Rs. 15,000.

64. Less than the sums which ought to have been set aside. Rs. 39,000 ought to be set aside on depreciation.

65. The costs under the heads (*a*) and (*b*) would be the same.

66. Sums spent on the purchase of plant and machinery:—

	Rs.
1924	1,65,000
1925	84,000
1926	91,000

67. This is a Proprietory Company.

68. This is a Proprietory Company.

69. This is a Proprietory Company.

70. This is a Proprietory Company.

71. This is a Proprietory Company.

72. This is a Proprietory Company.

73. This is a Proprietory Company.

74. No replacement and extension at present contemplated.

75. Forms attached herewith.

76. Works cost not increased.

77. No.

78. No.

79. 6¼ per cent. on machinery. 2½ per cent. on building. We suggest a depreciation of 15 per cent. on machinery as match-making machines are too delicate.

80. (*a*) Rs. 17,612-8.

(*b*) Rs. 16,675.

81. (1) Rs. 2,50,000.

(2) Rs. 3,50,000.

82. Proprietory Company. Yes.

83. Question does not arise.

84. Costs of one month's output will be Rs. 1,35,000.

85. Rs. 50,000. About a month.

86. It is necessary to hold stocks of raw materials to sustain the factory for two months. Average value of the stocks held is Rs. 1,25,000.

87. No. The company has no other head office except an office of local management. It is not under the control of a firm of managing agents.

88, 89 and 90. We have no agents.

91, 92 and 93. This is a Proprietory Company.

94. (*a*) The most important raw material used in match manufacture is wood which is available in abundance in India and if some of the factories

have to rely to a certain extent upon imported wood it is because of lack of proper development of forest resources in this country rather than to the absence of suitable wood in sufficient quantities. It is a known fact that India abounds in large forests which can yield sufficient quantities of wood for match manufacture, but the constant cutting out of woods suitable for manufacture will within a space of time deplete the forests of such woods; so the Government of India should take steps to start plantations of match woods at once. It will also be highly disadvantageous and costly if the match manufacturers have to extract match woods from far distant country when they can have it from nearer forests at less costs if the Government of India takes little pains to start plantations of match woods.

As for cheap power, the industry has not experienced any difficulties. The supply of labourers required for match industry is more than what is required and with India it will never be a question of anxiety. India will have constantly abundant supply of labour. As the said industry is in its infancy it has for the present to rely to some extent upon imported skilled technical labour but in a few years' time this class of labour will also be available in sufficient number. That there is a large home market for matches can hardly be disputed as they are an article of daily necessity even to the poorest of the population.

(*b*) Prior to the year 1922 when the present rate of import duty, *viz.*, Re. 1-8-0 per gross was levied efforts made to start the industry in India were not successful and she was entirely dependent on foreign matches but as soon as the rate of duty was raised to the present figure numerous match factories were established in India because the high rate of duty, though levied for revenue purposes, served as a protective duty. The fact that the match industry in India showed good progress only after the import duty on matches was raised to the present figure is sufficient indication to show that the match industry is one which is not likely to develop without the help of protection.

(*c*) During the brief period of its existence the industry has shown steady progress in spite of the many difficulties which a new industry has of necessity to face. We confidently believe that the match industry will in a few years' time be able to stand on its own legs and face the world competition without any protection from the Government.

We hope that what has been stated about will convince the Tariff Board that the match industry fulfils all the conditions laid down by the Indian Fiscal Commission and is therefore fully entitled to be protected.

95. (*a*) During the brief period of the existence of the industry the industry has improved so much that one-third or perhaps more of the total consumption of matches in India is manufactured in India and we confidently believe that the industry is one in which the advantages of large scale production can be achieved and it is quite evident that increasing output would mean increasing economy of production.

(*b*) We are sure that in course of time the whole needs of the country could be supplied by home production. A German match expert says "It is well known that India is to-day the best customer for Swedish matches." This is solely due to lack of enterprise and difficulties in obtaining timbers suitable for match manufacture. Lately, however, things have considerably improved. In fact some of the Indian business men are at present very keen on starting match factories in India and lately some well equipped factories have been started. It is almost certain that in course of time India will be able to produce her own matches and then the import of foreign matches chiefly of Swedish make will stop automatically.

96. The most important feature which makes the industry peculiarly suitable to Indian economic conditions is the employment of a large number of Indian labourers. Hundreds of village women and children also get their employment in the factories. Even hundreds of village women do work such as pasting veneers at their homes during their leisure hours. During the last four years, numerous match factories have sprung up which are not only

employing a large number of workmen as aforesaid in the factories but which have also created work for labourers in forests.

97. (*a*) Re. 1-8 per gross.

(*b*) Annas 2 per gross.

98. The present existing protection is sufficient.

99. One of the most important considerations the Tariff Board should give, in considering the protection to be afforded to the growing match industry of India, is to prevent the overriding power of foreign Trusts in crushing the increasing efforts of Indians to produce matches in this country. By reason of the command of vast capital the Swedish Trust which has at its call a matter of about 25 crores of rupees makes profits approximately of 12 per cent. or three crores per annum; it accordingly can easily afford to loose a matter of 50 lakhs per annum which can be spent in crushing out of existence the Indian industry which is now in its infancy and with appreciably no material loss to the Trust.

The small capitalist has to go and the consequent interest of the Indian investing public also has to go if the Trust is allowed to monopolise the Indian market.

At the present time they are underselling the Indian manufacturers and the process of elimination has already begun.

There is no question that if protected the Indian industry can in a few years' time compete on favourable terms with Foreign Trusts but time, instructions and confidence in the industry must be given to the Indian manufacturers and investing public to enable this to be done.

The materials to allow of this to be done are within the boundaries of India suitable wood is available as well as the other raw materials. We would accordingly recommend that Trust such as the Swedish one be taxed to a degree which will enable the Indian industry to develop and stabilise.

Form I.—Statement showing total expenditure on the production of matches during the last three years.

	1924.	1925.	1926.
	Rs.	Rs.	Rs.
1. Cost of wood for splints and veneers.	20,000	3,37,800	4,32,000
2. Cost of paper	6,300	93,800	1,21,500
3. Cost of chemicals . . .	8,400	1,12,500	1,48,500
4. Cost of other raw materials . .			
5. Factory labour	19,000	2,72,000	3,37,500
6. Power and fuel . . .	16,800	2,44,000	2,70,000
7. Ordinary current repairs and maintenance of buildings, plant and machinery.			
8. General services, supervision and local office charges.			
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.			
10. Cost of packing cases . . .	4,200	65,700	94,500
TOTAL .	74,700	11,25,800	14,04,000

Form II.—Statement showing works cost per gross of matches. Full size.

——	1924.	1925.	1926.
	Rs. A. P.	Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers.	0 9 6	0 9 0	0 8 0
2. Cost of paper for labels and wrapper.	0 3 0	0 2 6	0 2 3
3. Cost of chemicals	0 4 0	0 3 0	0 2 9
4. Cost of other raw materials . .			
5. Factory labour	0 9 0	0 7 3	0 6 3
6. Power and fuel	0 8 0	0 6 6	0 5 0
7. Ordinary current repairs and maintenance of buildings, plant and machinery.			
8 General services, supervision and local office charges.			
9. Miscellaneous, *e.g.*, rent, Municipal taxes, insurance, etc.			
10. Cost of packing cases . .	0 2 0	0 1 9	0 1 9
TOTAL	2 3 6	1 14 0	1 10 0

(2) *Letter dated the 6th December 1927.*

With reference to your letter No. 927, dated the 28th ultimo, we give below our latest works cost per gross of matches.

	Rs. as. p.
1. Cost of wood for splints and veneers . .	0 8 0
2. Cost of paper for labels and wrappers . .	0 2 0
3. Cost of chemicals 4. Cost of other raw materials	0 2 3
5. Factory labour	0 5 9
6. Power and fuel 7. Ordinary current repairs and maintenance of buildings, plant and machinery 8. General services, supervision and local office charges 9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc. .	0 4 6
10. Cost of packing cases	0 1 6
TOTAL .	1 8 0

If splints are made of local wood the costs will be less by 2 annas per gross.

Please treat the above as confidential and oblige.

(3) *Letter dated the 6th February 1928.*

With reference to our oral evidence to-day and the President's remarks regarding box filling by hand, we beg to draw the attention of the Board that the Swedish Match Company in their reply to the Board's questionnaire has given cost of box filling by machinery Rs. 3-2-0 for fifty gross, while our cost by hand at the rate of annas $1\frac{1}{4}$ for a tray of 190 boxes comes to the same amount, that is Rs. 3-2-0, at the same time giving employment to five hundred men, women, boys and girls in that department alone.

The New Sunderban Match Factory Limited, Calcutta.

(1) *Letter dated the 21st April 1927.*

Replies to questionnaire.

With reference to your letter No. 288, dated 8th April 1927, we beg to submit our replies to questionnaire as put in by our Factory Expert and Manager Mr. P. C. Roy.

Answers to the questionnaire.

INTRODUCTORY.

1. The Sunderban Match Factory Limited was floated in 1923 but subsequently the Company went into voluntary liquidation in the year 1926 with a view to reconstruction of the Company under the name of the New Sunderban Match Factory Limited, and the Managing Agency was transferred to Messrs. Kar & Co. It is a public registered Company.

2. About $\frac{9}{10}$ths of the Capital invested are held by Indians. The total number of Directors are eight, of which one only is a European. There is no European employee in any capacity.

3. We undertake the whole process of manufacture.

4. This factory started its work from February 1925.

5. This factory is well equipped to manufacture splints and veneers for 1,000 gross and finished matches for 500 gross daily.

6. The dimension of the match box is 53 mm. × 37 mm. × 17 mm. which is generally known in the market as the standard size for three quarter boxes.

7. The average output of matches in the year 1925 was about 100 gross per diem. In the year 1926 the factory worked for five months and the average daily production was 150 gross.

8. The factory is situated at Khulna which is about 110 miles south-east from Calcutta. The position of the factory is almost an ideal in respect of the following points:—

(*a*) It is close to the Sunderbans from which we get our supplies of wood.

(*b*) The place is not very far from Coal District. The waste wood forms half of the fuel.

(*c*) The place is connected by rail, steamer and boats with almost all the towns of East and West Bengal.

(*d*) The kind of labour we want for our factory is abundant in the neighbouring places and the humidity of the locality is favourable for match manufacture.

The above considerations are the most important factors for selecting the site of a match factory in India. The advantage of a factory is appreciated in proportion to its distance from the port.

9. (*a*) The Indian manufactured matches, if properly made, are in no way inferior to the imported matches excepting in colour and high class finish.

(*b*) There is a prejudice against the Indian matches on account of the colour of the splints and finish besides the general prejudice against India-made articles which is diminishing gradually.

(*c*) The imported matches are sold in the market for one and half pice per box while the indigenous matches are sold at one pice per box. This difference in price I believe is sufficient to overcome the prejudice.

Wood.

10. I have never found it necessary to import wood for the manufacture of (*a*) Splints, (*b*) Veneers and (*c*) Packing cases. As we do not import wood, I am unable to give any information regarding the f.o.b. price, etc., of the imported wood.

11. We use the following kinds of wood for the manufacture of:—

(*a*) *Splints.*—Excoecaria Agallocha (Gewan) principally also Trewia Nudiflora (Petuli) Anthoceptialus Cadumbu (Kadam).

(*b*) *Veneers.*—Excoecaria Agallocha (Gewan) also Bombax malabaricum (Simul).

(*c*) *Packing cases.*—Excoecaria Agallocha (Gewan).

12. The Indian wood is as satisfactory as the imported wood for the manufacture of (*a*) Splints, (*b*) Veneers, and (*c*) packing cases, excepting the facts that the outturn from our wood per cubic foot is much less than from the imported wood and that the colour of the products is not so fair as that of the imported wood.

13. It is very difficult to give an accurate quantity of wood required. We do not get selected logs under the present system of supply and so provision for a heavy wastage becomes necessary. We give the figure according to our present rate of consumption.

(*a*) Our annual requirement of wood is 33,000 c.ft. against the present daily outturn of 200 gross.

(*b*) 165,000 c.ft. of wood would be necessary per year for the full capacity of our machines at 1,000 gross per day.

14. 50 c.ft. of wood are necessary for 100 gross of finished matches.

15. The size of packing case is $2' \times 2' \times 3'$. The wood required for the same is $2\frac{1}{2}$ c.ft. in the log form. One packing case contains 50 gross of matches.

16. We get our supply of wood from the Sunderbans which is only 35 miles off by river from the factory.

17. The private people fell the trees on their own account and sell them in lots to the factory. The wood is transported to the factory by the river on their own boats.

18. We do not pay any royalty direct to the Government. The people who fell the trees pay Rs. 6 only as royalty to Government for each 100 maunds of wood.

19. We pay for the wood delivered at the factory including all expenses at Re. 1 per piece of 2 c.ft. roughly.

20. We hold no concession.

21. We have found the supply of wood constant in respect of quality.

22. The supply of wood is also constant in respect of quantity.

23. We found no necessity to get supply from different areas.

24. We consider that our factory is assured of a sufficient supply of suitable wood for a long period. In fact the Government wanted to demolish these trees in the year 1901 as they were encroaching upon new lands. The Forest Department spent a lot of money over the scheme but it was at last abandoned as hopeless. But these trees are allowed to be felled down indiscriminately for fuel and other purposes. If there is some restriction with regard to the felling of the trees below certain girth the continual supply of timber for factories to produce 20,000 gross a day is assured for a long time

to come. No steps have yet been taken for the plantation of suitable trees near the factory, but the scheme for the same is awaiting the declaration of the policy of the Government regarding the protection of this Industry.

25. We do not get any special concession regarding freights, etc., for wood. Our factory being located on a river bank at the close proximity of the Sunderbans, our wood is brought by country boats and the exorbitant railway freight for wood does not affect us.

Other raw materials.

Other raw materials required by us are as follow: —

26. (*a*) Papers: —

(1) Blue pasting papers in reels.

(2) Packeting papers.

(3) Labels.

(*b*) Chemicals: —

Amorphous Phosphorus.
Antimony Sulphide.
Manganese Dioxide.
Glass powder.
Industrial earth.
Chlorate of Potash.
Bichromate of Potash.
Sulphur.
Zinc Oxide.
Ferric Oxide.
Chalk powder.
Phosphate of Ammonia.
Gum traganth.
Gum Senegal.
Gum Arabic.
Glue.
Dextrin.
Arrowroot.
Red lead.
Paraffin Wax.

सत्यमेव जयते

The total annual requirement at the present rate of daily output of 200 gross for paper is 18,000 lbs. and for chemical 30,000 lbs.

27. For 100 gross production we require 30 lbs. of paper and 50 lbs. of chemicals.

28. A. All the above named chemicals and papers are imported from abroad.

B. None manufactured in India.

C. None is manufactured by us.

(*a*) All the chemicals are manufactured in Germany and the papers are made in Sweden generally.

(*b*), (*c*), (*d*), (*e*) and (*g*) As we purchase them in the local market we are unable to give any detailed information in this connection as wanted.

(*f*) Amorphous Phosphorus, Chlorate of Potash, Bichromate of Potash, and Sulphur are transported to the factory at a charge of Rs. 1-8 per maund and the rest at a cost of Re. 1 per maund.

29. (*a*) Papers and all the chemicals excepting Sulphur, are likely to be manufactured in India as the raw materials are available in the country. In

case of Phosphorus the Swedish Trust holds the patent of process of manufacture but that I do not consider a permanent impediment.

Labour.

30. As we purchase the timbers delivered at the factory I have no direct knowledge about the availability of labour for the extraction of wood, but I believe there is no difficulty in this respect.

31. It is not necessary to import any skilled labour from abroad.

32. We have no imported labour in our factory.

33. We generally employ people (Vadralogue class) to work at the machines. The work being of a light nature suits them admirably well. They pick it up quickly. Especially as they are suited to no hard work we get them cheap. We have a sort of night school where we give them mechanical training.

34. We have got about 90 workmen; about 15 of them are boys under 15 years of age. No women are employed. The boys get 6 annas per diem, the coolies get 12 annas per diem and the machinemen (the literate boys over 15) get 14 annas per diem on an average.

35. The labour is drawn from the vicinity of the factory.

36. The literate boys improve with training. We do not keep any record of work in different departments.

37. We have given quarters to those who are willing to live in the factory compound. A library and a night school have been started for their general education.

38. Power used in the factory is derived from steam.

39. We do not use electric power.

40. Coal and waste wood are used for generating power. Waste wood is sufficiently available in the factory on account of the rejected wood and wastage incidental to the processs of manufacture.

41. About 2½ seers of coal are required for one gross of matches.

42. The coal is purchased locally at Rs. 13-8 per ton, *i.e.*, at 8 annas per maund delivered at the factory.

43. We also use waste wood for fuel. We do not purchase it separately as it comes out as wastage out of the process of manufacture. Waste wood alone is not sufficient to generate the power we require.

Market.

44. The total Indian demand for matches is about 15,000,000 gross for a year.

45. The demand for matches is daily on the increase. This is due to the increasing railway and other transport facilities to all parts of India and the gradual but steady spread of civilisation in the country.

46. The principal market for our matches is South Bengal, and our factory is also situated in South Bengal.

47. As we are not far away from the ports we have no advantage over the imported matches on this account.

48. (*a*) We have no definite information on this point.

(*b*) We have reasons to believe that there is illicit importation of foreign matches into India but we have no direct information on the subject.

Competition.

49. Sweden and Japan are the two countries which not only compete with the Indian matches but compete between themselves.

50. With the existing duty the imported matches compete keenly with the matches made from indigenous wood but the imported matches cannot compete with matches made from imported wood.

51. (1) The price at which the imported matches entered the country in 1918-22 or 1922-26, is not accurately known to us.

The price at which the matches were sold is as follows:—

1918 . . .	Not known to us.
1919 . . .	Do.
1920 . . .	Do.
1921 . . .	Rs. 2-12 per gross.
1922 . . .	Rs. 2-12 ,,
1923 . . .	Rs. 2-12 ,,
1924 . . .	Rs. 2-10 ,,
1925 . . .	Rs. 2-10 ,,
1926 . . .	Rs. 2-10 ,,

(2) Our matches were sold

1925 . . .	at Rs. 1-12 per gross (including Agents' Commission).
1926 . . .	at Rs. 1-10 ,, ,,
The present price	Rs. 1-8 ,, ,,

(3) The price of the Indian matches from imported wood was as follows:—

1924 . . .	Rs. 2.
1925 . . .	Rs. 1-14.
1926 . . .	Rs. 1-12.

52. The Commercial Intelligence Office is the only source from which the information wanted may be obtained.

53. The imported matches were sold just before the Rs. 1-8 duty was imposed, at the rate of Rs. 2-12 per gross but now even after paying the duty they are selling at Rs. 2-10. So we believe they are selling the matches at present at a nominal profit, whereas in pre-duty days, they had been profiteering heavily. In order to regain this lost advantage they have started factories in India to avoid the custom duty. These factories are the real enemies of Indian Manufacturers.

54. The Indian manufacturers are at a great disadvantage in all the points enumerated except (*f*) freights on finished goods.

55. We consider (*a*), (*b*), (*c*), (*e*), and (*g*) are temporary. Regarding (*d*) and (*h*) it depends on the policy of the Government. Regarding (*i*) the raising of capital, I consider this also a temporary point. As soon as the protective policy of the Government is fixed, the capital we believe will not be difficult to raise.

Equipment.

56. Our mill is just sufficient as an economic unit of production to ensure economy. The smallest unit of production on an economic basis is 500 gross.

57. About 20 per cent. of the capital has been invested towards plant and machinery.

58. (*a*) We have got the following machines:—

3 Peeling machines . . .	A Roller of Berlin.
2 Chopping machines . . .	A Roller of Berlin.
1 Drying machine . . .	Baden Engineering work (Germany).
1 Splint arranging machine .	A Roller.
1 Cleaning machine . . .	,,
5 Frame-filling machines . .	,,
5 Box-making machines . .	,,
1 Box-filling machine . .	,,
1 Painting machine . . .	,,

Steam Engine, Steam Pump, Shafts, Belts, Pipes, etc

These machines were practically brought into use for the last two years.

(*b*) These machines were not purchased under any special arrangement.

59. (*a*) Our machineries are sufficiently up-to-date.

(*b*) All the process of the manufacture is done by machine.

60. (*a*) If the protection is granted to this Industry, we contemplate to instal one Automatic machine to replace the present system of frame filling and dipping.

(*b*) If the protection is granted we want to extend the plant by addition of machineries for double production.

61. Almost all the parts of machines can be made in India but the cost is high.

Capital Account.

62. The block value of the property as it stood at the end of the last year is as follows:—

	Rs.
(*a*), (*b*) and (*c*)	25,000
(*d*)	41,000
(*e*)	8,000

63. The above figures represent the value after depreciation. The total figure written off is Rs. 19,493-6-10.

64. The sums set aside, we consider, represent proper figure.

65. The present day cost for a similar factory with present day output would be as follows:—

	Rs.
(*a*)	30,000
(*b*)	60,000

The operating cost of a new factory would be smaller than ours.

66. The plant and machinery were purchased in the year 1923 to the extent of Rs. 25,000 locally and in the year 1924 to the extent of Rs. 35,493.

67.

	Rs.
(*a*) The authorised capital is	5,00,000
The issued capital is	3,00,000
(*b*) The subscribed capital is	85,500
(*c*) The paid up capital is	79,250

All the shares of the Company are ordinary; there is no preference or Deferred shares.

68. We have no preference shares.

69. We have no Deferred shares.

70. (*a*), (*b*) and (*c*) None.

71. No dividend.

72. We have no debenture loans.

73. No reserve fund, as heavy depreciation has been adopted for plant and machinery.

74. Up to 5 lakhs which is authorised.

75. *Works cost.*

Form I.—Statement showing total expenditure on the production of matches during the last two year 1925 and 1926.

	1925.	1926.
	Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers	3,025 0 0	3,937 8 0
2. Cost of paper	2,268 12 0	3,093 12 0
3. Cost of chemicals	3,025 0 0	3,937 8 0
4. Cost of other raw materials	378 2 0	562 8 0
5. Factory labour	4,537 8 0	6,187 8 0
6. Power and fuel	756 4 0	1,125 0 0
7. Ordinary current repairs and maintenance of buildings, plant and machinery.	567 3 0	1,125 0 0
8. General services, supervision and local office charges	3,781 4 0	4,781 4 0
9. Miscellaneous, *e.g.*, rent, Municipal taxes, Insurance, etc.	1,134 6 0	1,406 4 0
10. Cost of packing cases	756 4 0	1,125 0 0
TOTAL	20,229 11 0	27,281 12 0
Total production of matches for the year	12,100 gross.	18,000 gross.

Form No. II.—Statement showing works cost per gross of matches.

	1925.	1926.
	Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers	0 4 0	0 3 6
2. Cost of paper for labels and wrapper	0 3 0	0 2 9
3. Cost of chemicals	0 4 0	0 3 6
4. Cost of other raw materials	0 0 6	0 0 6
5. Factory labour	0 6 0	0 5 3
6. Power and fuel	0 1 0	0 1 0
7. Ordinary current repairs and maintenance of buildings, plants and machinery.	0 0 9	0 1 0
8. General services, supervision and local office charges	0 5 0	0 4 3
9. Miscellaneous, *e.g.*, rent, Municipal taxes, Insurance, etc.	0 1 6	0 1 3
10. Cost of packing cases	0 1 0	0 1 0
TOTAL	1 10 9	1 8 3
NET TOTAL	1 10 9	1 8 3
Total production of matches for the year	12,100 gross.	18,000 gross.

76. The works cost increased on account of the production being low on the heads (8) General services, etc., and (9) miscellaneous such as rent, etc. If full output had been obtained the figures would have been for (8) Re. 0-1-6 per gross and (9) Re. 0-0-6 per gross.

77. We have not yet adopted the cost accounting system, but are going to do so presently.

78. I cannot furnish any information regarding the works cost of matches in any competing country.

OVERHEAD CHARGES.

(i) Depreciation.

79. The rates of depreciation allowed by the Income-tax authorities is 6¼ per cent. on machinery and 2½ per cent. for the buildings. This I believe is fair.

80. (*a*) For depreciation at Income-tax rates Rs. 4,416 are required annually, if the assets are valued at cost, or (*b*) Rs. 3,387-8-0, if the assets are taken at their value after deducting all depreciations.

(ii) Working Capital.

81. (*i*) Our Company requires Rs. 30,000 as working capital at the present output,

or (*ii*) Rs. 75,000 for the full capacity.

82. As the Company has not been fully reorganised yet, we cannot answer the question at present.

83. The Company has already borrowed Rs. 30,000. The rate of interest is 10 per cent.

84. The monthly work cost is Rs. 5,000 and the working capital is Rs. 30,000.

85. Average value of the stock of finished goods held by the Company is about Rs. 6,000. It takes about 30 days between production and payment.

86. No large stock of raw materials is required to be kept.

(iii) Agents' Commission.

87. The Company has got a head office. It is under the control of a firm of Managing Agents.

88. (*i*) The annual amount for Head Office expenses is Rs. 6,000.

(*ii*) The Agents' Commission is 10 per cent. of the net profits.

89. The Agents' Commission is determined according to the amount of net profits.

90. (*i*) One anna and seven pies per gross for Head Office expenses at the present output of 200 gross per day.

(*ii*) About eight pies per gross for Head Office expenses at full capacity of daily outturn of 500 gross.

Manufacturers' Profit.

91. 12 per cent. dividend would be fair for ordinary or deferred shares.

92. 9 per cent. would be an attractive rate of interest for debenture.

93. Everything depends on the policy of the Government with regard to the protection of this Industry. If the Government decide otherwise we do not issue any shares.

94, 95, 97, 98, 99. In answer to these questions I beg to attach herewith a copy of my representation to the Tariff Board submitted on the 31st December, 1926.*

* Printed separately.

96. This industry peculiarly suits the labour of the middle class. This industry if allowed to grow will solve to a great extent the problem of unemployment in the country.

This industry will help the growth of the other industries such as paper and chemical industries, the raw materials of which are abundant in the country.

There are plenty of forests in India, the timbers of which may be best utilised for this purpose.

India is full of waste lands. The plantation of suitable woods may be started on them to the best advantage of the country.

P. C. ROY,

Factory Expert and Manager.

Dated 20th April 1927.

---

(2) *Letter No. 9, dated the 4th January 1928.*

We are in receipt of your letter No. 1011 of the 13th ultimo. In reply we beg to say that since last April we had to change our machinery which had been suitable for ¼th size matches, to make them suitable for full size matches instead of only ¼th size, to accommodate market demands. Due to this we are not in a position just now to give you our present works costs correctly. We, therefore, request that the works costs supplied by us in our letter No. 927 of 28th November 1927* may be accepted.

The Karimbhoy Match Manufacturing Company, Calcutta.

Letter without date.

We have the honour to submit the following answers to the Match Industry Questionnaire forwarded to us.

INTRODUCTORY.

1. Ours is an unregistered private company having been established in September 1925.

2. The whole capital invested in our firm is held by Indians. We have no directors. No foreigners are employed in our factory in any capacity whatsoever.

It is purely an Indian concern as regards capital, supervision, management and labour.

3. We undertake the whole process of manufacture of matches and match boxes complete.

4. In September 1925.

5. 1,500 gross per diem.

6. We manufacture full size match boxes containing 80 splints and half size boxes containing 65 to 70 splints.

7. The present output is 1,000 gross per day.

8. It is situated at 31-35, Canal West Road, Calcutta.

(*a*), (*b*), (*c*) and (*d*) Yes.

Cheap and sufficient wood supply, cheap and sufficient labour and cheap means of transportation should be the important factor in selecting the site of a match factory in India.

9. (*a*) Indian matches are not inferior to imported Swedish matches in quality though its outward appearance is not so refined on account of wood

* That is the works costs forwarded with their letter of the 21st April, 1927.

used by the Indian Match Manufacturers. Even the Indian matches are not inferior in any way to the Japanese imported matches or to the matches manufactured by the Swedish Trust in India. It may be added that some of the Indian factories manufacture better quality matches than the Swedish Trust manufacturing in India.

(*b*) It may be said in general that there is a prejudice against Indian manufactured matches amongst the aristocracy and the European Community, not as regards quality but for the splints made of Siberian wood. It is fast disappearing.

(*c*) There should be no difference in price but the people pay 1½ pice per box of imported Swedish matches as against 1 pice per box of Indian made matches due to the fancy they have for the wood of which the imported Swedish splints are manufactured. This is also disappearing.

Raw Materials.

10. (*a*), (*b*) and (*c*) No.

We do not import. We use Indian Genwa wood.

11. (*a*), (*b*) and (*c*) Genwa.

12. (*a*), (*b*) and (*c*) Yes. But the transportation of the Indian wood is a problem with the Indian factory owners as it is cheaper and easier to transport wood from the vicinity of the North Pole to India than from 400 miles within India.

13. (*a*) 4,000 tons.

(*b*) 6,000 tons.

14. 50 cubic feet of Genwa wood for 100 gross of boxes of finished matches.

15. 50 gross case for full size matches $37\frac{1}{2}'' \times 25'' \times 26''$, 100 gross case for half size matches $35'' \times 29'' \times 29''$. One case takes about 4 cubic feet of Genwa wood.

16. We buy our supply of wood in the local market close by.

17. The villagers fell the wood in the Sundarbans and transport the same by boat to the Calcutta market for sale which is their means of livelihood. It may be added that the Genwa wood used to be in demand for manufacture of packing cases but with the birth and development of the match industry in Bengal the demand increased and found employment to thousands and is feeding so many.

18. We understand that they pay 1 anna to 2 annas per maund as royalty to the Government.

19. As we buy our supply of wood in the local market we are not in a position to say anything from personal experience on these points but we are told the charges do not exceed 5 annas per c.ft. from the forest to the local market.

20. *Nil.*

21. We experienced no difficulty in having supply of wood constant in quality and have not noticed any deterioration in quality as well.

22. As yet we have found the supply of wood constant in respect of quantity and would like to add that if the Government undertakes the "Couping" System for match wood there will be no difficulty for generations to come and we would not be required to draw our supplies of wood from inaccessible places.

(*a*), (*b*), (*c*) and (*d*) *Nil.*

23. *Nil.*

24. Yes.

We are prepared to plant match wood trees if facilities are afforded to us by the Government in the lease of lands on the navigable riversides. On enquiry from Dehra Dun Forest Research Institution we learnt that *Albizzia stipulata* wood is known to grow 7 feet in girth within 7 years. This shows that there is ample room for extension of the supply of match wood and thus to reduce the cost of raw material and to cheapen the price of matches.

25. None whatsoever.

Other Raw Materials.

26. Raw materials besides wood required for manufacture of matches are Potash Chlorate, Bichromate of Potash, Ferric Oxide, Manganese Dioxide, Red Manganese, Red Lead, Sulphur, Glass Powder, Amber, Lampblack, Antimony, Red Phosphorus, Dextrine, Glue, Paraffin, Gelatine, Gum, Oxide of Zinc, Paper for wrapping and packing, Zinc sheets, etc.

27. The cost per gross of the chemicals is about 2½ annas.

28. (*a*) Match chemicals are mostly now imported but these chemicals except Potash Chlorate can be manufactured in India.

(*b*) Paper and the following raw materials, Glass Powder, Rosin, Manganese Dioxide, Antimony, Sulphur, Red Lead, Flour, etc.

(*c*) None.

29. Refer to answer 28.

30. No.

31. To no extent.

32. *Nil.*

33. *Nil* Every facility is given to Indian workmen to acquire training in skilled labour.

34. About 500; 100 being women, 50 to 60 children, rest males.

Male 12 annas to Rs. 2-8 per diem.

Female 8 annas to Re. 1-4 per diem.

Children 8 annas to Re. 1 per diem.

35. From the vicinity of the factory.

36. Yes, to a great extent. Yes.

37. The labour being drawn from the vicinity of the factory, no housing facilities are necessary.

Power.

38. Electricity.

39. Calcutta Electric Supply Corporation, Limited; 2 annas are the cost per unit which is in our opinion rather high. The monopolist Electric Supply during the War time was permitted to charge for increase in price of coal in addition to the above unit charges. Most curiously the War is come and gone and the prices of coal have not only reached their pre-war level but are even less than that but the excess charge is still there to fill the pockets of the monopolist Corporation shareholders. Pity it is true and true it is pity in these days of tall talk of Industrial development in India on all sides.

We have made no enquiry as under the present circumstances it would not avail us in any way.

40. *Nil.*

41. *Nil.*

3 pice to 4 pice per gross; roughly half unit of electric current.

42. *Nil.*

43. *Nil.*

Market.

44. Refer to Government Statistics.

45. Yes, because of cheapness in conformity with quality and also the material progress of the country.

46. Bengal, Bihar and Orissa, United Provinces, Central Provinces and Assam.

47. *Nil.*

48. (*a*) Refer to Government Statistics.

(*b*) Yes, probably in Kathiawar ports.

Competition.

49. Sweden is the only competitor to be reckoned with at present. Japan, once the keenest and the most successful too, has lost completely the Indian market *pari passu* with the growth of Indian Match Industry.

50. Yes, with both.

51. (1) We have no information.

(2) In 1925 and some part of 1926 we used to get Rs. 2 per gross of full size and Re. 1-11 per gross of half size matches.

(3) ————

52. From Customs Manifest.

53. (*a*) Yes, unremunerative in case of Japan.

(*b*) ————

(*c*) We do not know.

54. (*a*) Yes.

(*b*) Yes, because the Industry is old.

(*c*) Yes.

(*d*) to (*i*) Yes.

55. All are temporary but we cannot forecast as we cannot control item Nos. (*d*), (*e*), (*f*) and (*h*).

Equipment.

56. Yes, but with greater addition of plant and consequent greater outturn at a lower cost it would be a still more economic unit; all factories admit of expansion and expansion in the right direction means greater economic unit of production.

500 gross per diem.

57. 50 per cent.

58. (*a*) See schedule attached herewith.

(*b*) No special arrangements.

59. (*a*) Yes.

(*b*) ———

60. (*a*) No.

(*b*) Certainly, yes. Frame-filling, Frame-emptying, Stick-levelling, Box-pasting machines, etc.

61. All the match manufacturing machines except upper part of frame-filling machines, box-filling machines and packeting machines.

Capital Account.

62 to 66. ————

67 to 74. Do not arise.

Works Cost.

75. See Schedule.

76. Our factory being in its infancy, the question does not arise.

77. No. Does not arise.

78. No.

Depreciation.

79, 80. We do not know.

Working Capital.

81. (1) Working capital about 1 lakh and a half.

(2) About 2 lakhs and a half.

82. 83. Do not arise.

84. About 20 per cent. of the working capital.

85. About 20 per cent. of the working capital.

About 2 months on an average.

86. Not coal, but raw materials of about 20 per cent. of the working capital.

Agents' Commission and Head Office expenses.

87. *Nil.*

88. Selling Agents' commission varies from 1 to 2 annas per gross and the Head Office expenses 1 anna per gross.

89. We pay per gross of sale.

90. Please refer to 88 and 89.

Manufacturers' profit.

91 to 93. Do not arise.

Claim for protection.

94. (*a*) Yes.

(*b*) Certainly. We do claim without the help of protection the Industry cannot at all develop as is desirable in the interests of the country.

(*c*) Yes, with 10 years' protection the Industry would not only be able to face the World's competition, but find its own market in the World abroad after meeting the Home demand. Both labour and wood can be had in abundance at a competitive rate in India and the Indian market is one-fifth of the World's Match Market. Moreover, with the material development of the country, more matches are sure to be consumed. The abolition of protection would place the Industry at a disadvantage and crush the Industry as it is even with protection, it has to face unfair competition from foreign capitalist caucus. Protection has given an impetus to the Industry and the Industry has developed beyond expectation under its wings inasmuch as it has ousted the Japanese competitors from the Home market and now supplies more than half the consumption of the Home demand. Its history shows how wonderfully this Industry has grown up within such a short period as 4 years or so. With this space of development the Industry will make Home market independent of all foreign imported matches and will meet the needs of the country within four or five years more and thereby increase the wealth of the country by crores of rupees every year and find employment to thousands. No nascent Industry of any country has ever developed without protection.

95. (*a*) Certainly.

(*b*) Most certainly—not only will meet the Home demand but would find markets abroad as said before.

96. Yes. With years of experience the comparatively cheap Indian labour would be really cheaper and with unlimited supply of wood, the cost of production would be minimised to such an extent by bringing in its trail the consequent birth of bigger factories and expansion of existing ones as to compete favourably with the foreign manufacturers.

97. (*a*) and (*b*) The existing Customs duty of Re. 1-8 per gross gives protection to the Indian Match Industry to the extent of Re. 1-2 per gross.

98. We advocate the declaration of the present Import duty of Re. 1-8 per gross as the protective duty.

(2) We want protection against invasion of the industry by foreign capitalists who backed by their unlimited capital of crores of rupees are come to nip the indigenous industry in the bud, viewing the development and growth of Indian Match Industry as a menace to their monopoly of the World's Match Market and are bent with determined intention to crush the same and to keep the Match Market as their preserve.

(3) Transportation difficulty should be removed to enable the manufacturers to utilise the best match wood found in the Himalayas, Assam and in other parts of India by allowing concession rates as to freight through the intervention of the Railway Board.

(4) Abolition or even reduction of Import duty on match machineries, match chemicals and papers would give the Indian manufacturers the fullest

possible benefit of the existing Import duty on imported foreign matches under the present condition of India.

99. Yes. Excise duty should be levied on all Trusts and Foreign Corporations as is done by Japan lately whose advent as a rival is calculated to stifle the Industry in its infancy.

Schedule showing the cost.

	Rs.	A.	P.
Wood for splints and veneers	0	6	0
Paper	0	2	0
Chemical	0	2	6
Raw materials	0	2	0
Current repairs and maintenance, etc.	0	1	0
General supervision and local office charges	0	2	0
Rent, Municipal taxes, Insurance, etc.	0	1	0
Cost of packing cases	0	1	6
Labour expenses	0	6	3
TOTAL	1	8	3

Messrs. Dharamsey and Company, Calcutta.

(1) *Letter dated the 26th September 1927.*

We thank you for your letter No. 752, dated the 12th instant, and we are sending herewith six copies of our replies to the Board's questionnaire issued to match manufacturers, receipt of which please acknowledge.

Replies from Dharamsey & Co., to the Questionnaire of The Indian Tariff Board for Match Industry.

1. Messrs. Dharamsey & Co., are a Private Firm. They are not a Limited Liability Company. There is a Partnership Deed amongst the Partners.

2. All the Capital invested is held by Indians and all the Partners of the firm are Indians. No European is employed in any capacity by Messrs. Dharmasey & Co.

3. We undertake the manufacture of the whole process of splints, veneers, Matches and Match boxes.

4. We commenced work with the machines in the month of November 1926.

5. Our present capactiy is 450 gross per day of 9 working hours. Four further machines have been shipped on our account which have just arrived.

6. We manufacture full size match boxes the size of which is $2\frac{5}{8}'' \times 1\frac{7}{16}'' \times \frac{11}{16}''$ and half size match boxes the size of which is $1\frac{27}{32}'' \times 1\frac{5}{16}'' \times \frac{19}{32}''$. The full size match box contains on an average 78—82 matches and the half size match box contains on an average 68—72 matches.

7. Our present output is 450 gross per day, but within a fortnight our output will be 650 gross per day as new machines have arrived.

8. Our factory is situated within the premises of the American-Eastern Tobacco Corporation, Ltd., at 19, Dum Dum Road and 1/1, Umakanto Sen Lane, both the properties being adjoined together.

8. (*a*) We are very near to the Calcutta canal from which all the Calcutta Match factories take the supply of wood. Though we are not actually facing the canal, yet we have the advantage.

(*b*) We have High Tension Power supplied by The Calcutta Electric Supply Corporation, Ltd., and we draw our power from the Power Station of American-Eastern Tobacco Corporation, Ltd., whose tenants we are.

(*c*) Calcutta is an important market for matches and our factory being in Calcutta, we consider ourselves to be in the vicinity of a very important market in India.

(*d*) We have abundant labour around our factory which is also another consideration for the good situation of our factory.

9. (*a*) The Indian made matches are not considered to be inferior in respect either of its burning quality or of any fault in its chemicals. The Indian matches made of Indian wood fall short only in the whiteness of its splints. The fibre and the strength of the Indian wood is considerably less than that of the imported wood.

(*b*) There is no prejudice against the Indian made matches in any respect whatsoever. The aristocracy wants better splints, such as those from imported Aspen wood.

(*c*) The difference in price between Indian made matches of Indian wood and the imported matches ought to be at least Rs. 2 per gross.

10. We have up till now not imported any wood for the manufacture of match boxes either for splints, veneers or for packing cases. We only ordered out a trial shipment of two tons of Aspen wood from Japan the cost of which is as stated below:—

	Rs.	A.	P.
Per ton c.i.f., Calcutta	96	8	0
Freight and Insurance	...		
Landing Charges and Rent about . . .	4	8	0
Transport Charges	2	8	0
Duty, 15 per cent.	14	7	6

11. We use only Indian wood for the manufacture of splints and veneers both of which we make from Gewa and as for packing cases we get them made from the Packing Case Department of the Tobacco Company, whose Managing Agents we are, who make these packing cases from Motor car cases the supply of which they get from the Motor car importers with whom they have contracts. They have a complete plant for the manufacture of such cases the cost of which comes practically the same as those made from Indian wood.

12. The Indian wood is entirely satisfactory and could be easily replaced for imported wood for veneers but for splints the strength of the fibre of Indian wood is much less, but as the Indian made matches are being sold owing to the indirect protection of the heavy duty on imported matches which costs more, we have up till now seen no prejudice from the public to use matches made of Indian wood, but we consider that it would be much preferable if the Government of India were to experiment and grow wood which would be suitable for splints. We hear that some wood from Andaman Coast is much better in strength and colour than Gaon, but the supply of which is very scarce and if we were to get supplies of this wood regularly we think that it would help the manufacturers.

13. (*a*) and (*b*) As we are manufacturing to the full strength and capacity of our plant and on this basis, our consumption of wood per year would be 30,000 logs (and more as our output increases with the arrival of new machines).

14. We require for full size 100 gross finished matches 32 logs and half size 100 gross finished matches 21¾ logs.

15. Our standard size of packing case for full size matches to hold 50 gross matches is $36'' \times 23\frac{1}{2}'' \times 24\frac{1}{2}''$. To hold 100 gross half size matches it is $39\frac{1}{4}'' \times 27\frac{1}{2}'' \times 23\frac{1}{2}''$ and $27'' \times 20\frac{1}{4}'' \times 23\frac{1}{2}''$ to hold 50 gross half size matches. As we are not making packing cases, we have no idea of wood it requires for making one packing case.

16. The supply of wood comes from Sunderbans. The wood is brought from the Sunderbans to Calcutta by the canal on the Canal Road from where we draw our supplies. The distance from Canal Road to our Factory is about a mile.

17. We ourselves do not import wood from the forests of Calcutta but we get our supplies from the villagers who obtain passes from the Government to bring wood from the forests.

18. We have no idea.

19. As we buy our wood locally we cannot give this information.

20. As we are not bringing the wood ourselves, we have not applied for any license for the extraction of wood.

21. At present the wood supply is ample but during the hot months the supply is scarce as also the quality of wood inferior as it is dried up and therefore considerable wastage occurs and consequently the cost of production increases. Owing to heat the wood is dried up and the prices are exhorbitant.

22. We hear from the boatmen who bring wood from the forests that at present the Government has closed up more areas of forests and therefore the supply will be less now and naturally the prices will rise.

22. (*a*), (*b*), (*c*) There has not been any considerable increase in Match factories which would bring the price of wood high, but it is quite apparent that the gradual diminution of the areas of supplies from which the wood is brought is affecting the manufacturers seriously.

23. We have not brought any supplies from any new areas, but we understand that some factories have done so lately, but they say that the supply is so scarce that instead of helping, the work has suffered owing to inconsistent quality.

24. We are absolutely in the dark if we could get sufficient supplies of wood for a reasonably long period or not. It is a matter for the Government. The Government could only ask the Indian factories to take a permanent interest with the fundamental object of a permanent Match Industry in India after they give protection to the Industry, and offer facilities to grow wood.

25. We receive no special concession in the matter of freight for either wood or anything else. If better facilities are granted, naturally it would help considerably this industry which is in its infant stage.

26. Other raw materials required besides wood are Potash Chlorate, Bichromate of Potash, Ferric Oxide, Manganese Diaxide, Red Manganese, Red Lead, Sulphur, Glass powder, Amber, Lamp Black, Antimony, Red-Phosphorus, Dextrine, Glue, Paraffin, Gelatine, Gum, Oxide of Zinc, paper for wrapper, labels, Zinc Sheets.

27. Chemicals required for 100 gross Matches—

	lbs.
Potash Chloride	25
Sulphur	2
Manganese	5
Lamp Black	1
Glass Powder	5
Rosin	1
Potash Bichromate	1
Ferri Oxide	3
Glue	5
Red Phosphorus	1½
Red Lead	¼
Antimony	1⅛
Paraffin	8

28. Imported from Japan—

	Rs.	A.	
Glass Powder, per cwt.	6	0	Including duty, landing and clearing charges.
Black Manganese, per cwt.	13	8	
Antimony Sulphide, per cwt.	35	0	

(Duty on the above is 15 per cent., and duty and landing charges work out to 2 per cent.)

	Yen.	Rs.	A.	P.
5 cwts. glue, per cwt.	33	239	12	0
Freight and Shipping, per cwt. . .	20·19			
Duty, Clearing and Rent (Exchange 129½) .		44	8	0
		284	4	0

This has been imported by us only recently from Japan and works out to Rs. 65-13-7 per cwt.

All other raw materials we purchase locally, but many of them are imported the prices of which are controlled by local firms.

Paraffin, we purchase locally from Messrs. Shaw, Wallace & Co., and the price of which until recently As. 3-9 per lb., but during the last month it has been gradually reduced to As. 3 per lb. The market of this is very fluctuating.

Potash Chloride, is imported from Germany and Sweden the market of which is controlled by the Match Manufacturing Supply Co., Ltd., of the Swedish Match Co., and the last contract we made with them is at Rs. 22 per cwt. ex-godown at Calcutta.

Sulphur, we purchase this from Messrs. N. C. Daw & Co., of Calcutta at Rs. 8-8 per cwt. ex-Godown Calcutta.

Lamp Black, Rosin, Potash Bichromate, Ferri Oxide, Red Lead, we purchase these locally from Messrs. Laxmidas Devidass & Co., Calcutta, at the rate given below ex-godown Calcutta, but we hope to import these very soon partly from Europe and partly from U. S. A.

	Rs.	A.	P.
Lamp Black, per lb.	0	5	6
Rosin, per md.	0	14	0
Potash Bichromate, per cwt.	30	0	0
Ferri Oxide, per cwt.	11	8	0
Red Lead, per cwt.	33	0	0

Red Phosphorus is being imported by the Match Manufacturing Supply Co., Ltd., the prices of which used to be very high, but recently it has been reduced and purchased by us during last week at Rs. 135 per case of 110 lbs. We recently approached a German Chemical Company who manufacture this article who replied back to us that at present they were unable to supply Red Phosphorus, which we think is due to the strong control which the Swedish Match Manufacturing Co. has upon the Chemical Manufacturers of the Continent.

29. If attempts are made with Government help, all the chemicals could be possibly manufactured in India.

30. We understand that there is sufficient labour for bringing wood from the wood areas.

31 and 32. We do not consider nor do we think of importing skilled labour. We are of opinion and we have found same in practice that the Indian labour is as good, if not better than imported labour. We do not employ an imported labour.

33. The question does not practically affect our factory. We have been always giving all facilities to Indian workmen to get training in all the processes and we ourselves are training them.

34. The total number of workmen employed by us about at present, Men—100, Women—15 and Children—35 and the average rates are Rs. 1-3, As. 12 and As. 12 respectively.

35. All our Indian labour is drawn from the vicinity of our factory.

36. The Indian labourer undoubtedly improves by proper training and gradually gives the full output of the machines.

37. We have not made any housing arrangements for our labour though we have arranged with the Tobacco Company where they have a certified Doctor who attends for 2 hours daily and all modern medicines are kept in good quantities and the workmen and their families are treated free of charge. We have also arranged with the shops in the vicinity of our factory for our labour to get cheap foodstuffs, which are visited by our Doctor.

38 and 39. We use only Electrical power. We draw our main power from the plant of American-Eastern Tobacco Corporation, Ltd., who take High Tension Power from the Calcutta Electric Supply Corporation, Ltd. They charge 6 pies per unit and Rs. 6-8 per Kilowatt load. There is an agreement to consume 75 per cent. of 51 Kilowatts per month. Our share per month comes to about Rs. 125.

40. We do not use steam power, though very little steam is used for our Hot Rooms. The boiler is being worked half by Coal and half by the wastage of the wood of our factory.

41. The cost of power per gross to us is about 2½ pies. As we draw our supply from the Tobacco Company, we cannot give the consumption of units per gross.

42. See No. 38 and 39.

43. We cannot use only wood for our boiler for steam purposes as the Indian wood gives considerably less amount of steam and so to make this up we have to use coal as stated in No. 40. Practically all our wastage of wood is consumed by our boiler.

44. The total demand in India as estimated by the Indian Chamber of Commerce is somewhere about 20 million gross matches per year.

45. Yes, we think the demand should increase in the near future. As the people get educated they will be giving up the old method of ignition and matches would be in greater demand.

46. Our chief markets are in Bengal, Bihar, Assam and a little in the Madras Presidency.

47. We do not think that there is any factory which could compete with any market in India owing to the distance from the port, as the chief factories which are situated in ports themselves have to bear the same cost of freight on the Indian made matches, as the foreign made matches, therefore no saving is made, but if preferential rate is given, it would help the match industry much.

48. The imported matches are somewhere about 50 per cent. and 50 per cent. of India made matches are sold at present.

(*b*) We do not suppose that there is any illicit importation of matches into India on any big scale, but there was a rumour of such importation on the Akyab coast.

49. Sweden and a little from Japan.

50. The imported matches compete with both.

51. (1) We have no information.

(2) We realised in 1926, Rs. 2 per gross for full size and Rs. 1-13-6 for half-size f.o.r., Calcutta.

(3) We have no information.

52. We think the information could be had from Customs House.

53. (*a*) We have reason to believe that the price at which matches are imported from Japan are very unremunerative.

Regarding (*b*) and (*c*) we are unable to say anything definite.

54. (*a*) The cost of plant and machinery to the Indian manufacturer must be naturally higher. All the machines are practically to be imported though few of the machines are now being made in India, which are as good as the imported, but for the main machines we have still to depend on importation. The prices of some of the machines have been recently increased by the Swedish Trust.

(*b*) Yes, a little.

(*c*) The cost of efficiency of ordinary labour in the beginning is a little high.

(*d*) We have to collect practically all the raw materials from outmarkets.

(*e*) Yes.

(*f*) Freights on finished products are, we consider, very high.

(*g*) Yes, but for wood it entirely depends on the Government and the facilities they grant.

(*h*) Customs duties on imported materials should be decreased.

(*i*) As for capital, the Indian public would heartily support the Indian Match Industry provided the protection is granted to the Industry. It would be risking their whole capital if they were to find that the protection is not granted and the duty decreased on the imported matches. It would be very daring on the part of any manufacturer in such a state of financial market and uncertainty to go out and ask the public to subscribe for an industry which has no foundation.

55. (*a*), (*b*), (*c*), (*g*), and (*i*) Are temporary disadvantages which would be overcome by the grant of protection.

(*f*) and (*h*) Could be overcome if the Government of India took to heart to protect the match industry and if they were to reduce the duty and Railway freights.

(*d*) and (*e*) We cannot control this but if the Government of India were to encourage the manufacture of chemicals in India, part of the disadvantage of raw materials would be overcome.

56. Yes. But greater the outturn, cheaper the cost of production will be, and the expansion in the right direction is necessary. We think that a factory must produce 500 gross to be on an economic unit.

57. 45 per cent., as on 31st August 1927.

58. (*a*) See Schedule.

(*b*) There is no special arrangement.

59. (*a*) Yes.

(*b*) Practically everything is done by machines now-a-days.

60. (*a*) No.

(*b*) Yes, our machines are arriving at convenient intervals, as well as we are erecting several ourselves. New machines, we contemplate importing are Frame Filling, Box Making Machine, Label Pasting Machine, Packeting Machine, etc., after the report of the Tariff Board is published. Machines we can erect ourselves are Splint Chopping Machine, Veneer Chopping Machine, Peeling Machine, Levelling Machine, Selecting Machine and Emptying Machine.

61. See No. 60.

62. (*a*), (*b*) and (*c*) We have no leases or concessions nor have we any land or building of our own. (*d*). Rs. 17,691-6-0. (*e*). Rs. 21,164-14-8 as on 31st August 1927.

63. In (*d*) we have allowed 10 per cent. depreciation and the amount shewn is after allowing depreciation.

64. Our own idea is that Match machines are so very delicate that the total value of the Machinery account should be written off at least in 5 years if possible. We think the Income-tax Officer would object if such heavy depreciations are allowed.

65. Our factory being new the question does not affect us.

66. We had no factory during the period mentioned.

67. The question does not affect us.

68 to 74. These questions do not affect us.

75. As we worked only about a month and a half in 1926, we have not filled in the Schedule, but if the Board desires, we can make out monthly Schedules for this year and submit.

76. Our factory being new the question does not affect us.

77. Yes, but our year has not been complete so it would not help the Board, as also new machines arrived regularly therefore extra labour was employed as also production was affected. If the Board desires, we can show the cost of few months which is available.

78. No.

79. We understand that the rate of depreciation allowed by the Income-tax authorities is 5 per cent. on buildings and machineries. We do not consider that this rate is suitable in calculating the cost of production of matches. As stated previously we think that the machineries should be written off within 5 years and the buildings also a little later than is allowed by the Income-tax authorities.

80. At 10 per cent. depreciation on machineries per year, we would require Rs. 1,000 for depreciation according to our present investment, and at a 5 per cent. depreciation on other assets, we would require Rs. 1,000. The Income-tax authorities allow only 5 per cent. on Machineries and nothing on other assets.

81. We are working at full capacity and we require about half a lakh of Rupees at the present rate of output, but the capital would have been much higher if we had not a Banian who pays cash immediately the goods are delivered to the parties.

82 and 83. These questions do not arise.

84. 27 per cent.

85. Luckily at present we have no finished stock as our days output are sold previously. But we think that 10 per cent. of the working capital will be required for finished goods.

About 2 months elapse between production and payment.

86. We hold stocks of raw materials to the extent of 20 per cent. of the working Capital.

87. We have an office at the above address.

88. (*a*) As Messrs. Dharamsey & Co. do many other businesses, only a part of their establishment could be taken into the account of matches and as the year is incomplete we are unable to give the amount.

(*b*) Our Selling Agents' commission comes to about one anna per gross.

89. We pay our Agents certain percentage on the nett amount realized.

90. Please refer to Nos. 88 (*a*) and (*b*.)

91 and 93. These questions do not arise.

94. (*a*) Yes.

(*b*) We claim that without protection the Industry is not likely to develop at all and further whatever of the Industry that exists at present will be wiped out and the Indian public in general will never again have faith in this industry. This Industry suffered loss previously and if the Industry is again left aloof then the same fate awaits her now.

(*c*) With about 10 years protection the industry will be able to face world competition in the home market.

95. (*a*) Yes.

(*b*) In a short period it is quite probable that the industry will supply all the requirements of India and very probably supply outside markets.

96. There is ample labour in India as well as ample wood which could be developed by this industry as also the demand in India of Matches amounts to practically one-fifth of the world's demand proves that the industry is suitable for the economic conditions of the country.

97. The protection which the industry receives indirectly owing to the existing Customs Duties including the conditions of (*b*) works to practically somewhere about Re. 1 to Re. 1-2 per gross on matches imported from Sweden and As. 10 to As. 12 per gross matches imported from Japan.

98. **Japan competition is not so very great as in India 50 per cent. of** the Matches imported which are practically all from Sweden and therefore we ask for Rs. 2 per gross protection on all imported matches, our reason being as below:—

If the duty is put up at Rs. 2 per gross, the imported matches could not be sold at Rs. 3-4 per gross, which means that the retail price will have to be raised from 1½ pice to 2 pice per box. This would give more protection than at present, but would at the same time enable and afford the Indian manufacturer to manufacture matches of the quality and standard of the matches imported from Sweden. The question of Aspen wood would then come up and with the facilities and help of the Government, the manufacturers will be tempted to go in for experimenting and growing suitable wood against Aspen wood. Thereby eventually the balance of the 50 per cent. importations would cease and eventually the whole of India would be supplied with matches made in the country.

99. Besides the protection of Rs. 2 per gross the Indian match manufacturers must be protected against the foreign Syndicate which has opened out several factories in India lately. We endorse the views of the Indian Chamber of Commerce who expressed in their letter to the Board of the 17th May 1927, and draw the attention of the Board to paragraph 12 in that letter and have to say that if this industry is not protected against this alien Syndicate, the match industry in a few years will pass out to their hands and the Indian public will be entirely at the mercy of this foreign Trust. Already it is being tried to injure the sale and reputation of the Indian manufacturers, by rumours in the market of a reduction in the import duty on Matches. Several dealers were informed before August not to purchase India made matches as the Duty would be reduced in the month of August last. This had a very bad effect on the market and such inferior methods are being adopted wherever possible. We therefore request the Board when submitting their report, they should prevail on the Government the necessity of publishing the report earlier, to stop repetition of such mischief.

We believe, as suggested by the Indian Chamber of Commerce an excise duty on factories managed and controlled by those who are not residents of India is as essential as the grant of protective duty on Imported Matches.

We have also to bring to the notice of the Board that the Swedish Trust besides having opened out factories in India are also trying to control the markets of chemicals and other raw materials and therefore granting of facilities for the manufacture of these articles is also essential.

Schedule of Machineries as on 31st August 1927.

3 Frame Filling Machines of Hirao Iron Works, Japan.

4 Emptying Machines of Bhowani Engineering and Trading Co., Calcutta.

1 Feeling Machine of Bhowani Engineering and Trading Co., Calcutta.

2 Feeling Machines of Bengal Small Industries, Calcutta.

1 Levelling Machine of Bhowani Engineering and Trading Co., Calcutta.

1 Levelling Machine, Home made.

2 Selecting Machines of Bhowani Engineering and Trading Co., Calcutta.

1 Selecting Machine of Hirao Iron Works, Japan.

3 Chemical Grinding Machines of Hirao Iron Works, Japan.

1 Label Pasting Machine of Hirao Iron Works, Japan.

2 Box Making Machines by Boreman, Germany.

1 Paraffin Apparatus by Bhowani Engineering and Trading Co., Calcutta.

1 Paraffin Apparatus, Home made.

1 Splint Chopping Machine by Bhowani Engineering and Trading Co., Calcutta.

1 Veneer Chopper Machine by Bhowani Engineering and Trading Co., Calcutta.
1 Dipping Machine by Bhowani Engineering and Trading Co., Calcutta.
1 Dipping Machine, Home made.
About 4,500 Machine Frames from Japan.
200 carts and several trays, Home made.
1 Cross Cut Saw Machine, Home made.

FORM I.—*Statement showing total expenditure on the Production of Matches during January to September 1927.*

	Rs.	A.	P.
1. Cost of wood for splints and veneers	12,377	6	0
2. Cost of paper	3,450	11	3
3. Cost of chemicals	7,690	11	10
4. Cost of other raw materials	7,567	8	9
5. Factory labour	25,807	5	9
6. Power and Fuel	910	0	0
7. Ordinary current repairs and maintenance of buildings, plant and machinery	2,884	8	0
8. General services, supervision and Local Office charges	2,250	0	0
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	1,420	0	0
10. Cost of packing cases	5,186	0	0
TOTAL	69,544	3	7

Total production of Matches for the above period, 50,347 gross.

FORM II.—*Statement showing works cost per gross of matches.*

	As.
1. Cost of wood for splints and veneers	3·97
2. Cost of paper for boxes and wrapper	1·09
3. Cost of chemicals	2·44
4. Cost of other raw materials	2·40
5. Factory labour	8·20
6. Power and Fuel	0·28
7. Ordinary current repairs and maintenance of buildings, plant and machinery	0·91
8. General services, supervision and local Office charges	0·71
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	0·45
10. Cost of packing cases	1·64
TOTAL	22·09
Credit of materials recovered (if any)	*Nil.*

(2) *Letter dated the 7th February 1928.*

As desired in your letter of 11th January we have pleasure to give below the information asked for.

(I) *Wood.*—The wood required for manufacturing 100 gross complete finished matches full size is about 35 c. ft.

(II) *Freight charges on Assam Wood.*—As we were unsuccessful to obtain any supply from Assam, we are unable to give you the freight charges.

(III) *Power consumption.*—There is only one meter in the factory, so we cannot get the exact number of units consumed by us monthly from the Tobacco Factory.

(IV) *Unfair sales.*—Between March 1927 and August 1927 the W. I. M. Co., Ltd., reduced their rates to such an extent that the whole market was paralysed. Evidence of these dates could be had from the Account Books of the dealers from which we have obtained our information. The brands they sold at low rates were "Monkey and Crocodile" together with other brands. A new method is being lately adopted by the Trust for furthering their interests by deviating the mind of the Indian manufacturer from the good conduct of his business by taking him to Law Courts, on a mere ridiculous pretence of an infringement of their trade mark. By this the Trust has much to gain, while the Indian manufacturer has to suffer silently. By taking the Indian manufacturer to Law Courts who has to attend same at the sacrifice of his business, and make him spend money, the Trust recoup the market and though the Indian manufacturer may succeed in the Courts he would find that in the meantime he has lost his market. There is nothing at which the Trust will stop if it could only further their interests.

---

(3) *Letter dated 13th February 1928.*

We enclose a copy of our letter to the Director of Industries with a copy of enclosure to him, for the Board's information.

Copy of letter dated 13th February 1928, to the Director of Industries, Bengal.

Your representative called on us to-day enquiring our current prices of matches. We have again raised to-day our price as the demand is heavy as many factories are stocking their manufacture. The market is very speculative. We have at the same time to bring to your notice that the Swedish Trust only about a month ago raised their prices from Rs. 1-8-0 to Rs. 1-10-0 after selling big quantities at the old rate and later raised their price to Rs. 1-12-0 at which we doubt if they have sold any quantity in proportion to their output.

The Indian factories who had reduced their prices to the level of the Trust, were taken unawares and big demand for their matches followed on the Trust raising their prices and we accordingly raised our prices.

We are giving you this correct market report following the visit of your representative, as it would help you in the enquiries which you have undertaken. We enclose a copy of our letter to our agent.

Copy of letter from Messrs. Dharamsey & Co. to Messrs. K. C. Mitter & Co., Calcutta.

This is to inform you as from 15th instant the price of all full size brands except MOON DEER is raised to Rs. 1-9-0 loose per gross. Moon Deer price is kept at Rs. 1-8-0 per gross.

Half size we have raised to Rs. 1-4-0 per gross loose.

Please do not book any heavy orders to-morrow.

MESSRS. DHARAMSEY AND COMPANY.

B.—ORAL.

Evidence of Mr. G. DHARAMSEY recorded at Calcutta on Monday the 17th October, 1927.

Introductory.

President.—Mr. Dharamsey, we propose to go straight through your replies to the questionnaire and ask you for any further information that may be necessary to elucidate your replies.

Mr. Dharamsey.—Yes.

President.—Are you the manager of the firm ?

Mr. Dharamsey.—Yes.

President.—It is a private firm, is it not ?

Mr. Dharamsey.—It is a private company.

President.—What is your exact position in the firm ?

Mr. Dharamsey.—I am one of the partners.

Dr. Matthai.—How many partners are there ?

Mr. Dharamsey.—Five.

Dr. Matthai.—When exactly was the company formed ?

Mr. Dharamsey.—Messrs. Dharamsey and Company is a twenty year standing firm.

Dr. Matthai.—Doing various kinds of business ?

Mr. Dharamsey.—Yes.

Dr. Matthai.—What are your main forms of business ?

Mr. Dharamsey.—We are established in Bombay. We do skins and hides business. We have got a leather factory in Bombay. Besides that, we do pearl business. We are guarantee brokers to Messrs. Grams and Company, Bombay. We do various kinds of business.

Dr. Matthai.—Your main business is in Bombay.

Mr. Dharamsey.—Yes. We opened out our office here for a cigarette factory which we purchased, and in the cigarette factory we have opened a match department.

President.—What are your relations with the American Eastern Tobacco Corporation, Limited ?

Mr. Dharamsey.—We are their managing agents.

President.—Do they finance your match company ?

Mr. Dharamsey.—No; on the contrary we finance the American Eastern Tobacco Corporation, Limited.

Dr. Matthai.—That of course is a private limited company.

Mr. Dharamsey.—Yes, but the shares are practically held by Messrs. Dharamsey and Company.

Wood Supply.

President.—In answer to question 8 of the questionnaire you say that you are very near to the Calcutta canal from which all the Calcutta match factories take the supply of wood. I suppose that you get your wood from the Sundarbans.

Mr. Dharamsey.—Yes, it comes from the Sundarbans.

President.—It is Genwa wood, is it not ?

Mr. Dharamsey.—Yes.

President.—How far are you exactly from the canal?

Mr. Dharamsey.—About a mile.

President.—What is the carting charge ?

Mr. Dharamsey.—It is about twelve annas a cart but we take it generally in our own lorries.

President.—How much can you get in a lorry ?

Mr. Dharamsey.—I cannot tell you definitely. But I know that sometimes when there is no lorry, we pay about twelve annas for 15 maunds.

President.—Fifteen maunds in one cart ?

M. Dharamsey.—Yes.

President.—Your lorry charges would be somewhere about that.

Mr. Dharamsey.—About that or perhaps a little less because the lorry is running the whole day doing many things.

President.—That would be roughly one anna per maund.

Mr. Dharamsey.—Yes.

President.—When you get it at your factory, do you get it wet? It has got to be wet, has it not ?

Mr. Dharamsey.—The supply of wood is very scarce in the canal. We cannot go and buy 20 or 30 boats at one time. We can only buy two or three boats daily according to our requirements.

President.—You live very much from hand to mouth.

Mr. Dharamsey.—Yes, we have got to live like that. There is no other remedy.

President.—When we visited the Western India Match Company's works at Calcutta, we found them using the Sundarban wood, *viz.*, Genwa, for their veneers and they had large stocks of it.

Mr. Dharamsey.—It must be in proportion to their output. They cannot possibly keep Genwa for a long time and then work it. By keeping for a long time, Genwa becomes hard and when it is put on the machine for peeling, there is a lot of wastage.

President.—You can keep it in water, can you not ?

Mr. Dharamsey.—If you make splints out of that, they would be entirely dark.

Dr. Matthai.—If the wood is kept under water?

Mr. Dharamsey.—If the wood is kept under water and then if it is peeled and chopped, the splints would be entirely dark.

Dr. Matthai.—Even if you dry them as soon as they are chopped ?

Mr. Dharamsey.—If the wood is fresh, the splints would be white and if you dry them, they will remain white.

President.—Then this wood appears to be rather unsuitable.

Mr. Dharamsey.—Yes, for splints, but for boxes it does not matter whether the colour is white or black because blue paper comes on top of it.

Dr. Matthai.—What is the distance from the Sundarbans to Calcutta.

Mr. Dharamsey.—I do not know. It is a geographical point. But the wood is brought in the canal.

Dr. Matthai.—Does it come all the way by canal ?

Mr. Dharamsey.—Yes.

Dr. Matthai.—Could you tell me exactly what the arrangement is with regard to the supply of this wood? You buy it from the boatmen ?

Mr. Dharamsey.—Yes.

Dr. Matthai.—And these boatmen buy it from the villagers in the Sundarbans.

Mr. Dharamsey.—No. They take out the passes, do the felling themselves and bring them in a boat.

Dr. Matthai.—And you buy direct from the boatmen?

Mr. Dharamsey.—Yes.

Dr. Matthai.—We were told that these men were financed by middlemen.

Mr. Dharamsey.—There are one or two men who do that. But if you make arrangements with the boatmen and finance them yourself, you can get them direct.

Price.

President.—Can you tell me approximately the price ?

Mr. Dharamsey.—The price of wood varies very much. This year it has varied from eight annas per log to Rs. 1-4-0 per log.

President.—Could you tell us per ton of 50 c. ft. ?

Mr. Dharamsey.—It is very difficult indeed.

President.—It is difficult to work on the basis of price per 'log'. It may be long or short.

Mr. Dharamsey.—We have stated in our replies that we require so many logs per 100 gross of matches. I think, that is a correct average.

Dr. Matthai.—You give 30,000 logs as your annual requirements.

Mr. Dharamsey.—Yes.

Dr. Matthai.—If you take your annual requirements on the basis of 450 gross a day, it comes to about 140,000 gross a year. For that, you require 30,000 logs. Then, it seems that out of a log you make about 4¼ gross; so your log must be very small.

Mr. Dharamsey.—We have said that we require for full size 100 gross finished matches 32 logs, that is to say a little over 3 gross per log.

Dr. Matthai.—Your log must be 1 c. ft.

Mr. Dharamsey.—That is the average which we have found from experience in our factory.

President.—They are very small logs ?

Mr. Dharamsey.—Yes.

President.—From such a vague description as a log, it is difficult to arrive at conclusions ?

Mr. Dharamsey.—The log is so very uneven that it is rather difficult to find out exactly its cubic measurements. Until an expert measures and gives his opinion, I would stick to our statement that we require 32 logs per 100 gross.

President.—Generally a ton is taken as about 50 c. ft.

Mr. Dharamsey.—We purchase Aspen from Japan at one ton of 40 c. ft. Every country has its own measurements and weights.

Dr. Matthai.—The commercial practice is to regard a ton as equal to 50 c. ft. ?

Mr. Dharamsay.—As regards our imports from Japan, we regard one ton as being equal to 40 c.ft.

President.—In Burma at least the practice is to sell wood at the rate of 50 c.ft. per ton.

Mr. Dharamsey.—Might be.

President.—And I think the same is the case in Assam.

Mr. Dharamsey.—It is different in different countries.

President.—Could you not tell me in tons?

Mr. Dharamsey.—I would be very incorrect in giving it. It would be an easy matter for you to get these logs estimated or measured by an expert.

President.—I am afraid we have no expert.

Dr. Matthai. –It is for you to get the expert measurement done for us.

Mr. Dharamsey.—I will try and see if it can be done.

Dr. Matthai.—You might try.

Mr. Dharamsey.—Yes.

President.—If you could ascertain it either in c.ft. or in tons and send it to us, it would be useful.

Mr. Dharamsey.—I will try my best to do it.

President.—Amend your reply to question 14 accordingly.

Mr. Dharamsey.—Yes.

Labour.

President.—In reply to question 8 (*d*), you say that you have abundant labour around your factory which is also another consideration for the good situation of your factory. There seems to me a difference of opinion on the question of supply of labour. The Bhagirathi Match Factory tells us that labour is very scarce and very difficult to get.

Mr. Dharamsey.—That factory is in Barnagore.

President.—Is that very far away?

Mr. Dharamsey.—About four or five miles from our factory.

President.—Would there be so much difference in the supply of labour?

Mr. Dharamsey.—There are big factories round us such as the Britannia Biscuit Company, Lister Antiseptic Company, Messrs. Jessop and Company.

President.—Would you not call that a disadvantage because other factories may take away the labour available?

Mr. Dharamsey.—We find labour every day when we whistle, waiting at the gate.

President.—Would there be any difficulty in the Bhagirathi factory people sending anybody to Dum Dum to recruit labour?

Mr. Dharamsey.—I do not know why they write that there is no labour. We have always found that labour is ample.

President.—They say that labour is scarce and inefficient.

Mr. Dharamsey.—I would not endorse that view.

Quality of Indian made matches.

President.—In reply to question 9 (*a*) and (*b*), you say "The Indian made matches are not considered to be inferior in respect either of its burning quality or of any fault in its chemicals. The Indian matches made of Indian wood fall short only in the whiteness of its splints. The fibre and the strength of the Indian wood is considerably less than that of the imported wood. There is no prejudice against the Indian made matches in any respect whatever." If there is no prejudice agianst the Indian made matches, why do they fetch a very much smaller price?

Mr. Dharamsey.—Just for the reasons given above. When you come to strike, you would require to light your cigarette in the case of Indian matches two splints as against one in the case of foreign matches.

President.—I have found from my personal experience that the best Indian matches are very nearly equal to imported matches.

Mr. Dharamsey.—Do you mean matches made of Indian wood?

President.—Burmese wood.

Wood from the Andaman Islands.

Mr. Dharamsey.—The factories here tried to get wood from other sources but were unsuccessful. I also tried but could not get it. I understand that Government have given a monopoly to Adamjee's in the Andamans.

President.—Adamjee gets some wood from the Andaman islands.

Mr. Dharamsey.—We could not get it.

President.—That is only because there is difficulty in shipping it. The Chief Conservator of Forests there says that there is an ample supply of wood but that the difficulty is that there are not many ships going to Calcutta.

Mr. Dharamsey.—The station ship of the Andaman islands is now visiting Calcutta every month.

President.—You cannot get much wood from there if the steamer comes only once a month. If you want to get wood from the Andaman islands you have to make other shipping arrangements. The match factories in Calcutta will have to join together and charter a ship.

Mr. Dharamsey.—Yes, to bring wood.

President.—Our information is that there is a very good supply of wood.

Mr. Dharamsey.—That wood is much better in strength. I have seen that. I think they call it poplar wood. It is given in Government statistics as poplar wood.

Dr. Matthai.—Sawbya is the Burmese name for it, is it not?

Mr. Dharamsey.—I understand that it is called poplar in Government statistics.

President.—Have you imported any wood of that species?

Mr. Dharamsey.—No. Karimbhoy's have imported. I think they paid about Rs. 70 a ton, but I am not certain.

Dr. Matthai.—Do you mean Karimbhoy's in Bombay?

Mr. Dharamsey.—No, I mean the Karimbhoy Match Factory here which you visited yesterday or the day before. "Ahmedi" which is the station ship there belongs to the Eastern Steam Navigation Company of Bombay. We are one of their big shareholders. I tried through the Captain of that ship there but was unsuccessful.

President.—Did you write to the Conservator of Forests in the Andamans?

Mr. Dharamsey.—No.

President.—I think that it would be a sound thing to write to him. Certainly the report that we obtained from him is to the effect that there is plenty of wood and that they are opening out.

Mr. Dharamsey.—That wood is much better.

Dr. Matthai.—Both in appearance and in strength?

Mr. Dharamsey.—Yes. The appearance is much whiter than Genwa and the strength is also quite good.

President.—I suppose that if you were able to get that wood at Rs. 70 a ton, it would be worth while going in for it.

Mr. Dharamsey.—Yes.

President.—It is not so very irregular in shape.

Mr. Dharamsey.—No.

President.—You would probably get 3 gross per c.ft. instead of 2?

Mr. Dharamsey.—Yes, that wood would be more suitable.

President.—Where did you get your information that the supply is scarce?

Mr. Dharamsey.—Karimbhoy told us that that wood was unobtainable. Then I wrote myself to the Captain of the station ship there and when he came here he told me that it was very difficult to get it as Adamjee was controlling the supplies.

President.—They have a contract for 6,000 tons a year.

Mr. Dharamsey.—The Captain went so far as to tell me that Government were not even able to fulfil the contract.

President.—There is nothing like obtaining first hand information. I think that it is worth while writing to the Conservator of Forests.

Mr. Dharamsey.—Yes, I will do so.

Price differences.

President.—Then you say that the difference in price between Indian matches made of Indian wood and the imported matches ought to be at least Rs. 2 per gross. What do you mean by 'ought to be'?

Mr. Dharamsey.—The Indian made matches are retailed at one pice per box and looking to the fact that Swedish matches are retailed at 1½ pice, the Indian matches are not able to obtain a market at that little difference.

President.—Why?

Mr. Dharamsey.—Because those boxes are better. Their splints are also better.

President.—Why have you not been able to obtain the market?

Mr. Dharamsey.—Because those matches are much better in point of finish.

President.—If you look up the trade statistics you will see that Indian made matches are obtaining the market.

Mr. Dharamsey.—I don't think so. We have obtained almost the whole market formerly held by Japan. I got the sales Statistics from Japan and compared them and I found that their sales were decreasing every day in India.

President.—Similarly if you look at the trade statistics this year you will find that the imports of Swedish matches are also decreasing day by day, and that the Indian matches are replacing Swedish matches.

Mr. Dharamsey.—We want to make matches from imported wood. We could not do that at present prices. The difference in price at present is not sufficient to enable any Indian factory to go in for better qualities of matches except what we are doing at present.

President.—If you import Aspen wood, would you obtain a better quality of matches?

Mr. Dharamsey.—Yes, but even if we import Aspen wood and produce a better quality of matches, we have got to sell at one pice per box.

President.—Why?

Mr. Dharamsey.—To get the market. The reason is that it is made locally.

Dr. Matthai.—When the Swedish matches are sold at 1½ pice per box, you are able to realise one pice. Supposing you get one pice, would not that cover your cost and give you a fair profit?

Mr. Dharamsey.—To produce matches of the types placed by the Swedish Match Company on the market we have to go in for heavy outlay. We have to import a lot of machinery.

Dr. Matthai.—You have not made up your accounts yet.

Mr. Dharamsey.—Yes, I have brought the accounts here.

Dr. Matthai.—Tell me in the main at the price which you have been able to realize since 1926, have you been losing?

Mr. Dharamsey.—No.

Dr. Matthai.—You have been obtaining how much per gross?

Mr. Dharamsey.—Rs. 1-8-0 to Rs. 1-9-0 per gross.

Dr. Matthai.—If you are able to get Rs. 1-8-0 you make a profit?

Mr. Dharamsey.—With Rs. 1-8-0 we are making a little profit which enables us to pay our interest on the outlay.

President.—I still do not follow why you say the difference in price between Indian and imported matches should be Rs. 2?

Mr. Dharamsey.—That means that they would have to retail their matches at 2 pice per box and people in India who now pay 1½ pice per box for their matches would not mind paying 2 pice per box. The Government would therefore get better revenue and at the same time it would afford the Indian manufacturer opportunity for making select quality matches.

President.—If you manufacture select quality matches you get better price for that, do you not?

Mr. Dharamsey.—But in that case in the beginning we would have to go in for better machinery but I don't think it would tempt any manufacturer to go in for it unless there is a sufficient demand. Looking at the present situation, with Swedish matches selling at 1½ pice there is nothing to indicate that they will be able to capture the market.

The Company's request.

President.—When you say that what you mean is that you would like the duty to be put up to enable you to get a better price, is that correct?

Mr. Dharamsey.—Not better price but to enable us to manufacture select matches. But to do that we will have to go in for heavy outlay for machinery and so on in the beginning. Looking at the present situation of the market I don't think we can fetch anything more than 1½ pice, but if the Swedish matches sell at 1½ pice per box we won't be able to get that.

President.—But you must appreciate that any recommendations we made must be based on the figures obtained from factories which really have up to date machinery?

Mr. Dharamsey.—There are very few factories here who have got up to date machinery. One or two have brought in modern machinery but these machineries are not coming out every day. They are three or four years old and don't you think types of machinery are daily changing and improved?

President.—It stands to reason that any proposals we may make must be based on the figures of properly equipped factories.

Mr. Dharamsey.—Yes, but I don't think a very big factory with up to date machinery would be a paying concern. Take the case of Messrs. M. N. Mehta & Co.'s Match works for instance. They have most up to date and modern machinery but they are not working at a profit.

President.—You say an up to date factory is not a paying concern but that a factory which is not up to date is a paying concern; what is the reason for that?

Mr. Dharamsey.—It must be due to management or sales; there might be a good many other reasons. The chemicals must be all right; the sales organization must be good. It is not the machinery only that makes all the difference.

Dr. Matthai.—I may put it to you this way. You have not been in actual operation even a year, but during these few months you have been able to realize a price which at any rate covered your cost. You are now going to increase your output; you are going to get new machinery sooner or later. As a result of improved machinery and increased output you would be able to economize and bring down your costs. That will give you a slightly bigger margin than you have now. What I am trying to suggest is this, that as a result of your own efforts you are likely, in the near future, to get a margin which would enable you to do this selection without the aid of further tariff.

Mr. Dharamsey.—Up to now we have not manufactured anything out of aspen wood. We have been all this time working on genwa.

Dr. Matthai.—I do not think we could regard the future of the Indian industry as a safe matter so long as you depend on aspen. You have got

to establish your case on Indian wood and, therefore, supposing it becomes necessary for you to make a certain amount of selection out of the Indian wood, the extra cost that it might mean for you might, I suggest, be covered by the economies you made on an increased output and with improved machinery.

Mr. Dharamsey.—Quite possibly.

Dr. Matthai.—Therefore it is very likely you would be able to get on without any increase in the duty.

Mr. Dharamsey.—We do not ask for protection in the case of genwa. Even with the present duty 50 per cent. of matches used in India are still imported. We want importation to cease. That is our idea.

President.—Importations are rapidly diminishing, are they not? You will never stop importation completely because there will always be a certain number of people who will for one reason or other say "we must have Bryant and May's matches or Swedish matches." You cannot prevent that.

Mr. Dharamsey.—That is true.

President.—As regards other people, so far as we can see from the trade returns they are rapidly substituting Indian matches for Swedish matches.

Mr. Dharamsey.—What is going down is not passing into the hands of the Indian match factories.

President.—To whom is it passing?

Mr. Dharamsey.—To the Western India Match Company who are manufacturing out here as a substitute for imported matches.

President.—But the fact remains that it is Indian matches whether made by the Western India Match Company or by other firms which are taking the place of the imported matches.

Mr. Dharamsey.—That is quite true.

Wood Supply.

President.—We have already asked you about the size of the logs and so on in questions 13 and 14 and you have promised to give us figures in tons so far as is possible.

Mr. Dharamsey.—We will let you have that.

President.—You say that your supply of wood is really a hand to mouth supply and that you cannot keep it in stock for any length of time and that prices vary considerably and it is not always possible to obtain wood when you want it, so that so far as Calcutta is concerned it would appear that there is not an ample supply of your main raw material.

Mr. Dharamsey.—Up to now we have not closed down a day for short supply of wood. Generally in the hot months the supply of wood is very scarce but we have always tried to keep stocks of splints and boxes.

President.—That does not make for economical production, does it?

Mr. Dharamsey.—No.

President.—So that one of the natural advantages of the match industry which exists in other parts of India does not appear to exist in Calcutta.

Mr. Dharamsey.—We would not say that the supply is ample but we would not say that it is scarce.

President.—You cannot say that you have a plentiful supply. So far as I have been able to ascertain the supply for match manufacture is scanty partly because the wood is used for other purposes too. At one of the lead sheet mills we were inspecting a month or so ago, we found that the fittings for tea boxes were being packed in small packing cases made of this particular wood, and it must be used for a number of other purposes in a large town like Calcutta.

Mr. Dharamsey.—That is quite possible. But I think the packing case manufacturers are not able to purchase genwa because the match manufacturers are paying a better price for it. They are not very much tempted to buy it. Sometimes they come to our factories and buy the wood which is dry and which we sell at concession rates.

President.—That means that the price has increased?

Mr. Dharamsey.—Yes. The minimum price we paid last year was 6 annas and this year the minimum price paid is 8 annas.

President.—So far as wood is concerned, as the industry stands at present, you have not got a secure supply of raw material.

Mr. Dharamsey.—The Forest Department can always try to grow wood in suitable places.

President.—How long would that take?

Mr. Dharamsey.—About three to four years.

President.—It takes about 30 years for soft wood. A rotation of 30 years is usually accepted by the Forest Department as approximately correct. In Assam where they have planted cotton tree (simul), we found plantations laid down in 1914 were still not nearly ready for cutting. We were told in Burma that the shortest cycle within which they would expect the simul to be grown would be 30 years. So that you will see that it is not possible for the Forest department to arrange for the supply of wood in a short time.

Mr. Dharamsey.—I read the Indian Chamber of Commerce report in which they said that genwa would grow in 3 to 4 years.

President.—It would be out of the question for any wood to grow to sufficient size in 3 or 4 years to make its use an economical proposition. You see Government cannot manufacture wood; they can plant it but cannot control the rate of growth.

Mr. Dharamsey.—I think India being such a vast country, wood will always be available if Government adopts a policy of plantation. I think the present supplies would last for at least 30 years.

Dr. Matthai.—Is there any area from which you expect to get wood apart from the Sundarbans? Supposing, for example, the difficulty about getting wood becomes greater, is there any other area accessible to you?

Mr. Dharamsey.—Yes, Assam. I have written to a contractor in Shillong asking him to send us a shipment to see the cost of freight, floating and so on.

President.—When you get the shipment would you send us information about freight and so on?

Mr. Dharamsey.—Yes. I have placed the order with the director of the Commercial Carrying Company, Shillong. He is interested in some wood. He saw us and asked us to place an order with him. He said it was something like the Andaman stuff.

President.—Would you give us the name of the wood, the freight per ton and the total amount of the consignment in tons?

Mr. Dharamsey.—Yes.

President.—As regards the Andamans you say you have not been able so far to get any supply of wood?

Mr. Dharamsey.—That is so.

Dr. Matthai.—This 8 annas that you mention as the cost of wood, is that landed at the factory or at the canal? Does that include cost of transportation to the factory?

Mr. Dharamsey.—No; that would come to an anna per log.

President.—And the maximum price you paid was Re. 1-4-0 *plus* one anna.?

Mr. Dharamsey.—Yes.

President.—Then you say "We hear that some wood from the Andaman coast is much better in strength and colour than genwa but the supply of which is very scarce, and if we were to get supplies of this wood regularly we think that it would help the manufacturers." Then further down in answer to question 22 you say "We hear from the boatmen who bring wood from the forests that at present the Government has closed up more areas of forests and therefore the supply will be less now and naturally the prices will rise." You mean that the forests in the Sundarbans are closed down from time to time for regeneration?

Mr. Dharamsey.—Yes.

President.—The only new area from which wood has been obtained by the match manufacturers in Calcutta is the Andamans?

Mr. Dharamsey.—Yes.

President.—Otherwise so far as you are aware, you have had no importation of wood from any other region, for example the Buxa forest range?

Mr. Dharamsey.—No.

President.—You say the supply of wood is a matter for Government. You say Government should offer facilities to grow wood. What facilities do you contemplate?

Mr. Dharamsey.—They must let us know what suitable areas there are where plantations are possible.

President.—That is really a part of the duty of a commercial undertaking, is it not?

Mr. Dharamsey.—The industry is new and to make it an economical proposition we must in the beginning have some help from the Government Forest Departments as to suitable areas and concessions in granting us leases.

Dr. Matthai.—You have had no consultation with the Forest Department in this matter?

Mr. Dharamsey.—No.

President.—You think the Forest Department would be a suitable agency to advise you where to plant your trees?

Mr. Dharamsey.—Yes. They have experience of genwa as to where it will grow.

President.—You know that it grows in the Sundarbans.

Mr. Dharamsey.—That is so, but we would like to know whether there are any other places. We do not know whether there are any other areas where we can plant the wood.

President.—Surely the initiative should come from you. Your representation conveys the impression that the initiative should come from Government. Government cannot be expected to understand the difficulties which you as manufacturers are experiencing unless that is brought to their notice.

Mr. Dharamsey.—I admit that the initiative should come from manufacturers who are doing the business for the last five or six years. As a matter of fact our factory is absolutely new.

President.—Still it would be your soundest policy, if you experienced any difficulties, if you wish to grow wood, and if you think it would be possible to obtain areas, to consult the Forest Department.

Mr. Dharamsey.—We know you would recommend to Government that facilities, if asked for, should be granted.

President.—Why not ask for facilities and see if they are granted.

Mr. Dharamsey.—As a matter of fact when the question is taken up by the Tariff Board it is quite possible that the Tariff Board will recommend to Government that facilities must be granted.

President.—Surely the most obvious and straightforward method, if you want facilities from the Forest Department, is to write to the Forest De-

partment whom we have found to be very sympathetic in the matter of the supply of soft wood. Obviously it is as much to the interests of the Government to find outlets for their soft wood and it is also to the interests of the match manufacturers to obtain an adequate and regular supply.

Mr. Dharamsey.—Yes, it would be to our interests.

President.—It would suit both parties.

Mr. Dharamsey.—Yes.

President.—So that if it is possible, the Forest Department would meet you in every possible way.

Mr. Dharamsey.—We would approach them.

President.—We have found that the manufacturers in other parts of India have approached the Forest Department. In Burma at any rate the manufacturers are in very close touch with the Forest Department.

Dr. Mattnai.—Do you know if this wood is used for any other purpose?

Mr. Dharamsey.—Not except for packing cases.

Dr. Matthai.—I mean the whole demand for genwa comes practically from the match manufacturers.

Mr. Dharamsey.—Yes.

Other Raw Materials.

President.—In answer to question 27, other raw materials, you say that the question will be replied confidentially. Why do you wish to give this information confidentially?

Mr. Dharamsey.—It is a little business secret.

President.—Why is it a business secret?

Mr. Dharamsey.—You want to know actually the amount of chemicals used and the proportions in which they are mixed.

President.—We want to know the amount used. The other firms have not raised any difficulty in the matter. For instance the Bhagirathi Match Works have given us replies.

Mr. Dharamsey.—As a matter of fact I have brought replies to those questions. My instructions are to give you confidentially and not for publication.

Dr. Matthai.—You would not be disclosing any secret if you gave the total amount of each chemical that you require for your output.

Mr. Dharamsey.—The question is: What quantity of each of these materials is required per 100 gross of boxes of matches? I have worked that out per 100 gross. Therefore the whole mixing proportion has to be given to you.

President.—Not necessarily. There is a considerable amount of wastage.

Mr. Dharamsey.—Practically the whole thing comes in it. The only thing is that we don't wish the same to be published.

President.—The Esavi India Match Manufacturing Company have sent us replies to question 27 (handed in).

Mr. Dharamsey.—As a matter of fact I am not very keen on that. Here are our answers to questions 27 and 28 (handed in).

President.—You get these at the wholesale rates.

Mr. Dharamsey.—Yes.

President.—I suppose formulæ differ with different firms. I would just like to run through your answer to question 27 and compare the amounts used per gross with Adamjee's amounts. You say potash chloride. Is that potassium chlorate?

Mr. Dharamsey.—Yes.

President.—You use 25 lbs. of potash chlorate per 100 gross whereas Adamjee uses 15 lbs.

Mr. Dharamsey.—Yes.

President.—As regards sulphur you use 2 lbs. and Adamjee also uses 2 lbs.

Mr. Dharamsey.—Yes.

President.—You use 5 lbs. of manganese against Adamjee's 1 lb.

Mr. Dharamsey.—Yes.

President.—You use lamp black one lb., whereas this item is not given in Adamjee's list.

Mr. Dharamsey.—It is used for colouring purposes. They can either use manganese ore or lamp black.

President.—Glass powder—that is approximately the same in both cases.

Mr. Dharamsey.—Yes.

President.—You use one lb. of potash bichromate as against Adamjee's ½ lb.

Mr. Dharamsey.—Yes.

President.—Iron oxide, you use 3 lbs. as against Adamjee's 2 lbs.

Mr. Dharamsey.—Yes.

President.—Glue—Adamjee uses 2¼ lbs. against your 5 lbs.

Mr. Dharamsey.—Yes.

President.—Red phosphorus—is that amorphous phosphorus?

Mr. Dharamsey.—Yes.

President.—You use the same as Adamjee.

Mr. Dharamsey.—Yes.

President.—You use red lead. Is there any other name for that, because I don't find that item in Adamjee's list.

Mr. Dharamsey.—No. They might use red manganese. It is for colouring purposes. It is used in conjunction with red phosphorus.

President.—Antimony you use 1⅛ lb., against Adamjee's ¾ lb., and paraffin you use 8 lbs., as against his 17 lbs.

Mr. Dharamsey.—There is quite a big difference in the matter of paraffin.

President.—You do seem to use rather more of the expensive chemicals.

Mr. Dharamsey.—Perhaps if you total up, I think it would be about the same. These proportions vary according to climatic conditions.

President.—You use about 59 lbs. of chemicals as against Adamjee's 47 lbs. of chemicals.

Mr. Dharamsey.—This is the proportion that we gave for the present monsoon.

President.—It appears that you are using more of the expensive chemicals than he does.

Mr. Dharamsey.—This is how we compare with the Esavi India Match Manufacturing Company.

	The Esavi India Match Manufacturing Company.	Our Company.
	lbs.	lbs.
Potash chlorate	35	25
Sulphur	2	2
Red phosphorus	2	1¼
Paraffin	13	8

We seem to use paraffin less. Perhaps it might be due to this. They submitted their report much earlier than myself and at that time they were using that hard paraffin. Since then Messrs. Shaw Wallace and Company have prepared a special match paraffin which in point of consumption is less nd serves a better purpose. I think they must now be economising.

Dr. Matthai.—How long ago was that?

Mr. Dharamsey.—They put it on the market 6 months ago.

Dr. Matthai.—Do you find that quite satisfactory?

Mr. Dharamsey.—Yes, the quantity consumed is much less than the other paraffin.

Dr. Matthai.—We were told that the Indian paraffin didn't have the right melting point.

Mr. Dharamsey.—This match paraffin melts up quicker and it serves the purpose.

President.—Your price is more or less the same.

Mr. Dharamsey.—Yes.

President.—Do you think there is a possibility of economy in your materials?

Mr. Dharamsey.—We were purchasing that hard paraffin at As. 3-9 per lb. Messrs. Shaw Wallace and Company are now supplying at As. 3 per lb. There is 25 per cent. saving.

President.—Apparently your wood is considerably cheaper than Adamjee's wood, but your cost of chemicals is considerably higher than his. I mean the cost of other raw materials. What do you include in your other raw materials? Possibly there might be a difference.

Mr. Dharamsey.—In the beginning other raw materials must be a little higher, because there are so many things when you build a new factory.

President.—What are the items included under the other raw materials?

Mr. Dharamsey.—Bolts and nuts for putting up a new factory.

President.—That is all capital cost. What are the other raw materials apart from chemicals and wood?

Mr. Dharamsey.—We require brushes, etc., for the upkeep of the machinery.

President.—That will come under ordinary current repairs. Under raw naterials is included the paper for labels.

Mr. Dharamsey.—Yes, and printing.

President.—The cost of other raw materials is mainly paper.

Mr. Dharamsey.—No. The cost of paper is for wrappers only whereas in the other raw materials are given the cost of paper for labels and the printing charges of labels.

President.—Could we take it that the cost of other raw materials is the cost of labels and the cost of printing?

Mr. Dharamsey.—And there are so many other things such as gum which you require.

President.—Is that not included in chemicals?

Mr. Dharamsey.—No. That is for finishing purposes.

Dr. Matthai.—Why do you want packing cases? You don't sell your matches at any great distance from your factory, do you? You sell mostly in Calcutta.

Mr. Dharamsey.—We sell in Calcutta as well as in mufassil. All go out in packed up cases. Even in Calcutta we sell matches in packed up cases. We generally have them packed up in cases and when the order comes for loose stuff then we open out and supply loose, because we can't keep the stuff open. It might get damaged.

Dr. Matthai.—You don't use that case. If you sell the stuff loose out of that, the packing case is available for another.

Mr. Dharamsey.—Yes, but then we have to give them an empty case allowance. It comes to the same thing.

Dr. Matthai.—You get so much less for loose.

Mr. Dharamsey.—Yes, otherwise they would take the case and sell it in the bazaar.

Dr. Matthai.—Your rates are so much for loose and so much with case.

Mr. Dharamsey.—Yes.

Dr. Matthai.—We were told in Burma that for matches actually sold in Burma and not exported to India, they had them packed simply with zinc sheets. They had no wooden cases. It is only in the case of matches exported to Madras or Calcutta, they used wooden packing cases.

Mr. Dharamsey.—I think the zinc lining is not required at all for Bengal. That would be an economy. We use it. We spend about Rs. 3 a case and dealers get As. 12. It is useless except in the monsoon. It is just for safety's sake you might put it in.

President.—Why do you do it at all?

Mr. Dharamsey.—It means all the factories have to stop. I alone can't do it. I have to follow the general rule.

President.—You have got the Indian Match Manufacturers' Association. Don't they exercise any unifying influence over the various companies?

Mr. Dharamsey.—I am not a member of that Association. I am a member of the Indian Chamber of Commerce.

President.—What functions does this Association perform?

Mr. Dharamsey.—I have never attended their meetings though I have received many invitations.

President.—It does not comprise big match manufacturers.

Mr. Dharamsey.—No. The Esavi India Match Manufacturing Company and ourselves are in the Indian Chamber of Commerce.

President.—For an expression of their views we have to look to the Indian Chamber of Commerce.

Mr. Dharamsey.—Yes.

Dr. Matthai.—What price do you pay for your tobacco packing cases?

Mr. Dharamsey.—It depends on the sizes.

Dr. Matthai.—If we took a packing case of the sort required for 50 gross full size.

Mr. Dharamsey.—They are paying Rs. 3-1-0 for a case.

Dr. Matthai.—What you tell us here is that these people get big wooden motor cases and get the planks from them.

Mr. Dharamsey.—They have got a fully equipped plant for nailing and gluing.

Dr. Matthai.—You get the case ready made.

Mr. Dharamsey.—If we want to purchase the case locally, it would come to about Rs. 3-4-0.

President.—You say in answer to question 29 that if attempts are made with Government help, all the chemicals could be possibly manufactured in India. I suppose it is possible to manufacture chemicals anywhere at a price. You don't say that it can be economically manufactured.

Mr. Dharamsey.—No. I mean Government advice, that is all.

Need for imported labour.

President.—In answer to questions 30 and 31, you say that you don't think it necessary to import any skilled labour. How do you look after your machinery?

Mr. Dharamsey.—Any Indian could manage a machine.

President.—We found that Adamjee had one German and one Austrian in charge of his machine.

Mr. Dharamsey.—It is quite possible that he might think it necessary.

President.—Do you not find the machinery delicate?

Mr. Dharamsey.—Yes.

President.—Is it not difficult to look after the machinery?

Mr. Dharamsey.—No. It is quite possible that there may be breakages while working. We have a foundry in the cigarette factory and whenever anything goes wrong, we immediately get it repaired.

Machinery.

Dr. Matthai.—I find that most of your machinery is locally made in Bengal?

Mr. Dharamsey.—Only the peeling and chopping machines have been purchased locally from the Bhawani Engineering Company.

Dr. Matthai.—Do they make these themselves?

Mr. Dharamsey.—Yes. But I am not going to purchase any more. I have made arrangements to erect them myself.

Dr. Matthai.—Have you got to pay any royalty?

Mr. Dharamsey.—I have made my own different patents in our own factory. We have got a fully equipped plant for making new machinery in the American Eastern Tobacco Corporation, Limited. We have expert labour there to build new machines. We won't get their patents, never. We have changed the shape and everything and even the system of working is different. The machines will run on a different rotation. Only we got the idea from the machines which we purchased locally.

Dr. Matthai.—The local machinery is made on the Japanese models.

Mr. Dharamsey.—I think that they have copied German models.

Dr. Matthai.—Are you familiar with match machinery?

Mr. Dharamsey.—Yes.

Dr. Matthai.—How does the local machinery compare with foreign machinery such as Roller's?

Mr. Dharamsey.—Quite good.

Dr. Matthai.—What is it made of?

Mr. Dharamsey.—It is made of cast iron.

Dr. Matthai.—Roller's machinery is also made mainly of cast iron, is it not?

Mr. Dharamsey.—Yes.

President.—What about the knives?

Mr. Dharamsey.—We have to import them.

Distribution of labourers.

President.—You have 150 labourers.

Mr. Dharamsey.—Yes, in the match factory.

President.—Could you give us an idea as to how they are distributed, so many on the cutters, so many on the lathes and so on?

Mr. Dharamsey.—Off hand it would be difficult to give you, but I can send you later on.

President.—Most of these are engaged in wrapping the boxes and so on?

Mr. Dharamsey.—No.

President.—When you packet a gross of boxes, is it done by hand or not?

Mr. Dharamsey.—Yes.

President.—And labelling?

Mr. Dharamsey.—That is done partly by hand and partly by machinery.

President.—Most of the labour is employed in packing and labelling.

Mr. Dharamsey.—I can send you correct information later.

Dr. Matthai.—Everything that can be done by machine is done by machine in your factory.

Mr. Dharamsey.—In another two months' time, everything will be done by machinery.

Dr. Matthai.—At present packing is done by hand.

Mr. Dharamsey.—At present the dozen packing is done by hand but we have placed orders for all kinds of packing and other machines. Within two months' time, we will be able to eliminate all hand labour.

Dr. Matthai.—Now boxes are made partly by hand and partly by machinery.

Mr. Dharamsey.—Yes.

Dr. Matthai.—How do you arrange that?

Mr. Dharamsey.—We do it on a contract basis. We make them do the work in our premises.

Dr. Matthai.—Do they do it in your premises?

Mr. Dharamsey.—Yes.

President.—Do you sell undipped splints?

Mr. Dharamsey.—No.

President.—I understand that it is the custom here to sell undipped splints.

Mr. Dharamsey.—When the cottage industries used to flourish a little bit, they used to come and buy the rejected splints.

President.—Were all the splints sold rejected splints?

Mr. Dharamsey.—Mostly those that did not go in the frame filling machine.

President.—They fetch from Rs. 2 to Rs. 15?

Mr. Dharamsey.—I don't think that anybody paid more than Rs. 12. At any rate I don't think we got more than Rs. 12. We are not selling now.

President.—From your point of view and from the point of view of the bigger factories, you would not encourage the system of selling rejected splints?

Mr. Dharamsey.—I would rather like to burn them.

President.—You would prefer to burn them?

Mr. Dharamsey.—Yes.

President.—Otherwise it would mean more competition from cottage industries.

Mr. Dharamsey.—Now that the prices have come down as a result of competition, the cottage industries cannot affect us.

President.—They bought their splints, put them in hand filling frames, hand-dipped them, made the boxes by hand and filled them up with splints by hand. That is a sort of thing which, from the point of view of the bigger manufacturers, you would rather discourage.

Mr. Dharamsey.—We would not discourage. But we would not like at the same time to encourage them.

President.—Their business must interfere with your business to some extent.

Mr. Dharamsey.—Yes, a little. These people have no overhead charge and if they have they don't count it. But at present they are unable to compete.

President.—Would you look at it from a slightly different point of view? If they purchased your inferior and rejected splints, hand-dipped them and put them on the market, the reputation of Indian matches would be spoiled.

Mr. Dharamsey.—Certainly.

President.—Do you attach importance to that aspect of the case?

Mr. Dharamsey.—They have created a very bad reputation. Very often something rotten is put in the boxes.

Wastage in box making machines.

President.—When you started to make boxes on the box making machine, what was the number of boxes spoilt? Could you give us some idea of the percentage of boxes spoilt?

Mr. Dharamsey.—I could not give you off hand. I would like to consult the books.

President.—Adamjee gave us some figures showing what the percentage of spoilt boxes was in the first year or first six months and what the percentage was at present. The figures showed an improvement in the Indian labour.

Mr. Dharamsey.—I will try and send you our figures.

Market.

President.—Why do you export your matches? Is there not a big market here?

Mr. Dharamsey.—We are selling about 80 per cent. here.

President.—Is it a good proposition to sell in Madras when you have to pay so much as railway freight?

Mr. Dharamsey.—We sell f.o.r. Calcutta. We don't sell anything cheaper at Madras.

President.—In Assam, they have their own match factory.

Mr. Dharamsey.—It is always good to sell where there is competition. I always follow that principle. I sell in Dhubri where there is a match factory.

President.—You say that the imported matches are about half. The statistics show that 6 millions are imported. You say that the consumption of India is about 20 millions.

Mr. Dharamsey.—That is so according to the Indian Chamber of Commerce.

President.—You have not made any estimate.

Mr. Dharamsey.—No. I could not work it out myself. So I asked the Indian Chamber of Commerce and they told me 20 millions.

President.—With an import of only 6 millions, it is probable that the production of Indian matches is considerably in excess of the imports at present.

Mr. Dharamsey.—I think that it is about 50 per cent.

President.—Surely more than 12 millions are consumed in India.

Mr. Dharamsey.—I have been told by the Indian Chamber of Commerce that the total consumption is about 20 millions.

President.—The total import is only 6 millions.

Mr. Dharamsey.—Naturally if the estimate of 20 millions is correct, the Indian matches must be selling more. I do not know if the estimate of the Indian Chamber of Commerce is correct. When the Indian Chamber of Commerce estimated the consumption at 20 millions, they said in their report also that 50 per cent. are still being imported.

President.—Ten millions are not being imported. I think probably their estimates have been drawn up sometime ago. The imports have dropped very much recently. Now as regards question 48 (*a*) "To what extent is the market served by imported matches distinct from that served by matches manufactured in India". What we wanted to ask you was whether you could make any sharp distinction between the two markets, *viz.*, the town market or the seaport market supplied from abroad and the upcountry market supplied by Indian made matches. Is there any distinction at all?

Mr. Dharamsey.—Do you mean more keen competition?

President.—Where?

Mr. Dharamsey.—There is more competition in the ports.

President.—Are not imported matches sold upcountry?

Mr. Dharamsey.—It should be less in proportion to what is sold in the ports.

Dr. Matthai.—How much of your output is sold in Calcutta?

Mr. Dharamsey.—About 80 per cent.

Dr. Matthai.—Then very little I suppose is sold in Madras.

Mr. Dharamsey.—Only we send to our Guntur office where we buy tobacco. As a matter of fact we are unable to supply with our present output those distant markets.

Dr. Matthai.—Most of the matches sold in Calcutta are full size or half size?

Mr. Dharamsey.—It is full size.

Dr. Matthai.—The general demand in Calcutta is for full size.

Mr. Dharamsey.—Yes. There is no importation of half size matches in Calcutta at all.

Dr. Matthai.—In Bombay it is the other way about.

Mr. Dharamsey.—Yes, in Bombay the demand is for half size.

Dr. Matthai.—Can you account for the difference? Why should there be this difference between Calcutta and Bombay?

Mr. Dharamsey.—I think Bombay people like to use small matches. They have been using the smaller size for a very long time and it is easy for them to carry the smaller box in their pockets.

Prices.

President.—In answer to question 50 you say that the imported matches compete with both matches manufactured out of indigenous woods and with matches manufactured from imported woods. And then in reply to question 51 (1), you say that you have no information at all as to foreign prices.

Mr. Dharamsey.—I can give you the price at which they are sold in the market but not the prices at which they enter the country.

President.—You cannot give the c.i.f. price?

Mr. Dharamsey.—No.

President.—You can give the price at which they are sold in the market.

Mr. Dharamsey.—Yes, Rs. 2-13-0 to Rs. 2-14-0 per gross.

President.—What are the prices at which Indian matches manufactured from aspen wood are sold?

Mr. Dharamsey.—They are now being sold at Rs. 1-9-0 to Rs. 1-12-0 per gross.

President.—What are the prices of Indian matches manufactured from indigenous woods?

Mr. Dharamsey.—Rs. 1-6-0 to Rs. 1-8-0 per gross.

President.—Then the difference in value between aspen wood and Indian wood matches is about three annas.

Mr. Dharamsey.—Yes.

President.—You say "We have reason to believe that the price at which matches are imported from Japan are very unremunerative." Could you give us your reasons?

Mr. Dharamsey.—From our own experience. They are selling at Rs. 2-8-0; taking off the duty it means Re. 1 per gross. We could not possibly manufacture at that price.

President.—Would you ever be able to manufacture at Re. 1?

Mr. Dharamsey.—I cannot say; we are getting the materials cheaper now in some instances.

President.—The Japanese match industry has been established for a long time and it is possible for them to produce at a much lower cost.

Mr. Dharamsey.—Quite possible, for higher the production lower is the cost.

President.—But you think they are actually losing?

Mr. Dharamsey.—Considering that the Swedish are not trying to sell at Re. 1 per gross, it is evident that if they are not losing, they cannot make any money on it.

Machinery Prices.

President.—In answer to question 54 (*a*) you say "The prices of some of the machines have been recently increased by the Swedish Trust". Could you give us details?

Mr. Dharamsey.—The price for their box pasting machine has been raised.

President.—Since when?

Mr. Dharamsey.—Since about the last six months.

President.—By how much?

Mr. Dharamsey.—I think it is by about Rs. 1,000 on both inner and outer.

President.—Can you get these from anywhere else?

Mr. Dharamsey.—Yes, from Rollers, Germany.

President.—Have they raised their prices?

Mr. Dharamsey.—No, but the Swedish pasting machine is out and out the best and gives a better outturn, and the finish is better and you can work it easier.

President.—Is your present box making machine a German machine.

Mr. Dharamsey.—Yes.

President.—That is not Rollers.

Mr. Dharamsey.—No, that is by Boreman.

President.—Where did you buy that?

Mr. Dharamsey.—Somebody had imported it to Calcutta and he sold it to us at the invoice price.

President.—Is that cheaper than Rollers or Swedish?

Mr. Dharamsey.—Yes.

President.—How do Rollers prices compare with Swedish prices generally on all types of machinery?

Mr. Dharamsey.—Swedish prices are generally higher but quality for quality they are better. The Swedish is easier to work; it gives better outturn and if you take all these into consideration even at the price charged it is cheaper.

President.—Is there any kind of machine which you have to use which cannot be made locally? You have your peeling and chopping machines made locally, do you not?

Mr. Dharamsey.—Yes.

President.—What about the frame filling machine?

Mr. Dharamsey.—Nobody has tried to erect it here as yet. That is Japanese.

President.—I thought most Japanese machines could be manufactured locally.

Mr. Dharamsey.—The frame filling and label pasting machines have not yet been made locally but they would be gradually made here because they are all simple machines.

President.—Supposing the Indian manufacturers were thinking of starting this business on a fairly large scale, would it not be better to get all the machinery from abroad not simply on the question of price because you can get them cheaper, but because ultimately you will find that the imported machinery is better?

Mr. Dharamsey.—I do not think so. The machinery we have been erecting and with which we are working are quite satisfactory.

President.—You told us just a little while ago that the products have a better finish with the Swedish machines.

Mr. Dharamsey.—I meant the box making machine, but all the machines which have up till now been erected in India are quite as good as those imported from abroad and very much cheaper, almost half the price.

Railway Freights.

President.—In answer to question 54 (*f*) you say "Freights on finished products are, we consider, very high." Have you ever contemplated making out a case before the Railway Rates Committee?

Mr. Dharamsey.—We are now working it out.

Customs Duties.

President.—Why do you say the customs duties on imported materials should be decreased?

Mr. Dharamsey.—We have to pay 15 per cent. on chemicals which is high.

President.—Obviously all manufacturers would like to have the duties decreased.

Mr. Dharamsey.—They generally would, but this industry is considered to be, by us at least, an industry of national importance for the benefit of India. India consumes a large quantity of matches and if facilities are granted to this industry it would be to the interest of India and she would recoup all the assistance that is granted to us now.

President.—Why should not the consumer of matches pay 15 per cent. just as other consumers do?

Mr. Dharamsey.—We require some encouragement to go in for it, and to enable the industry to be put on a sound footing and to face world competition.

President.—But you have a duty of between 100 and 200 per cent. against your competitors.

Mr. Dharamsey.—It is about 100 per cent. on the Swedish Rs. 1-8 and they are selling at Rs. 2-14. But do not go on that percentage because no sooner you allow Swedish matches to sell at a retail price of one pice per box the whole Indian industry will be wiped out.

President.—You have a duty of about 120 per cent. over your competitors. You say the customs duties on ingredients should be decreased because they are excessive. I do not understand what case you can make out for a decrease in customs duties.

Mr. Dharamsey.—That would afford us facilities to manufacture, even by reduction of duties the manufacturer would gain. That applies to any manufacturer if he gains a little. In this particular industry immediately the manufacturer has got a little money he will set his mind to developing the industry in other spheres just like chemicals. We have got so many things to look after.

President.—Does that not apply to other manufacturers?

Mr. Dharamsey.—Not exactly; You have got to go into so many details in the matter of chemicals. If we have to go in for the manufacture of those chemicals that would be a very hard job. It should be the concern of chemical companies to manufacture chemicals. I admit we have not got a very strong case for that.

President.—What would be your meat would be the chemical industry's poison. If we reduce the duty on chemicals that would be to the advantage of match manufacturers but it would injure the manufacture of chemicals. The chemical industries in India which are fairly large would be handicapped.

Mr. Dharamsey.—That is so. We are using chemicals manufactured in India.

President.—Why should grant of protection or increased protection, or for example if this duty was made protective duty instead of a revenue duty, decrease the cost of machinery, as you allege?

Mr. Dharamsey.—Naturally machineries which are made in India will be sold cheaper. Those which are made in India are already cheaper than imported machinery; if others also are made in India they will be sold cheaper.

Labour.

President.—Let us take (*b*); why should the cost of expert labour decrease?

Mr. Dharamsey.—Because more labour will be trained.

President.—There would be a bigger outturn, is that what you mean?

Mr. Dharamsey.—Yes. Even now the outturn of the factories is increasing. The more the outturn the less will the labour charges be. For the same frame filling machine we used to pay 2 annas per cart, we are now paying 5 pice per cart.

President.—I should have thought if you had a large number of match manufacturing firms starting, there would be a bigger demand for expert labour.

Mr. Dharamsey.—We have sufficient trained labour already and as they have been trained and are giving a better outturn we can safely cut down our charges. We have already done that.

Dr. Matthai.—Suppose we increased the duty on matches, the result of that would be a still further expansion of the industry. The new match factories that would come into existence might require imported labour.

Mr. Dharamsey.—Not imported but they would try to take away our expert labour!

President.—Then (*c*) cost of ordinary labour, why should that decline?

Mr. Dharamsey.—Because they are partly trained in one industry the outturn is better. No sooner the industry becomes old the outturn will still further improve.

Spare parts.

President.—But that has nothing to do with protection. The other item I do not quite follow is your point about the maintenance of spare parts. Why should your disadvantages disappear there?

Mr. Dharamsey.—At present some of the spare parts are not made in India and we have to import them and therefore the manufacturers do not know their own position. Speaking for myself I am afraid to keep any heavy stocks of spare parts or even to go on manufacturing these because of the initial cost of manufacture, because if the industry is not going to live we will be heavy losers.

President.—That depends more on the development of the machinery and engineering trade in this country.

Mr. Dharamsey.—That will develop immediately protection is granted.

President.—Do you think the manufacture of match machinery in India would afford business to a good many firms in India?

Mr. Dharamsey.—I think with protection, as you said just now, there will be a big demand for match machinery and naturally the manufacturers of machinery in India would be tempted to go into the manufacture of match machinery and spare parts would be made here.

President.—After all if out of 20 million gross of matches 6 millions only are being imported now the prospect of any great increase in the manufacture of machinery consequent on declaring this duty a protective duty is very small.

Mr. Dharamsey.—At present all the old factories import their machinery. As these get old say within 10 or 12 years they will have to be replaced and that time they will know the efficiency of the Indian models.

Economic size for a factory.

President.—In answer to question 56 you say "We think that a factory must produce 500 gross to be on an economic unit." What reasons have you for saying that?

Mr. Dharamsey.—We have now been working for six months at 600 gross and we have found it economical.

President.—You are working at a rate which, provided the present duty is maintained, leaves you a very small profit.

Mr. Dharamsey.—But the profit can be increased. At present we are doing some of the work by hand, and the profit comes to about 7 per cent. As soon as we are able to do the same process by machine the profit will be increased.

President.—What I mean to say is this. The fact that you are making a profit when there is a duty of 120 per cent. and you are producing 500 gross does not necessarily imply that 500 is the economical unit. Under present conditions it may give you a small profit. By economic unit I mean a unit which, if you were utilizing your machinery to the utmost extent and utilizing your labour to the utmost extent, you would be able to produce at a low price? Would you be using, in turning out 700 gross a day the same amount of labour that you would be using in turning out 500 gross?

Mr. Dharamsey.—We have got to take in more labour; overhead charges and things of that sort might be a little less.

President.—Messrs. Adamjee Hajee Dawood & Co. gave 700 gross a day as an economic unit.

Mr. Dharamsey.—I have only based it on our own experience in our factory. We have been working at about 450 to 500 gross a day and I think we have worked economically and working at that rate we have made some profit.

President.—You say you were using 150 men turning out 500 gross. Possibly you could turn out 1,000 gross with a few more men.

Mr. Dharamsey.—I don't think that would be possible. In these 150 men we have some labour employed in making boxes. That would go away eventually, but in that case 500 gross is an economic unit of production.

Dr. Matthai.—If you take the big match factories in India, for instance the Esavi India Match Manufacturing Company in Calcutta, its output is somewhere about 5,000 gross a day.

Mr. Dharamsey.—Yes.

Dr. Matthai.—Adamjee's in Rangoon is about 6,000 to 7,000 gross. The Western India Match Company's output is about 8,000 gross a day. Supposing after a time when the Match industry had fairly established itself in India, Government decided to reduce the present duty to the general import duty of 15 per cent., do you think with an output of 500 gross a day, you would be able to stand up against these big factories in our own country having an output of 6,000, 7,000 or 8,000 gross a day. You might be able to do it to-day when you have the present high duty of Re. 1-8.

Mr. Dharamsey.—It is very difficult to give an answer at the present moment.

Dr. Matthai.—The real point on which we would like you to express an opinion is this. Supposing the rate of duty on matches was the general revenue rate in the country and not this very high rate, in that case, would you consider 500 gross an economic unit?

Mr. Dharamsey.—I think it is. With all modern machinery, it should work economically. In Japan there are a number of small factories. They existed side by side with the big factories and are working economically. If you ever write to Japan and ask them to quote for machinery for the production of an economic unit, they would quote you for 500 gross a day.

Dr. Matthai.—Japan was able to get a great advantage during the war.

Mr. Dharamsey.—Yes.

Dr. Matthai.—But since the war Sweden with its large scale organisation has been able to capture the export market. The advantage which Japan had was rather temporary.

Mr. Dharamsey.—In Japan itself Sweden was not able to crush Japanese factories. They had to amalgamate.

Dr. Matthai.—That was not because of the small factories, but because of the large factories.

Mr. Dharamsey.—Yes, they have amalgamated with the big Japanese factories.

Dr. Matthai.—That is a different proposition.

President.—In answer to question 59 (*a*)—Do you consider your machinery and other equipment sufficiently up-to-date and efficient to enable you to compete successfully against the foreign manufacturer?—you say, "yes." That is on the supposition that a duty of Re. 1-8 would remain. You don't mean to say that without duty you could compete.

Mr. Dharamsey.—No.

Capital Account.

President.—Then as regards your capital account, what is the rent of your building?

Mr. Drahamsey.—We are paying a nominal rent of Rs. 100 a month.

Dr. Matthai.—Supposing you had to buy your land and erect your own building—the sort of building that you have now on lease—what would be the capital cost?

Mr. Dharamsey.—About Rs. 25,000.

Dr. Matthai.—In Dum Dum.

Mr. Dharamsey.—Yes, good land is available there for a 500 gross factory.

President.—Could you give us details of the miscellaneous assets which come to Rs. 21,164?

Mr. Dharamsey.—There must be raw materials in those assets. I think that the balance is working capital.

President.—We should have to deal with this not under the capital account, but under working capital.

Mr. Dharamsey.—There are materials and stores in that. The balance which is about Rs. 5,000 or Rs. 7,000 is working capital.

President.—But then this Rs. 21,164 would not come in the block value of your property.

Mr. Dharamsey.—No.

President.—The figure of Rs. 17,691 is after writing off depreciation at 10 per cent. in one year.

Mr. Dharamsey.—Yes, they must have allowed 10 per cent.

President.—10 per cent. for one year.

Mr. Dharamsey.—Yes.

President.—You say that 20 per cent. should be allowed for depreciation.

Mr. Dharamsey.—There is so much of breakages, so much of replacements in the machinery. All the match machines are delicate and in your visits to the match factories you must have seen the shake that is caused by this machine while working.

President.—Take the lathe for instance. That is not very delicate.

Mr. Dharamsey.—No.

President.—The lathe would last for a considerable time.

Mr. Dharamsey.—Yes. If you go to chopping and selecting machines and frame filling machines, there are a lot of breakages in these machines.

President.—Do you mean to say you would require a complete set of new machinery every 5 years?

Mr. Dharamsey.—No. There would have been so many replacements that it would practically amount to that.

President.—For instance you would not charge a new knife for the lathe under the capital account.

Mr. Dharamsey.—This would come under stores.

President.—Against depreciation.

Mr. Dharamsey.—No.

President.—Most of the renewals would be ordinary renewals.

Mr. Dharamsey.—There are pinions, small parts, rods, etc.

President.—You would charge these against renewals and you would not charge them against depreciation.

Mr. Dharamsey.—No.

President.—So that really, as far as depreciation is concerned, there is no reason why your machinery should claim a bigger rate of depreciation than any other machinery. All that you mean is that the item "renewals and repairs" would probably be heavier for match machinery than it would be, say, in the case of the rolled steel industry, is that right?

Mr. Dharamsey.—That is right.

Works Costs.

President.—You have given us your works cost. That is based on how many months working?

Mr. Dharamsey.—I have given from January to September.

President.—Of course it is possible that you will be able to make further reductions in your cost.

Mr. Dharamsey.—Yes, with new machinery arriving.

President.—Apart from that, as you say, the workmen pick up the work of the factory quickly, so that the cost of wastage in the course of manufacture in the early months would probably be considerably higher than later on.

Mr. Dharamsey.—That is right.

President.—What do you think you could reduce your works cost to in a reasonable time?

Mr. Dharamsey.—I could not say that offhand.

President.—Your works cost is Re. 1-6. Do you think you will be able to reduce it by another As. 2 in the course of the next two or three years bringing it down to Re. 1-4?

Mr. Dharamsey.—Yes.

President.—Have you got a system of cost accounting?

Mr. Dharamsey.—Yes, and I have given these figures from our books.

President.—Is that drawn up monthly or what?

Mr. Dharamsey.—We take out monthly.

President.—What do you mean by 5 per cent. depreciation on other assets in answer to question 80?

Mr. Dharamsey.—Stores and other raw materials while lying in stock must naturally depreciate.

President.—Depreciation is never allowed on stores.

Mr. Dharamsey.—I think the spare parts lying idle must be depreciated and there are also bad debts and other things.

President.—Bad debts are altogether a different matter. Depreciation is only allowed on plant and machinery and buildings, *i.e.*, on fixed assets.

Mr. Dharamsey.—These raw materials are such that they might by remaining long depreciate very much. Just take sulphur. If it remains for a long period, its action becomes less.

President.—You will have to take that into account in your cost.

Mr. Dharamsey.—Yes.

President.—If you have 100 tons of sulphur and say if, for some reason, 2 tons go bad, the cost of the remaining 98 tons is raised accordingly.

Mr. Dharamsey.—Yes.

President.—So that no depreciation is necessary on stores.

Mr. Dharamsey.—No, it is not necessary.

Working Capital.

President.—Now as regards working capital you have put some of your working capital into your fixed assets under (*e*). Could you give us, not necessarily now but at your leisure, your average outstanding accounts, *i.e.*, money due to you, the amount of stocks on hand and the total amount of stores on an average at any one time?

Mr. Dharamsey.—As regards outstandings there is a bania.

Dr. Matthai.—What exactly does this mean? You don't sell through this bania, do you?

Mr. Dharamsey.—All orders are booked by our own office.

Dr. Matthai.—You sell direct to purchasers.

Mr. Dharamsey.—Yes.

Dr. Matthai.—Then you get payment from the parties for these in about 2 months.

Mr. Dharamsey.—Immediately orders are booked, they are guaranteed by the bania. The bills are sent out to the bania and we collect the money from him.

Dr. Matthai.—You sell to the parties and the bills are discounted with the bania.

Mr. Dharamsey.—Yes. That is why I have no outstanding accounts. He books also orders on our account.

Dr. Matthai.—He is practically your sole selling agent.

Mr. Dharamsey.—Yes.

President.—What do you mean exactly by your answer to question 84 "27 per cent."? The question is: Compare the working capital with the cost of one month's output.

Mr. Dharamsey.—One month's output is the total amount of sales during the month.

President.—If we take 25 working days in a month, would that be right?

Mr. Dharamsey.—Yes.

President.—At the rate of 450 gross a day your output comes to 11,250 gross a month.

Mr. Dharamsey.—Yes.

President.—What does this 27 per cent. mean?

Mr. Dharamsey.—27 per cent. on our total investment of Rs. 40,000.

Dr. Matthai.—As regards your answer to question 84, I take it that what you probably intended to say was that the total amount of working capital that you require is about 3½ months works cost, is that right?

Mr. Dharamsey.—I have made a mistake there. While giving that, I have compared that with the total investment and not with the working capital.

President.—Let us take 11,250 gross at Re. 1-6 a gross. That is Rs. 15,650 for a month's output. You say in answer to question 62 (*e*) that Rs. 21,164 is working capital.

Mr. Dharamsey.—Yes.

President.—So that this would be 1½ months outturn roughly.

Mr. Dharamsey.—Yes.

President.—The working capital required, that is the amount which is locked up in stores and in stocks there being no outstandings would be roughly the cost of 1½ months production.

Mr. Dharamsey.—Yes.

President.—You say you sell to your bania direct.

Mr. Dharamsey.—Yes.

President.—What is the usual custom in the match trade?

Mr. Dharamsey.—The usual custom is to keep a bania.

President.—Now do the Western Indian Match Company have banias?

Mr. Dharamsey.—The Western India Match Company, Limited, have 3 or 4 banias. The Esavi India Match Manufacturing Company have Messrs. C. A. Mohamed as the sole selling agent.

President.—Do they get payment from their brokers?

Mr. Dharamsey.—It depends on the arrangements with the bania and it depends on the commission paid and the facilities granted.

President.—We have heard in Burma that the custom in the match trade is to give 6 or 7 months credit.

Mr. Dharamsey.—It is not so here. Generally we sell in the market on the month's credit. We realize our money after 1½ months the latest being two months. We get the money back between 1½ and 2 months.

President.—It would be unusual for the customer to require six to seven months credit from factories.

Mr. Dharamsey.—Yes, it would be.

President.—It is possible that the bania or his agent when dealing with small shopkeepers might sell on six months' credit.

Mr. Dharamsey.—I don't think so. I think that the shopkeeper sells on cash to the retailer, that is to the *panwalla*. Very few *panwallas* get credit from shopkeepers. I have myself visited the market and I don't think that any dealer gives credit to the *panwalla*.

President.—Let us go up the scale. The *panwalla* buys from the *dukanwalla* and pays cash.

Mr. Dharamsey.—90 per cent. cash.

President.—From whom does the *dukanwalla* buy?

Mr. Dharamsey.—From our bania.

President.—Does he pay cash?

Mr. Dharamsey.—No.

President.—On how much credit does he buy?

Mr. Dharamsey.—On one month's credit, but the money is never realised after one month. It is realised after 1½ months or so.

President.—You actually get cash on delivery.

Mr. Dharamsey.—Yes.

Dr. Matthai.—You get it from whom?

Mr. Dharamsey.—From the bania.

Dr. Matthai.—As soon as the goods are delivered to the shopkeeper.

Mr. Dharamsey.—For all the deliveries made in the day, bills will be sent to the bania in the evening and we get a cheque for the amount the next day.

Dr. Matthai.—How much commission do you allow?

Mr. Dharamsey.—2½ per cent.

President.—It covers not only bad debts but also interest and commission on sales.

Mr. Dharamsey.—Yes, 2½ per cent. for local and 3 per cent. for mufassil.

Dr. Matthai.—Later on in your reply to question 90, you say that your selling agents commission comes to about one anna per gross.

Mr. Dharamsey.—It is less than one anna; it works out to about nine or ten pies.

Assistance from the existing Customs Duty.

President.—I don't quite follow your figures given in answer to question 97. You say "The protection which the industry receives indirectly owing to the existing Customs duties including the conditions of (*b*) works to practically somewhere about Re. 1 to Re. 1-2 per gross on matches imported from Sweden and annas ten to annas twelve per gross on matches imported from Japan."

Mr. Dharamsey.—That is what I have worked out.

President.—How did you work it out?

Mr. Dharamsey.—Matches are now retailed at Rs. 2-4.

Dr. Matthai.—Do you mean your matches?

Mr. Dharamsey.—For all Indian made matches, the retail price is one pice per box. Before the retailer used to work on a profit of four annas per gross, but now he wants not less than six annas profit per gross. If the retail price of a match box is one pice, then it comes to Rs. 2-4 per gross. If you deduct from Rs. 2-4 the profit of six annas which the retailer wants, it comes to Re. 1-14 which is the maximum price realised by the Indian manufacturer. The price of imported matches is Rs. 2-14 per gross, the difference between the two (Rs. 2-14 *minus* Re. 1-14) being one rupee. If the retailer is prepared to work on a profit of four annas per gross as before, the amount of protection which the industry receives comes to Re. 1-2.

Dr. Matthai.—What it really comes to is this. At present the duty is Re. 1-8, but you don't get the full benefit of the Re. 1-8.

Mr. Dharamsey.—No.

Dr. Matthai.—But the assistance you get from the Customs duty amounts to how much?

Mr. Dharamsey.—It amounts to Re. 1-2.

President.—Why do you say that Re. 1-14 is the figure that you could work up to with less competition?

Mr. Dharamsey.—You must realise first that matches must be retailed at one pice per box. If you accept that, then in order to induce the retailers to sell our boxes at one pice per box or Rs. 2-4 per gross, they must be allowed to make some profit. Formerly, they used to work on a profit of four annas per gross but now-a-days they don't work on anything less than six annas. You must therefore deduct six annas from Rs. 2-4, and it comes to Re 1-14.

President.—What is actually happening is that owing to internal competition the retailer is making a lot of money.

Mr. Dharamsey.—Yes.

President.—That being so, supposing we recommended an excise duty of four annas, it would fall entirely on the retailer and not on the manufacturer, would it not?

Mr. Dharamsey.—We would not object to it.

President.—Every one producing matches in India will have to put up his price by four annas and the four annas will come out of the retailer's profit of six annas.

Mr. Dharamsey.—Yes.

Dr. Matthai.—Does not the retailer make much profit on imported matches?

Mr. Dharamsey.—You must see that the retail price of imported matches is raised accordingly. He is now making a profit of about eight annas on imported matches.

Dr. Matthai.—And on others he is making 14 annas, so there is a margin of six annas.

Mr. Dharamsey.—If he gets the same profit, he will interest himself in the other kinds.

President.—Supposing we say that there should be an excise duty of four annas, you think that a portion of this duty will come out of the retailer's profit.

Mr. Dharamsey.—It should not be as high as four annas.

President.—If we say two annas, it would be a reasonable proposition from the manufacturers point of view.

Mr. Dharamsey.—It would not affect the manufacturer.

President.—Your claim is that the present duty of Rs. 1-8-0 should be declared a protective duty.

Mr. Dharamsey.—We say that the duty should be raised to Rs. 2.

President.—Whatever may be the exact amount, your claim is that the industry qualifies for protection.

Mr. Dharamsey.—Yes.

President.—Of course one cannot take the conditions in Bengal as governing the suitability of the industry for protection in the whole of India. But just referring to Bengal for a moment, it does seem to me that there is some difficulty at present about the supply of raw material. You say that there is an ample supply of wood. But is there not some difficulty in getting it?

Mr. Dharamsey.—There is a little difficulty but not much. I think that it can be overcome if the manufacturers take a little more interest.

President.—It is rather an important condition, because it has been laid down by the Fiscal Commission that there should be an ample supply of the raw material. It would certainly help us a good bit if the manufacturers would put their heads together and let us know what they have done or are doing in this matter, before the end of the enquiry. We have got to come to some conclusion as to whether the supply of wood is ample for the industry in the whole of India.

Mr. Dharamsey.—I think that if the Sundarbans is reserved for the Match industry, it will be ample.

President.—But then the other industries might object.

Mr. Dharamsey.—They would not suffer very much. For empty cases there are so many other kinds of wood. At present they are not made from Genwa to any great extent. Very often they burn this wood as fuel.

Dr. Matthai.—Do you mean Genwa?

Mr. Dharamsey.—Yes. They don't let Genwa grow up. They cut it and burn it.

President.—It is very difficult to prevent the burning of Genwa unless you make it penal.

Mr. Dharamsey.—If only they allow match manufacturers to fell this wood in the forest, the difficulty might be solved.

President.—It is only the particular class of people who have some sort of vested rights in the Sundarbans for cutting Genwa who are able to undertake it now. The great difficulty is that the waterways are bad. The place is unhealthy and no other class has so far undertaken the task of exploitation.

Mr. Dharamsey.—That is so.

President.—So that it would not be an easy matter.

Mr. Dharamsey.—If it could be worked, then the match manufacturers should work it.

President.—I think that it is the match manufacturers' business to look into the question of supplies. I think that it is an important matter. For if you were to rely on imported wood aspen to any great extent, you could scarcely consider the industry as qualified for protection. What is your position as regards the Indian match manufacturers who use aspen wood? There are a number on the Bombay side who import aspen and manufacture

matches. I do not know what is the position of the Indian match manufacturers who use Indian wood towards them. Do you consider that the imported aspen should be taxed?

Mr. Dharamsey.—If it is taxed, it would be giving more protection to the Indian manufacturer. There must be more Genwa made available before that is done.

President.—If the supply of Indian wood is not adequate for the industry, and if an import duty was placed on imported aspen just in the same way as they put a duty on imported splints, it would stimulate the demand for the Indian wood and the price would go up.

Mr. Dharamsey.—We have to work the price up.

President.—Is there any margin? We have been told that matches manufactured from aspen wood fetch a better price.

Mr. Dharamsey.—Yes, three annas more.

President.—The amount of splints that you can turn out from one ton of aspen is about 2½ times more than the amount obtained from Genwa. Would there be a taxable margin?

Mr. Dharamsey.—We have to pay more.

President.—You have to pay Rs. 120 for aspen out of which you get 5 gross per c.ft., that is 250 gross per ton, whereas for Genwa you are paying Rs. 40 roughly out of which you get 100 gross.

Mr. Dharamsey.—Yes.

President.—So, you get 250 gross of aspen matches which would fetch you three annas more per gross. On the other hand your wood will cost you three times as much. There would not be much margin, would there be?

Mr. Dharamsey.—No.

President.—Practically this three annas, as far as I can see, represents the additional cost of the wood.

Mr. Dharamsey.—Yes.

President.—So that your position might not be improved by taxing the imported aspen.

Mr. Dharamsey.—No, it is not time yet to tax imported wood.

President.—You have seen our terms of reference, have you not? We have first of all to decide whether the industry should be protected. If the answer is in the negative the Tariff Board will report to what extent vested interests have been created in India as a result of the present rate of duty and how far these interests require consideration. Supposing for the sake of argument that a case for protection was not made out, what is your attitude in regard to Indian manufactured matches? There are two classes, first of all those which are manufactured from aspen or other imported wood and secondly those manufactured from Indian wood. Is there any difference between the two as regards vested interest?

Mr. Dharamsey.—I do not think so. For ourselves we have always tried to use Indian wood.

President.—The first action as a result of the increase in duty on matches on the part of some manufacturers was to import splints and dip them. What I gathered from some of the evidence given before us was that this was an entirely new industry that sprang up. Then some people went on importing aspen wood and began to manufacture here. What I was wondering was whether the manufacturers who manufacture from Indian wood considered whether their interests resulting from the imposition of this duty of Rs. 1-8-0 required more consideration than the interests of those people who had merely taken the opportunity of a gap in the fiscal system of the country to make large profits in the first instance.

Mr. Dharamsey.—Naturally those who began with importing splints and veneers and then started with aspen made enormous profits. But speaking for myself we have derived no benefit.

President.—In a way it might possibly be argued that there is distinction between the two classes, because on the one hand one class has invested money and has received, at any rate according to some witnesses, in the first few years a rapid return on the capital invested whereas the other who have invested money in the manufacture of matches from Indian wood have up to the present day made very little profit. Would you take that as an accurate statement?

Mr. Dharamsey.—Yes.

Factories financed by Foreign Capital.

President.—There is one other point I want to ask you about. You associate yourselves with this claim for an excise duty on factories financed by foreign capital. How would you work that exactly?

Mr. Dharamsey.—That is very difficult for me to suggest. Some form of duty should be put on them. I have merely endorsed the views of the Indian Chamber of Commerce.

President.—There are very great difficulties in the way. It is almost impossible to say whether a big company is financed by foreign capital.

Mr. Dharamsey.—I think all foreign companies interested in match manufacture have got foreign capital.

President.—That could be easily altered, could it not?

Mr. Dharamsey.—Yes.

President.—Apart from that the shareholders' register might vary from day to day according to the shares sold in this country.

Mr. Dharamsey.—It is a very complicated question to solve.

President.—Have you any suggestions to offer?

Mr. Dharamsey.—I have none to offer. I quite realize that there are so many difficulties that if you tax merely on the shareholders' list, they might have bogus shareholders on the list which Government would never be able to detect.

President.—As a matter of fact in an Indian company whose directors were all Indians, the shareholders might be foreigners.

Mr. Dharamsey.—But the Income-tax officers would be able to say to whose pockets the money is going.

President.—That would be a very big undertaking.

Mr. Dharamsey.—That is true.

Dr. Matthai.—You know of the Assam Match Company?

Mr. Dharamsey.—Yes.

Dr. Matthai.—Would you try to distinguish between yourselves and the Assam Match Company?

Mr. Dharamsey.—I say all the companies controlled by foreigners should be taxed.

Dr. Matthai.—They have Indian directors, they have rupee capital; would it be fair to do that?

Mr. Dharamsey.—But are the stock holders Indian?

Dr. Matthai.—A good deal of the holdings are Indian, that is to say Indian in the sense that the people are residents in India. I know for example that a considerable part of the holdings is in the hands of one of the wealthiest bankers in South India.

Mr. Dharamsey.—I admit it is a very complicated matter.

President.—Supposing yourselves, for example, Esavi and Adamjees formed a combination of Indian capital and obtained control out here, do you think the other match manufacturers, that is the smaller ones, could claim rightly against you on the same lines?

Dr. Dharamsey.—How can they? We have not the same experience and we are claiming on the ground of their long experience of the industry and the unfair policy they are adopting.

President.—It does seem to me that this claim is really directed against the establishment of a monopoly or a trust and in essence although this Trust is alleged to be controlled by foreign interests, the same results may accrue from a combination of Indian interests, that is to say, monopoly and unfair competition which is the essence of your complaint. Is that correct?

Mr. Dharamsey.—No doubt the Indian manufacturers could combine and do the same thing but it would take 20 to 30 years to do that.

President.—Yes, but is it not rather a question to be considered in connection with State legislation against Trusts?

Mr. Dharamsey.—We have put our heads together many a times over that problem but we could not solve it. At the same time there are so many undertakings and private treaties of the Government of India that for a layman to go into the question would be very difficult. It is a matter for Government to solve.

Dr. Matthai.—It is not so much a question of treaties, it is merely a question of devising a method.

Mr. Dharamsey.—I think the Tariff Board is the best body to devise that; as for myself I would say I have no suggestions to offer.

Connection with the Tobacco Company.

Dr. Matthai.—There are various things that you get from this Tobacco Company, do you not?

Mr. Dharamsey.—Yes.

Dr. Matthai.—You are tenants in the first place and pay a rent of Rs. 100. That you say is a nominal rent?

Mr. Dharamsey.—Considering that the American Eastern Tobacco Corporation has got very vast lands and buildings vacant and it was sanctioned by their board to have tenants we thought it was cheap to have the place at that rent.

Dr. Matthai.—If you have had no connection with the Tobacco Company?

Mr. Dharamsey.—Then we would have to pay at least 25 per cent. more.

Dr. Matthai.—In the schedule you have prepared the rent charged is entered as Rs. 100.

Mr. Dharamsey.—In the beginning we had only one godown and we were paying only Rs. 40.

Dr. Matthai.—What is the average for the nine months for which you have prepared your accounts?

Mr. Dharamsey.—Somewhere near Rs. 55. In the beginning ours was a very small factory and we paid them only Rs. 40 to 50.

Dr. Matthai.—You are getting your power from them. What is your arrangement?

Mr. Dharamsey.—So many motors running in the factory and the bill is divided on the horse power consumed on the motors, we have put up 2 motors.

Dr. Matthai.—The agreement is between the Calcutta Electric Supply Corporation and the American Eastern Tobacco Corporation, is it?

Mr. Dharamsey.—Yes.

Dr. Matthai.—You say your contribution is Rs. 125 a month. Is that divided half and half?

Mr. Dharamsey.—No. Then there is another charge. They have their own printing department for making boxes and they have got motors there. All the motors are added up and are divided in the proportion of the horse power they are consuming.

Dr. Matthai.—The Tobacco Corporation is a fairly large consumer?

Mr. Dharamsey.—They consume 75 per cent.

Dr. Matthai.—The rate at which they get their electricity is a fairly low rate?

Mr. Dharamsey.—Yes.

Dr. Matthai.—And you get the benefit of the low rate because you are taking from them?

Mr. Dharamsey.—Any factory working in that line would get power at that rate even if he had no connection with the American Eastern Tobacco Corporation.

Dr. Matthai.—When exactly was your company formed? You say you started match manufacture in November 1926. Did you start so late?

Mr. Dharamsey.—Before November we were making by hand for advertisement just like the cottage industry. We had given the contract to one man who is used to finish the product. After going into the details of profits and so on, we decided to start the factory.

Dr. Matthai.—In the schedules that you have prepared, all these services that you got from the American Tobacco Corporation Limited are shown separately, are they?

Mr. Dharamsey.—Yes.

Dr. Matthai.—All the rent you pay them, the power that you get, the medical attendance, the Managing Agency, etc.?

Mr. Dharamsey.—The Managing Agency has nothing to do with them. The medical attendance is paid in part.

Dr. Matthai.—You are the Managing Agents for the American Eastern Tobacco Corporation, Limited.

Mr. Dharamsey.—Yes.

Dr. Matthai.—Is the medical attendance shown in the schedules?

Mr. Dharamsey.—It goes in the general charges. It is a very small amount.

Dr. Matthai.—Your firm is very considerably interested in the Tobacco Company.

Mr. Dharamsey.—Yes.

Experience of Aspen wood.

Dr. Matthai.—Now this aspen wood of which you have got a trial shipment, did you make splints and veneers out of that?

Mr. Dharamsey.—Only splints.

Dr. Matthai.—And what exactly was your experience? What sort of output did you get out of that and what was the wastage on that?

Mr. Dharamsey.—The wastage was much less.

Dr. Matthai.—Have you got exact figures?

Mr. Dharamsey.—I haven't got here.

Dr. Matthai.—You have records for the results of these.

Mr. Dharamsey.—We have.

Dr. Matthai.—Could you send us that?

Mr. Dharamsey.—We could send you that.

Dr. Matthai.—Could you send us the actual amount of splints that you got out of these 2 tons of aspen wood?

Mr. Dharamsey.—Yes.

Dr. Matthai.—Did you actually put the matches made out of aspen on the market?

Mr. Dharamsey.—Very little.

Dr. Matthai.—When you say your present output is 450 gross per day, do you mean full size or half size?

Mr. Dharamsey.—Full and half size combined. We make half size only on one machine.

Dr. Matthai.—Practically all is full size.

Mr. Dharamsey.—Yes.

President.—Your costs are for full size.

Mr. Dharamsey.—Yes.

Consumption of electricity.

Dr. Matthai.—Is it quite impossible for you to work out the consumption of electricity per gross in units?

Mr. Dharamsey.—I have not kept any record.

Dr. Matthai.—A month's observation would enable you to tell us that.

Mr. Dharamsey.—Yes.

Dr. Matthai.—Will you keep us informed?

Mr. Dharamsey.—I have got a separate meter. It is only necessary to keep a check.

Dr. Matthai.—At present you say the charge for power works out to a little over 2 pice.

Mr. Dharamsey.—Yes.

Dr. Matthai.—That is slightly lower.

Mr. Dharamsey.—At the same time only big factories can take advantage of this high tension.

Dr. Matthai.—It is really due to your close association with the American Eastern Tobacco Corporation.

Mr. Dharamsey.—If we can manufacture 2,000 gross per day, we get the benefit of that. I think the Calcutta Electric Supply Corporation does not make any smaller agreement than 51 k.w.

Dr. Matthai.—Of course the point of real interest to us is not the particular rate which you are charged for the electricity in the very special conditions in which you work, but the actual consumption of electricity in the works. If you could tell me after a month or so, how many units you had to consume per gross, it would be a rather interesting.

Mr. Dharamsey.—I can give you that.

Depreciation.

Dr. Matthai.—You say the rate of depreciation allowed by the Income-tax Authorities is 5 per cent. on buildings and machinery.

Mr. Dharamsey.—Yes.

Dr. Matthai.—As a matter of fact I find that the rate of depreciation allowed in the Income-tax Act for match machinery is 6¾ per cent. I think that most machinery is covered by the general rate of 7½ per cent.

Mr. Dharamsey.—They allow only 5 per cent. on cigarette machinery.

Dr. Matthai.—Do you think the life of the machinery is only 5 years?

Mr. Dharamsey.—We have not had any experience as to what the life of the machinery would be. The life of the match machinery is rather short. We are in a chemical factory. Chemicals are liable to eat up iron.

Dr. Matthai.—What would you consider a suitable rate of depreciation for match machinery?

Mr. Dharamsey.—At least 10 per cent.

Agents.

Dr. Matthai.—In answer to question 89 you say "We pay our agents certain percentage on the nett amount realized". What kind of agents?

Mr. Dharamsey.—Selling agents.

Dr. Matthai.—Question 89 really refers to Managing Agents.

Mr. Dharamsey.—We have no Managing Agents.

Freight Advantage.

Dr. Matthai.—We were asking you about your answer to question 97. You have worked out in a way that I don't quite understand the amount of assistance received by the Match industry and you include in that the assistance afforded by condition (*b*) which is freight. What kind of freight?

Mr. Dharamsey.—It is the same as on imported matches.

Dr. Matthai.—Do you mean the internal freight?

Mr. Dharamsey.—Yes.

Dr. Matthai.—The question (97) is:

"What is the amount of the protection the industry receives at present owing to:—(*a*) the existing Customs duties, (*b*) transport charges between the country of production and the port of entry, ... ?" Which really refers to the sea freight?

Mr. Dharamsey.—Yes.

Dr. Matthai.—I mean you have no evidence as to the freight on matches, say, from Sweden or from Japan.

Mr. Dharamsey.—That includes the selling price. They are selling at c.i.f. price.

Dr. Matthai.—Have you any information as to the amount of assistance that you get by reason of the additional freight that these people have to pay?

Mr. Dharamsey.—No.

Extension of Output.

Dr. Matthai.—When do you expect to instal this new machinery?

Mr. Dharamsay.—They have just now been installed.

Dr. Matthai.—Have they been installed?

Mr. Dharamsey.—Yes.

Dr. Matthai.—Practically for our purposes we can take your output as 650 gross.

Mr. Dharamsey.—Yes from next month it would be 650 gross.

Dr. Matthai.—In your answer to question 60 (*b*) you say you are thinking of importing further machinery?

Mr. Dharamsey.—Yes.

Dr. Matthai.—Supposing you got this other machinery installed, by how much further would you increase your output?

Mr. Dharamsey.—As much as we could sell. We are depending upon our sales organisation.

Dr. Matthai.—Apart from the question of sales assuming for the sake of argument that there is a market for all the matches that you can produce with the machinery that you have just now installed. Have you got any definite estimate?

Mr. Dharamsey.—We have not made any. We will be importing in lots of 4 machines.

Dr. Matthai.—If you do that the output may increase to 1,000 gross a day.

Mr. Dharamsey.—It might even go up to 2,000 gross.

Dr. Matthai.—Supposing the Tariff Board recommended that the industry should be declared a protected industry.

Mr. Dharamsey.—Then I think our sale-manager would be able to sell at least 2,500 gross a day.

President.—Would you get wood for that?

Mr. Dharamsey.—If we get it, we won't go in for that blindly. We are going very slowly. We are importing 4 machines at a time.

Dr. Matthai.—Ultimately do you think you would be able to work up to 2,500 gross a day.

Mr. Dharamsey.—Yes.

Dr. Matthai.—Next year supposing you are able to work up to 2,000 to 2,500 gross, you would find it exceedingly difficult to get the wood.

Mr. Dharamsey.—We have not thought about it.

President.—It is time that you thought of it.

Mr. Dharamsey.—Yes. We won't be getting any machinery until the report is published and we know something definite about the wood.

Dr. Matthai.—Have you ever considered the question of extracting genwa from the Sundarbans?

Mr. Dharamsey.—No.

Dr. Matthai.—Why haven't you? If you are going to extend your match business, then would it not be rather an advantage for you to get in direct touch with the Forest Department and make yourself responsible for the extraction of the wood?

Mr. Dharamsey.—I have just made up my mind to do it immediately and get into touch with the Forest Department.

Dr. Matthai.—What happens now is that you purchase your wood which is your most important raw material from these small people and you have no practical knowledge of the conditions under which the wood grows and how it is extracted.

Mr. Dharamsey.—All the factories are in the same position.

Dr. Matthai.—When you decide to convert your factory into a big factory with most of the work done by machines, that is a proposition which you would necessarily have to consider.

Mr. Dharamsey.—Yes.

Dr. Matthai.—You have made no first hand enquiries at all about the possibilities of wood supply in that area.

Mr. Dharamsey.—None at all so far.

Unfair Competition.

Dr. Matthai.—Do you get any kind of unfair competition in the Calcutta market from the Swedish Match Company?

Mr. Dharamsey.—Yes.

Dr. Matthai.—What sort?

Mr. Dharamsey.—I have mentioned it in my replies—see page 11. "Already it is being tried to injure the sale and reputation of the Indian manufacturers, by rumours in the market of a reduction in the import duty on matches."

Dr. Matthai.—Is the rumour started by the Swedish people?

Mr. Dharamsey.—I have heard myself about this rumour. I have heard it from their agents.

President.—What is the rumour exactly?

Mr. Dharamsey.—The rumour in the market is that the agents are prevailing on the dealers not to purchase Indian made matches as particularly the duty would be reduced on imported matches and if the dealers find that they are stocked with Indian made matches, they would be losers.

Dr. Matthai.—Has there been any attempt to sell stocks in liquidation specially at low prices? We were told by certain Indian match companies on the Bombay side that fairly large quantities were put on the market by the Swedish Match Company at specially low prices periodically with the result that the market was somewhat demoralised.

Mr. Dharamsey.—They did it in the Calcutta market but not imported matches.

Dr. Matthai.—I am thinking of locally made matches. They are put on the market at low prices.

Mr. Dharamsey.—They have done so during the year 3 or 4 times.

Dr. Matthai.—Are you speaking of specific instances?

Mr. Dharamsey.—I am talking of specific instances. I can quote their brands.

Dr. Matthai.—Would you be able to give specific information?

Mr. Dharamsey.—Yes.

Dr. Matthai.—Could you send us a statement of such sales by the Swedish Match Company?

Mr. Dharamsey.—How much they have sold, I can't say.

Dr. Matthai.—Could you give us some information as to the prices at these periodical sales?

Mr. Dharamsey.—The prices have been reduced, increased and again decreased. Like that they have gone on.

Dr. Matthai.—The same kind of statement was made by people on the Bombay side, but when we went into it the impression at least created in my own mind was that the specially low sales had as much to do with the internal competition on the part of the small Indian factories as with these periodical sales.

Mr. Dharamsey.—The Swedish people spoiled the market.

President.—What about the cottage industries?

Mr. Dharamsey.—When they sell at a low rate, we never take any notice of it, because they are unable to supply in any huge quantity. In a day or two it passes off.

Dr. Matthai.—You don't seriously apprehend any competition or any depression in prices as a result of a large number of cottage factories being started in the country.

Mr. Dharamsey.—One special brand of theirs might get a good reputation but they would not be able to supply the demand should there be any large demand for that particular brand.

Dr. Matthai.—Is there any kind of combination between the large factories in Calcutta to your knowledge?

Mr. Dharamsey.—None whatever.

Dr. Matthai.—I mean it is all done on a basis of free competition.

Mr. Dharamsey.—Yes.

Dr. Matthai.—The only unfair competition you have experienced so far is the periodical sales by the Swedish Match Company of which you have specific information which you will send us.

Mr. Dharamsey.—Yes.

Importance of the retail price.

President.—In making any proposals which we might consider desirable in regard to either the question of duties or excise, do you think it would be necessary for us to take into account the retail price at which each box is sold?

Mr. Dharamsey.—I think it is very important.

President.—For instance the retail price of an imported match box is 1½ pice. Then it comes to how much per gross.

Mr. Dharamsey.—It comes to Rs. 3-6-0.

President.—Actually the wholesale price is Rs. 2-14-0, so that annas 8 goes to the middleman. Formerly it was annas 4. Now you think annas 6 would be reasonable. If, on those figures, it was proposed to raise the duty to Rs. 1-10-0 instead of Rs. 1-8-0, it would not hurt any one.

Mr. Dharamsey.—No.

President.—An adjustment of that sort could be made merely on a consideration of the retail price.

Mr. Dharamsey.—Yes, that is the chief factor.

THE BHAGIRATHI MATCH FACTORY, BENGAL, CALCUTTA.

B.—ORAL.

Evidence of Mr. G. C. SEN GUPTA, Manager, Bhagirathi Match Factory, recorded at Calcutta on Tuesday, the 18th October 1927.

Introductory.

President.—Mr. Sen Gupta, what is your position in regard to the Bhagirathi Match Factory?

Mr. Sen Gupta.—I am the Manager. This is not a limited company. It is a private company.

President.—Whom does it belong to?

Mr. Sen Gupta.—It belongs to a Bengali gentleman.

President.—What is his name?

Mr. Sen Gupta.—Mr. Mohini Mohan Roy Chaudhuri.

President.—You are a paid manager.

Mr. Sen Gupta.—Yes, I am also a working partner.

President.—You are the managing director and partner.

Mr. Sen Gupta.—Yes. I am the Manager.

Wood Supply.

President.—You say in answer to question 8 (*a*) that heavy cartage has to be paid on raw materials from Calcutta. How far have the materials got to be carted?

Mr. Sen Gupta.—About four miles from the wood centre.

President.—How far from the railway station?

Mr. Sen Gupta.—About six miles.

Dr. Matthai.—What you call the wood centre, is the market, is it not?

Mr. Sen Gupta.—Yes.

President.—How much have you to pay for cartage?

Mr. Sen Gupta.—Two annas per piece from Ultadinghi.

President.—What is a piece exactly?

Mr. Sen Gupta.—8 inches in diameter and 4½ to 5 feet in length.

Dr. Matthai.—It is a log?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—What is the size of a log in c.ft.?

Mr. Sen Gupta.—It is about 1 c.ft.

President.—For each log measuring 1 c.ft. you have to pay two annas.

Mr. Sen Gupta.—Yes.

President.—It makes your wood expensive, does it not?

Mr. Sen Gupta.—Yes.

President.—What is the cost of a log?

Mr. Sen Gupta.—About Rs. 1-4-0 per log including cartage for selected ones.

President.—Your cartage is going to be something like 12 per cent. on the cost of your log.

Mr. Sen Gupta.—Yes.

President.—Why did you establish your factory there?

Mr. Sen Gupta.—There were some advantages. We had a shed ready at that place.

President.—Still, when you think of starting a new enterprise you must consider the question of cost.

Mr. Sen Gupta.—When we started the factory in that place there was some disadvantage in securing this species of wood but circumstances have changed now. We are using the Andaman wood now to some extent. So, we can easily float the logs from the Jetty to the Ganges close to our factory, *i.e.*, about half a mile away from it where we cut them into pieces and take them to our factory.

President.—But you have to cart the cut pieces.

Mr. Sen Gupta.—Yes.

President.—How much does that cost?

Mr. Sen Gupta.—Generally we pay about one rupee per ton for the purpose.

President.—A ton being how many cubic feet?

Mr. Sen Gupta.—50 c.ft. make one ton.

Dr. Matthai.—At the rate at which you are getting from the Ultadinghi market and taking a ton as being equal to 50 c.ft., your wood costs you about Rs. 62, delivered at your factory?

Mr. Sen Gupta.—Yes, that is the rate we pay for Genwa.

Dr. Matthai.—What is the cost of the Andaman wood per ton delivered at your factory?

Mr. Sen Gupta.—About Rs. 65 per ton.

President.—That is nearly as cheap as Genwa.

Mr. Sen Gupta.—Yes.

President.—And you get a very much better outturn.

Mr. Sen Gupta.—Not always. There are different species of Andaman wood, one of which is very suitable. We get generally two species from the Andaman islands, *viz.*, Papita and Bakota. Here are samples of matches made from these two species (handed in). There is a lot of difference in strength, quality and outturn between these two woods. Papita is not suitable for veneers but may be said as tolerably suitable for splints.

President.—Why is it not suitable for veneers?

Mr. Sen Gupta.—It is very soft. It is also brittle. Practically speaking it is not very suitable even for splints, but only to some extent it is; whereas Bakota is suitable both for splints and veneers.

Dr. Matthai.—What is the Andaman name for it?

Mr. Sen Gupta.—Papita.

Dr. Matthai.—You are quite sure that it is called Papita.

Mr. Sen Gupta.—Yes; at least we buy it from Messrs. Martin and Company in that name.

President.—It is not at all satisfactory.

Mr. Sen Gupta.—I should say so.

President.—Why do you use it then?

Mr. Sen Gupta.—We have given it up as some cases of matches made of this wood are still lying unsold. Bakota is also of the same family as Papita but is much better.

Dr. Matthai.—Could you get us the botanical names of these?

Mr. Sen Gupta.—I can send them to you afterwards.

President.—Generally the timber is sold in Calcutta at what price?

Mr. Sen Gupta.—We purchase it from Messrs. Martin and Company who are the sole suppliers and they sell it for Rs. 54 per ton *ex*-ship.

President.—This is what the Chief Conservator of Forests, Andaman Islands, says—"The timber is sold in Calcutta at Rs. 37-8-0."

Mr. Sen Gupta.—That may be the Government rate. But we actually get it at Rs. 54 from Messrs. Martin and Co. and our total cost is about Rs. 65 including all the charges.

President.—Are both the woods sold at the same price?

Mr. Sen Gupta.—Yes, but we can't get Bakota in sufficient quantity.

President.—Why is that?

Mr. Sen Gupta.—They are importing Papita in very much larger quantity than Bakota. We do not know why they are doing so. We sent a man to the Andamans to investigate. We understand from him that sufficient quantities of this wood are available and the local contractors can supply it plentifully if allowed space in boats but owing to the present arrangement we cannot get it from the contractors direct or through the Agents in sufficiently large quantity and at reasonable rates.

Dr. Matthai.—Do they use it for any other purposes?

Mr. Sen Gupta.—No. They only bring it as far as I know for selling it to match manufacturers.

Dr. Matthai.—Would there be a sufficient demand for this wood to make it worth while for Messrs. Martin and Company to do this business because most of the match companies in Calcutta use Genwa?

Mr. Sen Gupta.—Yes. At present big factories use Genwa for boxes and also to some extent for splints but I understand that they import wood also from Japan for splints.

President.—Do you have any difficulty about the condition of the wood?

Mr. Sen Gupta.—With Papita, yes. I can say that half the wood that we get is dry and consequently useless for our industry. They don't care at all about the suitability of wood from our point of view. As there is scarcity of supply we purchase whatever we get and often when we put it on the machine, we find it quite unsuitable for our purpose. They supply dry, half dry and so on in all conditions.

Dr. Matthai.—If it is dried up, it is altogether useless?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—The difficulty is in peeling it, is it not?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Supposing you left this dried wood in water for some time?

Mr. Sen Gupta.—In that case, the quality would deteriorate.

President.—The splints made of Papita here seem to me to be very brittle. Is that due to the timber arriving in a dry condition?

Mr. Sen Gupta.—It is particularly due to the inherent quality of the wood and also to the condition in which it arrives. We also get some fresh stuff along with it.

President.—This is Burmese sawbya (showed a sample)?

Mr. Sen Gupta.—Generally matches made of Papita which are imported from Burma to Calcutta are better than ours. Although of the same Papita species, their splints are stronger than those of the strong ones we manufacture with the wood we are able to obtain.

President.—Of this particular wood which is called in Burma sawbya and which we believe to be the same as Papita, Adamjee's take 5,000 tons a year from the Andamans. Their splints are very much stronger.

Mr. Sen Gupta.—Yes, I see.

President.—Therefore it would appear *primâ facie* that the reason why your splints are so much weaker is that the wood arrives in a poor condition here.

Mr. Sen Gupta.—Perhaps.

President.—Why does it arrive at Calcutta in such a state?

Mr. Sen Gupta.—We do not know.

Dr. Matthai.—Does it take a longer time for you to get it in Calcutta?

Mr. Sen Gupta.—I can't say. There seems to be no reason why it should.

Dr. Matthai.—You have no information about that.

Mr. Sen Gupta.—No. Generally we find that the quality of matches made in Burma is superior to ours both in colour and strength.

President.—Although the wood is the same?

Mr. Sen Gupta.—Yes, only their splints are a bit thicker than ours.

President.—Why is that?

Mr. Sen Gupta.—People here want more sticks in a box. As regards colour, we get only 25 per cent. of the first quality that gives us suitable and fairly white splints. There are different species even in Papita—some stronger and a little brownish and some brittle and somewhat darkish.

Dr. Matthai.—You have given up using Papita?

Mr. Sen Gupta.—Yes, we have more than 300 cases lying in our factory unsold.

President.—Whatever the species, the quality of wood when it is landed in Calcutta is unsatisfactory.

Mr. Sen Gupta.—Yes.

President.—Although you had been using this Andaman wood—and for that your factory is not so badly situated—still now that you have given up the use of Andaman wood, your factory is somewhat badly situated.

Mr. Sen Gupta.—But we still use some Andaman wood, *viz.*, Bakota, when available.

Labour.

Dr. Matthai.—In two important respects, your factory seems to be unsatisfactorily situated. The first thing is the question of cartage. Secondly you say that you experience great difficulty in getting trained labour.

Mr. Sen Gupta.—There was a time when we had difficulty in getting trained labour but it is no longer so.

Dr. Matthai.—At the time you sent in your replies, just about 4 or 5 months ago, you had some difficulty.

Mr. Sen Gupta.—Yes, in these four months, labour has been sufficiently trained.

President.—Mr. Dharamsey told us that when they whistled, they found labour knocking at their door.

Mr. Sen Gupta.—There is a big factory called "The Pioneer Match Factory", at Dum Dum which was started in 1923-24. They trained a sufficient number of people in the locality where Mr. Dharamsey's factory is situated.

Dr. Matthai.—Dum Dum is a better place.

Mr. Sen Gupta.—Yes, it is.

President.—Can't you get your labour from Dum Dum?

Mr. Sen Gupta.—Some of our workmen come from Dum Dum.

Dr. Matthai.—You say that a good number of labourers come from outside Bengal. Where do they come from?

Mr. Sen Gupta.—They are upcountry men.

Dr. Matthai.—Do you mean from outside Bengal?

Mr. Sen Gupta.—Yes, people coming from the United Provinces, Bihar and Orissa. We have many Ooriyas in our factory.

Output—Wood Supply.

Dr. Matthai.—On the question of your output, your present output is 200 gross per day.

Mr. Sen Gupta.—It is now 300 gross per day.

Dr. Matthai.—What is the total capacity of your factory as it is equipped at present?

Mr. Sen Gupta.—We can go up to 500 gross per day.

Dr. Matthai.—You say somewhere in your answers that you don't propose to undertake any extensions to your factory.

Mr. Sen Gupta.—To the machinery which we purchased at the commencement, we had to add some more.

Dr. Matthai.—As things are at present, you estimate the full capacity of your factory to be about 500 gross a day.

Mr. Sen Gupta.—Yes, but we are not going to make 500 gross a day.

President.—Why not?

Mr. Sen Gupta.—Owing partly to the difficulty in getting wood. We cannot use Genwa. In my opinion it is not suitable for match making—judged from the condition of supply we are now receiving. At present we use Genwa for making veneers for boxes only.

President.—Do you say unsuitable?

Mr. Sen Gupta.—Yes, quite unsuitable it being dry and its diameter as it is at present available, being small.

Dr. Matthai.—If you are not going to use Papita and if you are not going to use Genwa, what are you going to use?

Mr. Sen Gupta.—We are going to use Bakota.

Dr. Matthai.—And the experiments have been quite satisfactory?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—This is slightly more expensive than genwa?

Mr. Sen Gupta.—No. Although in price it is more expensive by about Rs. 4 or 5 per ton we get more output from this wood.

Dr. Matthai.—What quantity of splints and veneers can you get out of one cubic foot of genwa?

Mr. Sen Gupta.—2 gross full-sized splints and veneers complete.

Dr. Matthai.—And one cubic foot of Bakota?

Mr. Sen Gupta.—About 3½ gross.

President.—Why don't you produce 500 gross a day using this wood?

Mr. Sen Gupta.—We are getting very scanty supply at present. In the last shipment only 30 tons came. At first Messrs. Martin and Company told us they would let us have the whole lot, but afterwards distributed them in the proportion of 10 tons to us, 6 or 7 tons to the Bhowani Engineering Company and the rest to Mitsui Bussan Kaisha.

President.—Are you working continuously or intermittently?

Mr. Sen Gupta.—Continuously.

President.—How do you manage if you get a scanty supply?

Mr. Sen Gupta.—We are anyhow managing to get enough now to carry on continuously but we are anxious about the future.

Dr. Matthai.—Tell me precisely why you consider genwa unsatisfactory.

Mr. Sen Gupta.—In the first place the wastage is large, then the colour is dark and in strength it is weak.

Dr. Matthai.—There are a large number of people in Calcutta who are using genwa.

Mr. Sen Gupta.—They can't help it; either they must use genwa or close down.

Dr. Matthai.—Your future must be rather precarious if you are to depend for your wood supply on this supply from the Andamans?

Mr. Sen Gupta.—We are trying to get sufficient supply of this wood; we do not know what will happen in future.

Dr. Matthai.—If you cannot work up to your full capacity of 500 gross a day because you cannot get sufficient wood, then your future must be very uncertain. Have you any kind of solution to suggest?

Mr. Sen Gupta.—We are thinking the matter over. At least we look to Government for providing better transport facilities so that we can get sufficient supply of wood from the Andamans.

President.—Have you ascertained whether there is a sufficient supply in the Andamans?

Mr. Sen Gupta.—Yes, we sent a representative recently to inspect the forests there and we had a report from him that there is a sufficient quantity of match wood available there.

President.—Sufficient for how long?

Mr. Sen Gupta.—That I cannot say.

President.—When you are considering the supply of wood from forsets you have got to take into consideration the length of time it will take to grow and the length of time it will take to regenerate. For instance if it takes 30 years to regenerate the supply, you will have to divide the available supply into 30 portions so that you can cut one portion each year. If there is ample supply at present and that supply is only sufficient for 10 or 12 years, at the end of that period you will have no wood at all.

Mr. Sen Gupta.—Our Agents had a talk with the Chief Forest Officer, Andamans, and he said that the timber was available in sufficient quantities and the Government reports also indicate that there is a considerable quantity available there to last many years. It is the business of the Forest Department to take necessary steps to keep up the supply.

President.—We have a letter from the Conservator of Forests, Andamans, in which he writes as follows :—" No working plan for these timbers is at present in existence but I estimate that 5,000 to 6,000 tons could be exported annually at present and 5 or 6 times that amount if sufficient transport to India or Burma were available ".

That is to say the forest officer cannot say from working plans what the supplies are but the expects that 5,000 to 6,000 tons can be exported annually at present. Of this Messrs. Adamjee Hajee Dawood and Company take 5,000 tons, and 5 or 6 times that amount will be available if sufficient transport from Indian or Burma were available.

Mr. Sen Gupta.—So, it is evident that they cannot export more timber although it is available in large quantities only for the present in adequate shipping facilities.

Dr. Matthai.—Is there a regular steamer service between here and the Andamans?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—How often do they go?

Mr. Sen Gupta.—Twice a month. My information is that three boats are running and one of them is a Government boat.

President.—Is there any prospect of the shipping being increased to the Andamans?

Mr. Sen Gupta.—This I do not know but I think that it ought to be increased.

President.—Do you expect Government to run steamers for carrying wood?

Mr. Sen Gupta.—We must press for providing transport facilities; that is what we must do.

Dr. Matthai.—Have you made any enquiries whether there are any other kinds of Bengal wood suitable for match manufacture?

Mr. Sen Gupta.—Yes, there are other species and we have tried some of them, *e.g.*, deodar, simul, kadam, amra, chatim, etc.

Dr. Matthai.—Where do you get these?

Mr. Sen Gupta.—They are scattered all over Bengal. There is no regular market for these; but we buy them from the local people.

Dr. Matthai.—Have you ever asked the Forest Department whether there are any other species of wood in Bengal suitable for matches?

Mr. Sen Gupta.—We understand from Government that there are some suitable species in Darjeeling and Terai hill tracts and in Assam but we have not tried these because it costs us As. 12 to Re. 1-0-0 per cubic foot to transport them.

Local woods compared with aspen.

Dr. Matthai.—Have you found the local wood that you tried quite satisfactory?

Mr. Sen Gupta.—More satisfactory than genwa in some cases.

Dr. Matthai.—You have also tried aspen?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—It is very much more satisfactory, is it not?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Considering the amount of splint and veneers you can get out of aspen, do you think aspen would be more expensive than the Andaman wood? What is your experience?

Mr. Sen Gupta.—It will give about 6 gross of splints only. I have not find it in veneer making.

Dr. Matthai.—What was the cost of the aspen which you bought?

Mr. Sen Gupta.—Rs. 2-8-0 per c.ft. landed at the factory, that is about Rs. 125-0-0 per ton.

Dr. Matthai.—If you got aspen at that cost in your factory and you were able to get 6 gross splints only out of one cubic foot, that would have been less expensive for you?

Mr. Sen Gupta.—No. The expenses will be bit higher than that of local wood.

Dr. Matthai.—What I mean to say is that you get more splints and veneers and you get a better price.

Mr. Sen Gupta.—Regarding price there was at first a great difference but at present I think there is very little difference between aspen wood matches and local wood matches.

Dr. Matthai.—What is the present difference in the Calcutta market between Indian matches and Swedish matches?

Mr. Sen Gupta.—The difference is about Rs. 1-6-0 per gross.

Dr. Matthai.—Would you not be able to get a much higher price therefore for matches that you make out of aspen?

Mr. Sen Gupta.—No.

Dr. Matthai.—That higher price for Swedish matches is due to the fact that they are made of aspen, is it not?

Mr. Sen Gupta.—Those who are making matches out of aspen out here were getting 3 to 4 annas more for their matches than those made of Indian wood. The present difference is only 1 anna to 1 anna 6 pies.

President.—If you get 6 gross out of aspen against 2 gross out of genwa it is economical, is it not?

Mr. Sen Gupta.—No. But the matches made of aspen splints will fetch little higher price and there are difficulties why we cannot use it. Small factories cannot import aspen direct in large quantities and keep them for a longer period. There are financial difficulties also.

Dr. Matthai.—When a factory of your size gets aspen where does it get it from?

Mr. Sen Gupta.—We have not tried aspen yet.

Dr. Matthai.—Then where do you get this figure of 6 gross?

Mr. Sen Gupta.—I tried aspen in other factories.

Freight from the Andamans.

President.—You were talking about transport facilities. The Conservator of Forests, Andamans, says " In the long run the freight on timber will be too high to allow large quantities to be exported as there is very little inward cargo. The low freight has been secured at present is due to the fact that a Government steamer would go empty once a month to Rangoon without the cargo of logs. This, however, is not likely to last and the ruling commercial rates under similar conditions must be taken as a basis for calculating freight for the future. Logs take up too much space in a ship to allow of this cargo being carried at a low freight rate ".

Mr. Sen Gupta.—We cannot say what the increase will be. The freight from Rangoon to Calcutta is Rs. 17-8-0 per ton. We can pay that if we get wood in sufficient quantity.

Demand in Calcutta for match woods—Transport from the Andamans—Messrs. Martin & Co.

President.—What demand do you think there is in Calcutta from match factories for wood for match making?

Mr. Sen Gupta.—I think it is about 30,000 tons per year.

President.—The Andamans can supply, say, 30,000 tons under very favourable conditions supposing you had freight. Out of that 6,000 tons at present goes to Messrs. Adamjee Hajee Dawood and Company and possibly more will go to Rangoon. When we were over there we were told they could not get supplies, that is why they did not take it. If you want 30,000 tons here of this particular kind of wood it is doubtful whether you would get it. This 30,000 of course includes both *papita* and *dhup*.

Mr. Sen Gupta.—But there is another species called *didu*.

President.—It is not likely that you would get 30,000 tons in the future. What is your information as to the probable annual supply of *bakota*?

Mr. Sen Gupta.—Our information is that about 500 tons can be brought to Calcutta conveniently per month, that is 6,000 tons a year.

President.—That would not go far, would it, among all the factories here?

Mr. Sen Gupta.—I have not considered the cases of all other factories.

President.—We have to consider what the future supplies for all the factories are and if protection is granted, whether there would be an ample supply of wood. Supposing protection was granted and the Match industry increased—and it would appear that *bakota* is the only suitable kind of wood for factories in Calcutta—the price of wood would go higher and higher and you will, therefore, get very little advantage out of protection?

Mr. Sen Gupta.—The present rate at which we buy in Calcutta is much higher than that in Rangoon and it must be reduced, that is my point.

President.—But when more factories start the rates will again be higher?

Mr. Sen Gupta.—We are paying double the Burma rate. They are getting it at Rs. 35 a ton in Burma whereas we are paying Rs. 65.

Dr. Matthai.—They import it direct?

Mr. Sen Gupta.—We understand that they import it direct in Burma. But the middlemen here import it for us. Messrs. Martin and Company, I understand, have got a monopoly to sell Government wood in Calcutta.

Dr. Matthai.—You want some Government authority to import wood on your account?

Mr. Sen Gupta.—No, not that. We can import it ourselves if we are allowed to do so.

President.—It is open to you to go to the Andamans and bid for the wood at Government auctions.

Dr. Matthai.—You have got an Association of Match Manufacturers; why don't you attempt co-operative action?

Mr. Sen Gupta.—We are attempting to do that, but Government is very slow to move.

President.—Why should Government do anything? Their usual system is to auction the wood. It would be invidious if Government were to say "we won't auction this wood, we would give this factory so much and that factory so much".

Mr. Sen Gupta.—Government ought to give us facilities to import wood direct. There must not be any middlemen to interfere with us as Messrs. Martin & Co., are in this case. They can also limit the supply to Indian owned factories alone if the supply is not abundant.

Dr. Matthai.—If you have a co-operative organisation of match manufacturers in Calcutta and if that association gets into touch with the forest authorities in the Andamans, it would be possible for you to import direct and thus get rid of the middlemen. I don't see why any Government assistance is required in this matter.

Mr. Sen Gupta.—There are lots of difficulties in this co-operative organisation. There are different parties with different views.

President.—That may be so, but at the same time it seems to me that so long as any auction system of wood from the Government forests continues, you will always be in that position. Whoever is able to secure the supply of wood for a year would be able to charge you any price he likes. I mean to say it is up to you to go to the source of supply, bid at the auction and obtain wood direct. That seems to be the only possible remedy, is it not? I don't quite see what other facilities you would expect from Government.

Mr. Sen Gupta.—The facilities we expect from Government are of transport and nothing else.

President.—Government runs one steamer.

Mr. Sen Gupta.—Yes. My information is that it is managed by Messrs. Turner, Morrison and Company. Two other steamers are run by the same Company, chartered by Government.

President.—Your proposal is that Government should run another steamer.

Mr. Sen Gupta.—Government should give all transport facilities and there must not be middlemen to interfere in the direct supply.

President.—Can you purchase this wood from the Andamans direct?

Mr. Sen Gupta.—There are suppliers there who are ready to supply this special kind of wood, but for the middlemen standing in their way we can't get the supply direct.

President.—How do you mean that the middlemen are standing in the way?

Mr. Sen Gupta.—I have reason to believe that Messrs. Martin and Company told the Forest Department recently that if you supply this wood, direct to manufacturers we won't be able to sell the other kinds of wood. The Department naturally attach much more importance to what Messrs. Martin and Company say in the matter than to what we say.

President.—That is to say you can't obtain the wood from the Andamans at present.

Mr. Sen Gupta.—We are getting some as I have already stated through Messrs. Martin and Company.

President.—You can't get it direct. You cannot purchase yourself.

Mr. Sen Gupta.—No.

President.—That, I suppose, is because the contract for the wood for a year has been taken by Messrs. Martin and Company.

Mr. Sen Gupta.—I understand that it is generally sold by Messrs. Martin and Company on a commission system, acting as agents to the Government of India for selling the Andaman wood in Calcutta.

President.—Can you give us details about that?

Mr. Sen Gupta.—I may try. The forest people themselves admit that Messrs. Martin and Company are agents to the Government of India.

President.—In what way do they act as commission agents? Do they get a commission on sales?

Mr. Sen Gupta.—We can't say whether it is exactly so; because in Burma this wood is selling at Rs. 35 per ton whereas in Calcutta we are charged about Rs. 54 for it.

Dr. Matthai.—Have you ever asked the forest authorities in the Andamans about this matter?

Mr. Sen Gupta.—We have not asked.

Dr. Matthai.—Have any match manufacturers in Calcutta ever addressed the forest authorities in the Andamans about the supply of wood?

Mr. Sen Gupta.—One of the representatives of the Match Manufacturers' Association who will appear before you to give evidence this afternoon has been recently to the Andamans to investigate the question of the supply of wood. He will be able to tell you more about it.

Dr. Matthai.—Did he make any definite attempt to get the supply of wood from the Forest Department in the Andamans?

Mr. Sen Gupta.—He did but I understand he has failed.

Dr. Matthai.—Why?

Mr. Sen Gupta.—He will explain more fully why.

Dr. Matthai.—If you give us some kind of information, we will be able to question him.

Mr. Sen Gupta.—So far as I understand, Messrs. Martin and Company did not want it to be sold to us directly from the Andamans.

Dr. Matthai.—Why?

Mr. Sen Gupta.—They made it practically impossible for us to import. First of all it was arranged that we should get the wood, price and everything was settled. At the last moment it was found that there was no space in the steamer. They managed the whole thing in such a way that we could not import wood direct.

Dr. Matthai.—As you say, if this gentleman is to give evidence this afternoon we shall ask him about that.

President.—Would you explain what do you mean by saying that Government should give facilities?

Mr. Sen Gupta.—I can only suggest that Government should see that the plea that there is no space in the steamer is not made to constitute an insurmountable difficulty. Now what happens is that though there is sufficient supply of wood in Andamans it is refused transport.

President.—At the present moment I understand about 5,000 tons is being exported to Rangoon and about 2,000 tons to Calcutta. 7,000 tons is transported in a Government steamer which plies once a month.

Mr. Sen Gupta.—In the Government steamer are imported not only match wood, but other species of wood also.

President.—That doesn't show that there is so much space left.

Mr. Sen Gupta.—There are 3 steamers and they could bring more.

President.—Do all of them belong to Government?

Mr. Sen Gupta.—I am not sure. Still steamers are running. They are not running for nothing. They are also carrying wood.

President.—Why don't you try and arrange with the agents of the other two steamers?

Mr. Sen Gupta.—The Forest Department does not allow. I can cite one instance in point that I have heard. Somebody in Calcutta arranged with a contractor in the Andamans to get some 100 to 200 tons per month of this

particular species. Everything was arranged and we expected the shipment, but when the steamer arrived, nothing came. It was found that Messrs. Martin and Company had sent a telegram to the Forest Officer to cancel the license of that contractor in the Andamans and accordingly the license was cancelled and the shipment withheld.

President.—Would it not be advisable for you to put your difficulties before the Forest Officer in the Andamans?

Mr. Sen Gupta.—It has already been put. We don't think it will do us any good.

Dr. Matthai.—If Messrs. Martin and Company are the only people who are prepared to buy wood in large quantities from the Forest Department in the Andamans, then it is a perfectly business like thing from the point of view of the Forest Department to act like that.

Mr. Sen Gupta.—I quite agree. It is true they were buying and are still buying other kinds of wood in large quantities, but the match wood is only being imported very recently.

Dr. Matthai.—Take a case like this. I, as a business man, am interested in the sale of some commodity. I have got here a merchant who is prepared to take over my supplies in very large quantities. If he says that he is not prepared to do that business for me, if I am going to deal direct with other people, then it might be worth while for me to make an exclusive agreement with him.

Mr. Sen Gupta.—I understand that.

Dr. Matthai.—I have got to stand by this man.

Mr. Sen Gupta.—Our point is that we don't object buying from Messrs. Martin and Company. All that we want is a regular supply of suitable wood at a reasonable price.

Dr. Matthai.—I may be entirely wrong. But it looks to me that your position would be very much stronger if you people would co-operate and be prepared to take over sufficiently large quantities of wood from the Andamans forests.

Mr. Sen Gupta.—Yes, but I want to tell you another thing. We wrote to Messrs. Martin and Company through our Agents telling them that whatever quantity they imported of this particular species, we would be prepared to take and they partially agreed. But afterwards what they did was, that though we are starving for this wood, they supplied it to such foreign companies as Mitsui Bussan Kaisha and the Western India Match Company that is to say to firms which are importing aspen in large quantities. Of course from purely business point of view they are at liberty to supply it to anybody and everybody as they choose.

President.—Is there any question of price in that?

Mr. Sen Gupta.—No, they are supplying at the same price—as far as I know.

President.—Why don't you make arrangements to make a firm offer for so many tons of wood of this particular kind?

Mr. Sen Gupta.—We have tried it and are still trying.

Dr. Matthai.—Have you ever tried to bring this matter up before the Committee of the Indian Match Manufacturers' Association?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Did they ever attempt to take joint action?

Mr. Sen Gupta.—I brought the matter informally before the Committee just before the Puja holidays, so we had no opportunity to discuss the matter fully. We decided to wait upon the Director of Industries and put before him all our grievances about the supply of this wood and see what he says.

President.—Have you put it before the Director of Industries?

Mr. Sen Gupta.—We are going to do it.

President.—How long has this difficulty been going on regarding the supply of wood from the Andamans?

Mr. Sen Gupta.—From the very beginning.

President.—When is the very beginning?

Mr. Sen Gupta.—It is being imported in Calcutta since the last six months.

President.—Since the Tariff Board took evidence in Rangoon in March.

Mr. Sen Gupta.—Yes, from that time.

Dr. Matthai.—I find you started operations in November, 1926 a month after we started our enquiry.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—I suppose you have been thinking of this since then.

Mr. Sen Gupta.—We worked in the beginning with genwa wood and then we came to discover that Andaman wood was better.

Genwa—Sundarbans.

Dr. Matthai.—Have you any kind of information about the supply of genwa in the Sundarbans?

Mr. Sen Gupta.—The supply is scanty at present. I understand that some restrictions have been imposed. Owing to these, the supply has probably become scanty and at the same time it takes a long time for the boat to come here with the result that more than half the quantity goes dry and becomes unsuitable before the boat arrives at Ultadinghi.

Dr. Matthai.—Why were these restrictions imposed?

Mr. Sen Gupta.—Previously the boatmen were allowed passes to cut trees from anywhere they liked, but now Government are allotting blocks in which to cut and fell trees.

President.—Action has been taken to conserve supplies?

Mr. Sen Gupta.—Yes, I suppose.

President.—I suppose that the Sundarban jungle is now divided into coupes and that one coupe in each series is worked at a time. Is that correct?

Mr. Sen Gupta.—They don't allow to work anywhere and everywhere at present as they did before, but they allot some blocks to cut trees from.

President.—That is the ordinary system of conservation.

Mr. Sen Gupta.—Those who are present when blocks are marked get passes and those who come late don't get them at all and they come back. Another thing is that formerly wood used to come in small boats, but now it comes in big ones carrying about 1,500 pieces or so which take a long time to come.

Dr. Matthai.—What is the distance from the Sundarbans to Calcutta?

Mr. Sen Gupta.—I don't know exactly.

Dr. Matthai.—What time does it take generally for a boatman to get here?

Mr. Sen Gupta.—About 2 months, in ordinary course.

Dr. Matthai.—You think that it is too long a time.

Mr. Sen Gupta.—Yes. If the wood is brought in small boats, they can come here in 30 to 40 days.

Dr. Matthai.—When you mean a small boat, what do you mean?

Mr. Sen Gupta.—A boat carrying about 500 pieces.

Dr. Matthai.—About 10 tons.

Mr. Sen Gupta.—Yes. Even smaller boats carrying 200 or 300 pieces used to come formerly but at present they bring about 1,200 to 1,500 pieces in one boat, the lowest being about 1,000 pieces.

Dr. Matthai.—In the case of people like you who don't buy straight from the boatmen but from the market what happens I suppose is that the dealers buy the wood from the boatmen and stock it.

Mr. Sen Gupta.—No, they do not stock wood but generally they sell it as a whole to a customer.

Dr. Matthai.—How is that done?

Mr. Sen Gupta.—There are always some boats containing wood in the canal and we go and select the boat we want and we are supplied with the wood from there. That is the system. The quality of wood that we get now is bad. 60 per cent. of it goes dry leaving us only a balance of 40 per cent.

President.—We understand that your main difficulty is in regard to wood.

Mr. Sen Gupta.—Yes, mostly in regard to its quality.

President.—That is the main reason for getting a low price.

Mr. Sen Gupta.—Yes.

President.—Really your application is rather for facilities for obtaining wood than for any system of protection, is it not?

Mr. Sen Gupta.—Yes, that is also a proposal we make but we cannot carry on without protection on the lines we have suggested.

President.—Your disadvantage is that your wood is of unsatisfactory quality it does not arrive in good condition and the supply is irregular.

Splint and veneer factories in the forests.

Mr. Sen Gupta.—The thing is that Government should give facilities so that the manufacturers may open splints and veneer factories near the forest area and this particular species must be reserved only for match purposes.

President.—Is it a good proposition to manufacture splints near the forests?

Mr. Sen Gupta.—That is not a bad proposition.

President.—We were informed in Burma by the larger factories who have gone into the question that it is not a good proposition from the business point of view, because it meant that you would need extra supervision and additional expert mechanics at the splint factories in the forests and thus you would have to duplicate your staff. Therefore your costs would go up very much.

Mr. Sen Gupta.—I don't think so, because in Japan all these things are done by division. There are factories for cutting veneers; there are factories for cutting splints and there are factories for finishing. They are doing it economically.

President.—Are they working economically?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Are you sure?

Mr. Sen Gupta.—Yes. I had been there myself and investigated the matter. I was there for 1½ years.

Dr. Matthai.—How long ago was this?

Mr. Sen Gupta.—It was in 1923 and 1924.

President.—Then the prices of matches were considerably higher in 1923 and 1924.

Mr. Sen Gupta.—At that time they were a bit higher.

Dr. Matthai.—You have no later information.

Mr. Sen Gupta.—No.

President.—Our information is that although it might be possible to manufacture splints in the forests and export them to a finishing factory, if the price of matches were higher than at present, it is not an economic proposition at present and that it is cheaper to manufacture in one place.

Mr. Sen Gupta.—It is rather expensive for a factory to have two different departments in two different places in Calcutta. Recently I had a talk with a gentleman about the question of starting a factory in the Andamans to make splints and veneers. He said that it could be done but that there would

be difficulty in getting space in the boat, leaving Port Blair for Calcutta to import them into Calcutta.

President.—To import what?

Mr. Sen Gupta.—To import splints.

President.—Surely less space is required for splints than for woods.

Mr. Sen Gupta.—Yes, but even that much space may not be available.

President.—Have you made any experiments in regard to the separate manufacture of splints? On what do you base your opinion?

Mr. Sen Gupta.—No. But we are manufacturing splints and veneers and we sell the surplus for which there is a demand.

President.—That is perfectly true. It is one proposition to sell splints which you manufacture as a sort of by-product in your factory and it is quite another thing to establish a separate factory for manufacturing splints and a separate factory for finishing. You will require, for instance, two managers, instead of one.

Mr. Sen Gupta.—Yes, but then it will be possible in that case to prevent wastage which is a large item and at the same time we shall be able to improve the quality of splints, using fresh green wood and this will greatly help us reducing the cost of production.

President.—Supposing your splint machine goes wrong in the jungle, it is not easy to repair in the jungle unless you have some sort of staff there. You will have to have an engineer and also maintain a stock of spare parts. These are difficulties which may arise.

Mr. Sen Gupta.—I don't think so.

President.—Match machinery is extremely delicate. Mr. Dharamsey was telling us yesterday that more depreciation should be allowed on match machinery and that the whole machinery should be replaced in five years. That means that there are a large number of breakdowns in the course of a year and a considerable amount of repair work has to be done. If you have to close down your factory in the jungle and wait till you get people from Calcutta to execute repairs, it is not going to be an economic proposition.

Mr. Sen Gupta.—There must be a sufficient number of spare parts to replace and there must also be a small repairing shop attached to the factory.

President.—That would of course mean duplication.

Mr. Sen Gupta.—Yes, but it will cost us very little. When there is a heavy breakage in the machine it may require the factory to be temporarily closed. We cannot help that.

President.—It means duplicating your workshop plant and your staff.

Mr. Sen Gupta.—Yes, but not of splint and veneer machines nor the staff required to work them; besides if splints are manufactured in large quantities, costs will be reduced, as I have already mentioned.

Dr. Matthai.—Would you get labour for a very large factory in the jungle?

Mr. Sen Gupta.—I think that labour will be available. It will not be difficult to get it.

Dr. Matthai.—In the jungle area?

Mr. Sen Gupta.—Yes. For splint and veneer cutting purposes, only a very small number of hands is necessary.

Dr. Matthai.—If you had a fair sized factory, you would need at least three to four hundred people.

Mr. Sen Gupta.—What do you mean by a fair sized factory?

Dr. Matthai.—You employ about 100 people.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Your output is 200 gross per day.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Take a factory with a daily output of 1,000 gross; ever that is a small sized factory. You would require 300 to 400 people for a fac-

tory of that size. Supposing you started a factory for making splints in a jungle area, I don't think that it would be an easy thing for you to collect the necessary labour.

Mr. Sen Gupta.—As I have already explained, it requires a very few hands to manufacture splints and veneers. Of course, no attempt has been made so far.

President.—We understand that it has been considered by larger factories such as that of Messrs. Adamjee Dawood and obviously if it is such a simple proposition as you say, the larger factories in Burma would by this time be manufacturing their splints up-country and sending them down by river transport, would they not, instead of transporting the wood by river to their factory in Rangoon?

Dr. Matthai.—Both the Swedish Match Company and Messrs. Adamjee Hajee Dawood and Company considered this proposition and definitely turned it down.

Mr. Sen Gupta.—As far as we are concerned, the question is only now under consideration and we consider it to be a feasible one.

Dr. Matthai.—If you could speak from experience, then it would be another matter.

Mr. Sen Gupta.—We have not yet taken any definite action in the matter. We think that if splints and veneers are made elsewhere, we may get some real advantages. But we cannot say at this stage whether we shall not fail.

President.—It is not an enterprise which at any rate you would undertake and sink a considerable amount of capital at once, would you, without making experiments? You will make experiments on a small scale, won't you?

Mr. Sen Gupta.—We are not going to make any experiments at present at least so long as we get this wood. But if the supply is stopped, then we shall have to see other ways of getting suitable woods and if we fail we may, in that case undertake the job.

Dr. Matthai.—You agree with the President, don't you, that the main thing that you want is some kind of guarantee about the supply of suitable woods at reasonable prices.

Mr. Sen Gupta.—Yes, it is one of the main things.

Dr. Matthai.—That is the main thing you want.

Mr. Sen Gupta.—Yes, as I have stated.

Dr. Matthai.—It is not so much a question of any changes in the tariff.

Mr. Sen Gupta.—In Burma, as I told you before, they are getting woods at Rs. 35 per ton, whereas we have to pay Rs. 54. The difference in price is really very great. Their cost of wood is just half of what we pay, and naturally their cost of production must be less than that of ours.

Dr. Matthai.—That is the position with regard to most of the companies.

Mr. Sen Gupta.—Yes.

President.—What did you say was the landed cost of Genwa?

Mr. Sen Gupta.—Rs. 62 per ton for Genwa delivered at the factory.

Use of match woods for other purposes.

President. In answer to question 22 (*d*), you say that the price of wood has gone up owing to its very large use for other purposes.

Mr. Sen Gupta.—Yes, for packing cases.

President.—Is it used for packing purposes?

Mr. Sen Gupta.—Previously it was mostly used for packing purposes.

President.—Is it being used at present for packing purposes at the present price?

Mr. Sen Gupta.—Yes. The saw mills are working; they have not stopped work.

Dr. Matthai.—What wood are the packing cases made of?

Mr. Sen Gupta.—They are made of Genwa, Simul, Deodar, etc.

President.—The present high price has not prevented that wood being used for other purposes.

Mr. Sen Gupta.—No.

President.—There will have to be a substantial increase in price to prevent that wood being used for packing cases.

Mr. Sen Gupta.—No. Restriction of this wood to match manufacturing is needed.

President.—You suggest, I understand, that the use of Genwa for other purposes must be prohibited.

Mr. Sen Gupta.—Yes.

President.—How would you set about doing that?

Mr. Sen Gupta.—If the Genwa wood is reserved exclusively for manufacturing matches, we can get it all for our industry.

President.—Supposing that on general grounds it is considered not objectionable to stop its use for other purposes, in what way would you set about stopping it?

Mr. Sen Gupta.—That is a matter for Government to see how it can be done.

President.—The only way I can think of is to make it penal to use it for other purposes.

Mr. Sen Gupta.—Is that practicable?

Dr. Matthai.—You cannot do it on a system of license obviously. Is it used as fuel?

Mr. Sen Gupta.—Only the rejected wood is used for fuel and not the wood in log itself.

Railway and Steamship freights.

President.—In answer to question 25 (*b*) you say that you consider that the present freight charged by railways and steamship companies for the carriage of wood to be excessive. Have you put the case before the Railway Rates Advisory Committee?

Mr. Sen Gupta.—We are thinking of placing the matter before the Railway Board.

President.—With a view to that being placed before the Railway Rates Advisory Committee?

Mr. Sen Gupta.—Yes.

President.—The question of railway freight is outside the scope of this Board's enquiry. There is a special Committee sitting to consider such questions.

Mr. Sen Gupta.—There are other species of suitable wood for our industry in the Duars.

President.—In the Buxar Range?

Mr. Sen Gupta.—It is in the Jalpaiguri and Darjeeling districts. They are called Chatim and Kawla, Lapcha, Khira, etc., which are fairly suitable for match making. Owing to heavy railway freight, we have given up the idea of bringing them down from the Dooars.

President.—Is the freight for match wood heavier than that for other kinds of wood?

Mr. Sen Gupta.—No. They generally charge on weight. As we will have to bring green wood the weight will be necessarily heavy.

Dr. Matthai.—You will have to pay for a lot of water.

Mr. Sen Gupta.—Yes.

President.—They don't charge by bulk?

Mr. Sen Gupta.—They don't charge on measurements.

President.—Any way that is a question which you have put before the Railway Board.

Mr. Sen Gupta.—We are going to do that.

Costs of Chemicals.

President.—As regards costs of chemicals, I have compared the prices that you pay for your chemicals with those paid by Messrs. Adamjee Hajee Dawood and Company.

Mr. Sen Gupta.—Generally those who buy chemicals from the Calcutta market have to pay almost double of what those who import direct would pay.

President.—I see you pay Rs. 500 for chlorate of potash or nearly £40 per ton, whereas the maximum price paid by Adamjee's is £35 and the minimum price £28. So, you are paying considerably more than they do for that particular article.

Mr. Sen Gupta.—I think they are importing direct whereas we are buying locally from the Calcutta market.

President.—As regards bichromate of potash, you are paying Rs. 1,120 or about £90 a ton as against Adamjee's £40.

Mr. Sen Gupta.—We pay Rs. 56 per cwt. for powdered bichromate of potash. Another thing regarding this chemical is: there is a firm called The Match Manufacturing Supply Company, Limited, which is a Swedish concern. Generally we used to buy bichromate of potash in crystal form and to powder it ourselves. The Swedish Company offer powdered bichromate of potash at a very low rate—about Rs. 28 or 30 per cwt. and we purchased some quantity and found it not at all suitable. It was an adulterated thing. The bichromate of potash is non-hydroscophic, but the staff that we purchased was highly hygroscopic and looked as if it had just been soaked in water.

President.—As regards ferric oxide and manganese dioxide, both of you pay the same price. But for sulphur you pay about £20 a ton, whereas Adamjee's pay only £12 a ton. For glass powder you pay £14 a ton as against Adamjee's £7 or £8. You pay for sulphide of antimony Rs. 1,400. As regards red phosphorous, is that the same as amorphous phosphorous?

Mr. Sen Gupta.—Yes.

President.—You are paying for red phosphorous £350 a ton whereas Adamjee's pay only about £195 to 210 a ton. You are paying very heavily for chemicals.

Mr. Sen Gupta.—Yes, because we are buying from the Calcutta market.

President.—Is it impossible for you to import direct?

Mr. Sen Gupta.—If they are imported direct, they must be imported in little larger quantities, but we cannot afford to block our capital so much for this purpose.

President.—Is it not possible for the Match Manufacturers' Association to import for you?

Mr. Sen Gupta.—It is not impossible for anybody to import unless funds are forthcoming; there must be money to import.

Dr. Matthai.—Why don't the members of the Match Manufacturers' Association buy on a joint indent and thus place a large order?

Mr. Sen Gupta.—That is possible, I think.

President.—A difference of £200 is going to make a large difference to your cost, is it not?

Mr. Sen Gupta.—Yes. We are trying to start some sort of co-operative organization among the Match manufacturers in Calcutta so that we can import everything jointly to our benefit and make it profitable for us.

President.—With a well organized co-operative organization the position of the match manufacturers in Calcutta will be very much improved, will it not?

Mr. Sen Gupta.—Yes. The main difficulty is that the big factories will not come up and join us. They care very little for the smaller factories and they generally import chemicals direct.

Dr. Matthai.—You can leave them out; take only the small sized factories. Their combined orders would be sufficient to make a reduction in your costs.

Mr. Sen Gupta.—We shall be trying to have a co-operative organization formed for the importation of chemicals; but we have not thought about wood.

Dr. Matthai.—Once you start with chemicals you can get on to other things.

Mr. Sen Gupta.—Wood is a very heavy item.

Dr. Matthai.—It is not merely that you pay a higher price, but I find that the amount of chemicals you consume is larger than that consumed by some other factories who have given us figures. Take an item like paraffin; your consumption is 24 lbs; the figure that we have got from another factory is 8 lbs. per 100 gross. Your chlorate of potash is 30 lbs. and the figure that we have got from another source is 25 lbs; your glass powder is 14 lbs. and theirs is 5 lbs.

Mr. Sen Gupta.—It depends on different recipes.

Dr. Matthai.—I don't think that is entirely explained by recipes because your figure is higher for each of these chemicals. If you were lower in one and higher in another, then that might be an explanation. I am inclined to say on a comparison of the figures that your consumption of chemicals at present is somewhat uneconomical.

President.—If you look at your costs for the last five months you will see that your charge for chemicals is 4 annas whereas Adamjee's cost is 1 anna 6 pies.

Mr. Sen Gupta.—Our charge is higher because we are paying more for our chemicals; I quite agree there.

President.—If you had a co-operative organization you could get your chemicals cheaper.

Mr. Sen Gupta.—I agree.

Dr. Matthai.—Have you got your latest costs? The figures you have given are for the last five months of 1925-26. It is now about six months since you submitted your return. Has the cost of chemicals come down?

Mr. Sen Gupta.—Our cost has been reduced to some extent.

Dr. Matthai.—Re. 1-8-6 is your works cost in this statement. What is it now?

Mr. Sen Gupta.—It is about Re. 1-6-0 at present. The price of some chemicals has come down, *e.g.*, paraffin. That is generally supplied by Messrs. Shaw, Wallace and Company.

Dr. Matthai.—How long have you been buying from Messrs. Shaw, Wallace and Company?

Mr. Sen Gupta.—From the beginning.

President.—Do you find it satisfactory?

Mr. Sen Gupta.—Yes.

President.—We were told in Burma that the flash point was not very satisfactory for the manufacture of matches.

Mr. Sen Gupta.—I can't say.

Labour.

President.—In answer to question 34 you say you employ 100 labourers. Could you tell us how these men are employed, how many are employed on the lathes, how many on the chopping machine and so on?

Mr. Sen Gupta.—I shall send you the information later.

Electricity—Coal.

President.—You say the cost of electric current is 2 annas a unit. Is not that high?

Mr. Sen Gupta.—That is the rate generally charged by the Calcutta Electric Supply Corporation.

Dr. Matthai.—There is another industrial concern which came before us last year who said they paid about 9 pies per unit.

Mr. Sen Gupta.—I understand everywhere it is supplied at the rate of 2 annas.

Dr. Matthai.—Is not their rate on a sliding scale?

Mr. Sen Gupta.—I can't say. 2 annas is what we pay.

Dr. Matthai.—It is almost as high as the cost of electricity for domestic purposes. How many units do you consume per 100 gross?

Mr. Sen Gupta.—At present we are working with a 15 h.p. motor and our consumption is 30 units per day.

President.—The Esavi India Match Manufacturing Company told us that their electric current supply, which is supplied by the Calcutta Electric Supply Corporation, cost them 0-0-6 to 0-1-6 per unit.

Mr. Sen Gupta.—I can't understand how they gave that figure.

Dr. Matthai.—My idea is that they have different rates for different classes of consumers based on the units consumed.

Mr. Sen Gupta.—That may be the case. We generally consume 30 units per day.

Dr. Matthai.—That is about 7 gross per unit?

Mr. Sen Gupta.—Yes.

President.—I suppose you use very little coal?

Mr. Sen Gupta.—About 10 maunds a day.

President.—What is it used for?

Mr. Sen Gupta.—Paraffin melting, heating plates, drying and so on

President.—You pay a rather heavy price for it, Rs. 17-12-0 per ton?

Mr. Sen Gupta.—At present we pay at the rate of 8 annas per maund, delivered to our factory.

President.—That would be about Rs. 15 a ton. Is not that much above the market price?

Mr. Sen Gupta.—We never buy in wagons. If we do that the price may perhaps be reduced a little.

President.—We see in the papers that the price for 2nd class coal is Rs. 3 per ton.

Mr. Sen Gupta.—We generally buy from the Ultadinghi market and 8 annas is the prevailing rate there. Rs. 3 per ton seems to me to be quite an astonishing figure.

President.—Would it not be possible for you to buy in larger quantities and economize?

Mr. Sen Gupta.—We shall try to do that.

President.—It is worth while looking into. At any rate it is out of all proportion to the wholesale rate of coal at present.

Mr. Sen Gupta.—Yes.

Competitors.

President.—Your chief competition is from Indian matches manufactured from imported wood?

Mr. Sen Gupta.—Yes.

President.—Which firms manufacture these?

Mr. Sen Gupta.—The Western India Match Company, the Esavi India Match Manufacturing Company, Messrs. M. N. Mehta and Company and the Calcutta Match Works.

President.—Do they all manufacture with aspen?

Mr. Sen Gupta.—Yes, I believe so.

President.—They use aspen for their splints and genwa for veneers?

Mr. Sen Gupta.—Yes.

President.—You consider their competition is much more serious than imported matches from abroad?

Mr. Sen Gupta.—Yes.

President.—Do the Western India Match Company use genwa also?

Mr. Sen Gupta.—Yes. They are making two different kinds of matches. They make their first quality with aspen and the second quality with genwa.

President.—At what rate do they sell their second quality matches?

Mr. Sen Gupta.—At a retail price of Rs. 1-8 per gross. They sell their best quality aspen matches at Rs. 1-11 or Rs. 1-12 per gross.

President.—That is a difference of 3 to 4 annas.

Mr. Sen Gupta.—Yes.

President.—Do you find more competition from their second class or first class matches?

Mr. Sen Gupta.—Our competition is much more with their second class.

President.—But you find their first class competing much more than imported Swedish matches?

Mr. Sen Gupta.—That is so.

Measures to be taken against foreign companies.

President.—You have suggested later on certain measures to be taken against manufacturers who are financed by foreign capital. Do you also suggest any sort of measures against manufacturers who use imported wood?

Mr. Sen Gupta.—Regarding imported wood we do not suggest anything. Our suggestion is that Government should give us protection against foreign companies—not against those Indian ones who use imported wood. The thing is that if any measure is taken to stop the importation of wood then the demand for local wood would be greatly increased and there would be a scarcity of match wood and practically all the factories will be greatly handicapped.

President.—On the other hand supposing you maintain that this industry qualifies for protection, surely you would not recommend protection to those manufacturers who manufacture from imported materials. Let us suppose for the sake of argument that your representation that the industry qualifies for protection was justified and a protective duty was imposed, although it might be maintained that Indian factories manufacturing from Indian materials qualify for protection, it could hardly be held that Indian factories manufacturing in India out of imported material qualify for protection in the same manner.

Mr. Sen Gupta.—Unless all the materials are manufactured here how can such a condition be imposed?

President.—We are bound by the conditions of the Fiscal Commission and according to our terms of reference we have to report according to those conditions and one of them is that the raw materials should be available in the country in abundant quantities. Now, it might be maintained that wood is available in sufficient quantities in India and possibly factories manufacturing with Indian wood might qualify for protection. But a factory importing aspen wood from Finland and chemicals from Japan would hardly come under the terms of reference.

Mr. Sen Gupta.—What about chemicals? I admit manufacturers using imported wood might not qualify for protection but what about factories using local wood but imported chemicals?

President.—I am now making the point as regards wood, and it might conceivably be held that factories manufacturing from Indian wood qualify for protection, but it would not appear that factories manufacturing matches from aspen only qualify for protection. Supposing protection is granted to the industry, is there any reason why protection should be extended also to factories which use imported wood and so do not come under the conditions laid down by the Fiscal Commission?

Mr. Sen Gupta.—If that restriction is imposed those who are now using imported wood would discontinue the use of that wood and fall back upon the local supply.

President.—That is to say you think that if the industry as a whole is considered deserving of protection, protection should be extended to factories which use imported aspen wood as well and that no countervailing duty should be imposed on them.

Mr. Sen Gupta.—The excise duty should only be imposed on the factories financed and controlled by foreign capital.

President.—I am not speaking of foreign capital. I am asking your views about factories which are using aspen wood.

Mr. Sen Gupta.—There should be no restriction. The duty may be raised from 15 per cent. to 20 per cent. *ad valorem* on imported wood.

Protection of the Industry.

President.—You say that in answer to question 56, you consider the economic unit of production as 1,000 gross of matches a day.

Mr. Sen Gupta.—Yes.

President.—At present you would not consider that your factory is equipped economically.

Mr. Sen Gupta.—Not at present.

President.—So that as an estimate of the measure of protection if the industry is held to qualify for protection or assistance and if the industry is held to have any vested right resulting from the imposition of a revenue duty, your costs could hardly be taken as the standard on which we could judge the amount.

Dr. Matthai.—On your own admission your size is not at present an economical size.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—Therefore your costs must be unduly high.

Mr. Sen Gupta.—I understand that. If protection is given, we can of course increase our output and if protection is not given even if we make 1,000 gross a day, the factory cannot be run economically.

President.—You must understand that in our proposals we shall have to specify the reasonable cost at which a well equipped factory can manufacture matches. We have to make our calculations and state definitely what would be the reasonable cost. It would not be reasonable for us to base any such calculations on your cost as shown here, because on your own admission your equipment is not an economical unit of production.

Mr. Sen Gupta.—Yes.

President.—You would agree so far as the calculation regarding the cost of production is concerned, it would be reasonable to take larger factories like the Esavi India Match Manufacturing Company and Messrs. Adamjee Hajee Dawood and Company.

Mr. Sen Gupta.—Yes. The nature of protection must be such as to enable small factories to survive in the face of competition with mass production.

Dr. Matthai.—Obviously if we base our measure of protection on your costs, we must be putting an unnecessarily heavy burden on the consumer.

Mr. Sen Gupta.—My point is that the bigger factories must pay some excise, whereas the smaller factories must be exempted from it.

President.—Supposing we had the cost of a factory in Calcutta producing 1,000 gross a day and we found looking into their costs that the measure of protection that they require at present prices is only Re. 1 and not Rs. 1-8, then obviously our suggestion to the legislature would have to be that the present duty must be reduced from Rs. 1-8 to Re. 1, because we cannot give a measure of protection which is required by a factory which is obviously uneconomical. The standard for fixing the measure of protection must be the standard of an economical factory and that on your admission is 1,000 gross a day.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—It may be that you may be able to achieve greater economies if you raise your output to 1,000 gross. That of course does not concern us, because we take normally what is an economic output.

Mr. Sen Gupta.—When the factory was started the market price was much more than the present price. So at present we are greatly handicapped owing to the sudden fall of the market, because the Swedish people have reduced their prices to a very great extent. Consequently we have had to follow suit—we can't help it—if we are to sell our stuff. All the factories have similarly reduced their rates. If the output is to be increased, larger capital has to be invested, which we cannot do under the present insecure condition of the market. To instill the confidence in the minds of manufacturers that this industry has a future, there must be some effective protection, so that they may work peacefully for some years to come and devise means of economising.

Dr. Matthai.—In answer to question 60 you say that you don't contemplate making any extensions to your equipment and machinery.

Mr. Sen Gupta.—It depends on whether the outlook for this industry is improved.

Dr. Matthai.—What does your answer to question 60? Does it mean that you don't propose to have any extensions whether protection is granted or not?

Mr. Sen Gupta.—If protection is granted, certainly we shall.

Dr. Matthai.—If protection is not granted, you don't propose to do so.

Mr. Sen Gupta.—We can't say whether in that case we shall continue at all or not.

Dr. Matthai.—What will be the possible consequence of not granting any protection?

Mr. Sen Gupta.—A good number of factories will close down. Already a good number have closed. Some of them are still lingering. Factories spending more money to carry on may survive for a time but there is doubt about their future.

President.—At present you are making a profit, are you not?

Mr. Sen Gupta.—No. Practically it is a losing concern. We are barely paying our expenses. We are selling our matches at Rs. 1-6 and our cost of production is the same.

President.—In answer to question 59 you say that if the present duty is not maintained and an excise of As. 8 at least per gross be not imposed on the products of factories financed by foreign capital, it will be practically impossible for Indians to compete successfully in India. Do you mean by that it would be practically impossible for your factory to compete?

Mr. Sen Gupta.—Yes.

President.—You don't mean it would be a general proposition.

Mr. Sen Gupta.—I must not say that as a general proposition when I have come on behalf of a certain factory, but practically I believe it to be a general thing.

President.—You say a factory equipped on a larger scale than your factory would be able to produce at a lower cost and you say that at present although you are not making much profit you are covering your expenses. If these two propositions are correct, then it would follow, even if the *status quo* is maintained, the larger factories would be able to continue working at a point.

Mr. Sen Gupta.—It can be maintained according to to-day's market, but there is a possibility of another drop in the market. in that case what will be the result?

President.—There is a possibility of both ways.

Mr. Sen Gupta.—If we are to go by precedent there is every possibility that within a month there will be another drop and a big drop, I believe.

President.—There may or may not.

Mr. Sen Gupta.—Surely there will be, even in the present circumstances if the wood is available, then the big factories may anyhow drag on. I don't know what will be the condition of ours and other small factories. As I have already told you, practically our cost of production and selling price leave us no margin.

President.—May we take it then that your opinion is that unless these conditions are fulfilled, *viz.*, if the present duty is not maintained and if the excise duty of As. 8 is not put on firms financed by foreign capital, the smaller Indian factories will not be able to work their factories at a profit. Is that the correct statement of your opinion?

Mr. Sen Gupta.—Yes.

Cost of Machinery—Quality of the various makes.

President.—Although your production is considerably lower than that of Messrs. Dharamsey and Company, the cost of your machinery is rather higher. Your cost is Rs. 35,000 whereas theirs is Rs. 17,000.

Mr. Sen Gupta.—That may be. We are working with more machinery. There are some machinery still lying idle in our factory. Just now we can go up to 500 gross a day.

President.—They say they can go up to 650 gross. Is there any reason for the difference? Where did you get your machinery from?

Mr. Sen Gupta.—There is some difference in the inner pasting machine. The former price was Rs. 1,400 and the present price is Rs. 2,400.

President.—Where did you purchase your machinery from?

Mr. Sen Gupta.—Some from Japan, some from Germany and some from India.

Dr. Matthai.—I believe you have bought your machinery more from abroad than locally. You could have purchased more of your machinery from the Bhowani Engineering Company.

Mr. Sen Gupta.—Whichever we found suitable we purchased from Messrs. Bhowani Engineering Company and others from outside.

Dr. Matthai.—Take for example the splint selecting machine, that you could buy from the Bhowani Engineering Company. They make it, don't they?

Mr. Sen Gupta.—Yes, they do. So far as I am concerned I am not satisfied with that machine. For peeling we have purchased Bhowani's peeling and chopping machines. The difficulty with them is that they were made according to the standard of genwa wood.

Dr. Matthai.—The splint selecting machine, and labelling machine, have they not got them here?

Mr. Sen Gupta.—No.

Dr. Matthai.—Have they not got the frame filling machine?

Mr. Sen Gupta.—No, at least not to my knowledge. They are making frames but not frame filling machines.

Dr. Matthai.—Emptying machines they have.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—You think the Japanese machine is better.

Mr. Sen Gupta.—It is almost the same thing.

Dr. Matthai.—If you take one of these typical machines, *e.g.*, emptying machines, that you could buy locally and you could also get from Japan In point of quality the Japanese machine is better, is it?

Mr. Sen Gupta.—At present it is a bit better.

Dr. Matthai.—How do the prices compare?

Mr. Sen Gupta.—Indian machine is a bit cheaper.

Dr. Matthai.—What is the price of a Japanese emptying machine?

Mr. Sen Gupta.—Roughly Rs. 350.

Dr. Matthai.—At how much you could buy it here from Messrs. Bhowani Engineering Company?

Mr. Sen Gupta.—About Rs. 300.

Dr. Matthai.—It is only a difference of Rs. 50.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—There is not a big difference between Japanese machine and Bhowani's machine.

Mr. Sen Gupta.—No.

Dr. Matthai.—If you had Rollers' machines, would they have been very much more expensive?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—They would be much more expensive.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—What would be the cost of a German emptying machine?

Mr. Sen Gupta.—I think it is about Rs. 600. I can't give you the exact figure, but I know it is very much higher.

Dr. Matthai.—I suppose it would be less difficult to work.

Mr. Sen Gupta.—Regarding emptying machine it is in every case very easy to work.

Dr. Matthai.—Do you think that German machinery is simpler to work than Japanese machinery? I am speaking of the Rollers type of machinery.

Mr. Sen Gupta.—Not all machines. In the case of some machines they are simpler and in those of others they are very complex and we have found them difficult to work here.

Dr. Matthai.—Do you find it difficult to get Indian labour to work those machines satisfactorily?

Mr. Sen Gupta.—Not only Indian labour but the raw materials should be also taken into consideration.

Dr. Matthai.—What exactly is the point about raw materials?

Mr. Sen Gupta.—Take the case of wood cutting machinery.

Dr. Matthai.—I see what you mean.

Mr. Sen Gupta.—The wood must also be taken into consideration.

Dr. Matthai.—The kind of wood that you get here could not be worked on that. It is very difficult to work.

Mr. Sen Gupta.—Take again the case of the inner box making machines. All the Rollers' machines in the Esavi India Match Manufacturing Company, in N. M. Mehta's factory and in some other factories are lying idle. They are not working, whereas the machine made by the Swedish Company is working satisfactorily.

Dr. Matthai.—In what firms are they lying idle?

Mr. Sen Gupta.—In the Esavi India Match Manufacturing Company and N. M. Mehta's factory the machine is lying idle whereas in the Currimbhoy Match Factory they converted the machine according to the pattern of the Swedish machine and are using it.

Dr. Matthai.—In answer to question 65 you say: "During the middle of April, 1926, the price quoted by a Swedish firm for an inner pasting machine was about Rs. 1,400, whereas to-day's quotation for the same machine is about Rs. 2,400".

I take it that is partly because that kind of inner pasting machine of a satisfactory sort you can't get from anywhere else, but from Sweden and Sweden has practically a monopoly of the inner pasting machine.

Mr. Sen Gupta.—The first machine we purchased for Rs. 1,400.

Dr. Matthai.—That was a Swedish machine.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—How long ago was that?

Mr. Sen Gupta.—It was in February or March, 1926.

Dr. Matthai.—I suppose since then it has been found that the German inner pasting machine is entirely unsatisfactory and therefore it is possible for the Swedish machinery to command a better price, because there is no other machinery that could do the work.

Mr. Sen Gupta.—In my opinion it is to make it difficult for Indian owned factories to use their machines that they have increased the price to such an enormous extent.

Dr. Matthai.—Is there any other process in regard to which you find the German machinery decidedly inferior to the Swedish machinery?

Mr. Sen Gupta.—I cannot say that.

Dr. Matthai.—In regard to the other processes you can get on with the German machinery, but in regard to the inner pasting, you simply cannot.

Mr. Sen Gupta.—Excepting the inner pasting machine, I don't think that the German machinery is inferior to any. But the German outer box pasting machine is the best machine in the market. It is far superior to the Swedish machine but they do not charge any higher price for it.

Dr. Matthai.—If a person was starting a new match factory in India on a fairly big scale and wanted to order the best machinery, what would your suggestion be? Where could he get the most satisfactory kind of peeling machine? Would you recommend a locally made one?

Mr. Sen Gupta.—No, not for splints.

Dr. Matthai.—Comparing prices and quality, where would you buy it from?

Mr. Sen Gupta.—At present taking everything into consideration, price, quality, etc., the German machine is the best for peeling.

Dr. Matthai.—For chopping?

Mr. Sen Gupta.—Chopping and peeling of the same German make. There is one thing here which I would like to say. Those who select the wood cutting machinery from one manufacturer will also select the frame filling machinery from the same manufacturer.

Dr. Matthai.—What kind of machine would you buy locally which would be satisfactory from the point of quality?

Mr. Sen Gupta.—Veneer peeling and chopping machines and broken splint selecting machine.

Dr. Matthai.—They would be quite as good as any imported machine.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—What about the emptying machine?

Mr. Sen Gupta.—I don't think that Indian made ones have reached perfection yet.

Dr. Matthai.—What about their dipping machine?

Mr. Sen Gupta.—Practically it is not a machine; it is more a dipping plate. It is only in Germany that they do dipping by machine.

Dr. Matthai.—What about the splint selecting machine?

Mr. Sen Gupta.—I think that too has not reached perfection yet.

Dr. Matthai.—On the whole your opinion is that most of the machinery would have to be imported from abroad.

Mr. Sen Gupta.—Yes, so long as we cannot make them all here. At present we buy some machines locally made.

Dr. Matthai.—Only very few?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—The President was drawing your attention to your capital cost of machinery and the capital cost of Messrs. Dharamsey and Company. It seems to me that the difference is largely due to the fact that they have been able to buy locally.

Mr. Sen Gupta.—Most of theirs is second hand. They purchased a lot of machinery from the Super Mantosh Company second hand and so they got them for a reduced price; whereas ours are all new machines.

Capital Account.

President.—As regards your answer to question 62 (*a*), what does this Rs. 1,000 represent?

Mr. Sen Gupta.—It has been given to the landowner as a deposit money.

President.—Is it repayable?

Mr. Sen Gupta.—Yes.

President.—If that is so, it can hardly go into the capital account.

Mr. Sen Gupta.—It is a deposit money and nothing else.

President.—What does Rs. 10,000 represent?

Mr. Sen Gupta.—Factory shed, buildings, etc.

President.—That is what it cost you.

Mr. Sen Gupta.—Yes.

President.—What are the other miscellaneous assets?

Mr. Sen Gupta.—Generally all spare parts.

President.—Those do not come under the capital account.

Mr. Sen Gupta.—Spare parts, electric wiring, etc., we take these things as miscellaneous assets.

President.—How much of these are spare parts?

Mr. Sen Gupta.—There is a good quantity of them. We have imported almost every spare part.

President.—How much may we take as spare parts?

Mr. Sen Gupta.—About Rs. 3,000.

Hand made boxes—Cottage Industries.

President.—In answer to question 59 (*b*), you say "The hand pasted boxes are badly finished and are much inferior to those done by machines. Moreover, the hand process costs us more by Re. 0-1-6 per gross, but matches filled in these boxes fetch us 2 annas less than those boxed in machine pasted ones". On the whole you think that the match industry, that is to say the industry in which the boxes are made and filled by hand, is not satisfactory.

Mr. Sen Gupta.—No.

President.—You don't think that presents any considerable competition to your industry?

Mr. Sen Gupta.—No, if you mean cottage industries.

President.—Do you supply them with splints?

Mr. Sen Gupta.—Veneers and splints to some.

President.—Do you manufacture splints specially for them or do you sell your rejected splints?

Mr. Sen Gupta.—We don't manufacture specially for them. Generally we supply our rejected stuff and occasionally our surplus stuff.

President.—What do you get per maund?

Mr. Sen Gupta.—We get from Rs. 2 to Rs. 4 per maund for the rejected stuff.

President.—We were told that it would fetch as much as Rs. 12 per maund.

Mr. Sen Gupta.—We get Rs. 12 to Rs. 15 per maund for fresh stuff.

President.—Do you think that there is no future for the cottage industry in match making?

Mr. Sen Gupta.—Yes, unless the proposal made by our Association is adopted.

President.—It offers no serious competition to the match industry.

Mr. Sen Gupta.—I don't think so. But if it is saved from the competition of mass production, there is every chance of its development.

President.—You produce yourself on a mass production basis.

Mr. Sen Gupta.—I think that we are not making any mass production. We are only turning out 200 gross per day.

President.—It is a question of degree. You have only just started.

Mr. Sen Gupta.—My opinion is that those who are making 25 to 50 gross per day should be taken as cottage industries. Some of these small manufacturers have peeling and chopping machines, and they should not be taken as cottage industries, although their production may be low.

President.—Would you be prepared to impose an excise duty on factories turning out 50 gross a day?

Mr. Sen Gupta.—Certainly not. It should be at least 100 gross a day.

President.—If the minimum were fixed at 100 gross per day, would you support it?

Mr. Sen Gupta.—Yes, I would.

President.—Although it works against you?

Mr. Sen Gupta.—Let it work against me. The factories working with box pasting machinery are saving Re. 0-1-6 per gross as compared with the cottage industry.

President.—What do you mean by a cottage industry?

Mr. Sen Gupta.—Those who work without any motive power.

President.—Would you define a cottage industry as an industry which does not fall under the Factories Act?

Mr. Sen Gupta.—The Factories Act is a very complicated thing. I cannot say what are its direct limitations. In some cases even where people work by hand, the Factory Inspector comes and says that they must come under the Factories Act. I think that it mainly depends on the number of workers.

President.—Partly on the number of workers and partly on machinery. I observed the other day while inspecting the cottage industries that they were so arranged that they did not come under the Factories Act. For instance we saw in one place that dipping was done by 9 or 10 men, and in another place about 200 yards off, chopping was done, in which about five or six men were engaged and so on. If you combined these, they would have come under the Factories Act. Would it be a reasonable definition of the cottage industry to say that those industries which do not fall under the Factories Act are cottage industries?

Mr. Sen Gupta.—That is not it. As you have seen, there is one finishing factory employing about 10 or 15 men and about 100 yards off from

that place there is another small factory employing a few men where peeling is done by machine worked by power, under the same management. That is not a cottage industry. Those concerns which are working purely on a hand system must be taken as cottage industries.

Dr. Matthai.—According to your idea of a cottage factory, there is no power driven machinery and the output does not exceed 100 gross a day.

Mr. Sen Gupta.—Yes.

President.—When they utilise rejected splints, do you think that it is a system which should be encouraged?

Mr. Sen Gupta.—They get these splints at a very cheap rate; practically the price is almost *nil*.

President.—Do you think that they raise the reputation of Indian matches in the Indian market?

Mr. Sen Gupta.—No. They are sold at a cheap price and are used by poor people.

President.—Do you think that it is sound to put bad splints on the market?

Mr. Sen Gupta.—No.

President.—I should have thought that it would have injured the reputation of Indian made matches on the market if a number of boxes were put on the market with broken splints in them.

Dr. Matthai.—For example I go to the market and buy a packet of boxes made by small cottage factories and I find that the splints are exceedingly unsatisfactory. Well, I get that experience and I say to myself "it is really no use buying Indian made matches because they are all so bad". Therefore the existence of these cottage industries might affect you prejudicially, might it not?

Mr. Sen Gupta.—Surely they would.

Dr. Matthai.—Why do you want them to be supported?

Mr. Sen Gupta.—If they get protection, they will improve.

President.—Will they improve?

Mr. Sen Gupta.—They buy rejected splints because they can not compete if they buy splints at a higher price of Rs. 12 to Rs. 15 per maund.

President.—Supposing Government declared the present revenue duty of Rs. 1-8 a protective duty, in what way would it alter the habits of the cottage match manufacturers? They would still use the rejected splints.

Mr. Sen Gupta.—They might not do so if protection is granted, because they would be able to buy fresh splints.

President.—Why?

Mr. Sen Gupta.—Because they get protection.

President.—At present they are enjoying a revenue duty of Rs. 1-8 which has the same protective effect.

Mr. Sen Gupta.—Of course declaration is necessary, besides the mere declaration will not have any effect. They want effective protection in the shape of an excise imposed on mass production in the way our association has proposed; that will save the cottage industries.

President.—How?

Mr. Sen Gupta.—They will be able to buy better materials to improve their quality.

President.—Why should they buy?

Mr. Sen Gupta.—Supposing they are at present buying rejected splints because they cannot afford to pay more, in that case they will buy fresh splints and make better materials.

President.—Why should they? What is the object in doing so?

Mr. Sen Gupta.—They are buying rejected splints because they cannot now afford to pay more. They will in that case have a higher price and will be able to pay more liberally for their raw materials.

President.—Will they be able to afford more?

Mr. Sen Gupta.—If they are given protection, they will be able to do so.

President.—If they buy good splints they will get better price for their matches but they prefer to use rejected splints. If you give them protection, why should they buy better splints? Surely they will continue to use rejected splints and obtain a higher price.

Mr. Sen Gupta.—I don't think so. They did not use rejected splints when the price was high. The demand would greatly decrease if they did that when the price went up again. Nobody wants to see the demand for his goods diminishing and his business ruined.

President.—All the factories are in existence. They produce these matches and sell them and the demand continues.

Mr. Sen Gupta.—A large number of cottage industries have been closed and there is at present a very little demand for matches made of rejected stuff and the price they fetch is very low.

President.—Why don't they buy better splints?

Mr. Sen Gupta.—They cannot afford to buy.

President.—But they get a better price for their matches if they buy better splints?

Mr. Sen Gupta.—Even if they buy better splints they cannot get a better price now because of the appearance of the hand pasted box. They can't improve the appearance of the box. Besides competition is very keen now-a-days and the products of cottage industries are issued by dealers.

Dr. Matthai.—Do you get these matches made at the cottage factories in the Calcutta market?

Mr. Sen Gupta.—Yes, but generally they are sold in the mufassil.

Dr. Matthai.—If I go to a place like the Municipal market shall I find these matches?

Mr. Sen Gupta.—You may.

Dr. Matthai.—How exactly do you arrange your sales?

Mr. Sen Gupta.—We have agents to sell our matches. We do it on a commission basis.

President.—This is the definition of a factory (read). Would not that be a convenient definition of a cottage industry?

President.—Under this definition the factories can be inspected by Factory Inspectors whereas under a cut and dried definition which fixes the limit at 100 gross a day, it will be very difficult to check.

Dr. Matthai.—You suggest that the limit might be fixed at 100 gross a day; that means roughly 50 people and that would agree with the definition given in the Factories Act, does it not?

Mr. Sen Gupta.—Yes.

President.—You think the cottage industry should be encouraged?

Mr. Sen Gupta.—Yes.

President.—And whatever excise duty is imposed on other factories should not be imposed on cottage industries.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—In that case the encouragement of cottage industry would in no way help the consumers of matches in India but would help people to find occupation. For the future of the Match industry it is not of importance to have a cottage industry.

Mr. Sen Gupta.—For the future of the Match industry I don't think the cottage industry will be of any great value but it has to be seen and it is worth giving a trial. It will at any rate give employment to a large number of people and that to some extent would solve the unemployment problem in the country—which is no small gain.

Dr. Matthai.—That can be done without putting a big burden on the consumer?

Mr. Sen Gupta.—The consumer will not be taxed because the retail price of matches sold at Rs. 1-14-0 per gross, is one pice and the price of those sold at Rs. 1-2-0 a gross is also one pice, so that the consumer does not suffer.

Dr. Matthai.—Your suggestion means encouraging the cottage industry by putting on an excise duty of how much?

Mr. Sen Gupta.—On mass production say, 4 annas per gross.

Dr. Matthai.—At present you have got an import duty of Rs. 1-8-0; that you say is not of any particular assistance to the cottage industry and, therefore, you suggest an excise duty?

Mr. Sen Gupta.—Yes, on mass production.

Dr. Matthai.—That is all factories which do not come under the Factories Act?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—That you think would keep the cottage industry sufficiently alive?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—On what basis have you worked out this 4 annas?

Mr. Sen Gupta.—1 anna 6 pies on box pasting; frame-filling and emptying, box labelling, etc., two annas and six pies.

President.—May I put it this way. At present I understand your cost is somewhere about Rs. 1-6-0. Supposing you are a cottage industry then you think your cost would be about Rs. 1-10-0. Is that your idea? When you want to put an excise duty of 4 annas upon these large size power driven factories, your assumption is that in a cottage factory the costs would be higher than in your factory by the amount of that excise duty?

Mr. Sen Gupta.—My idea is that the cost will be higher by 4 annas.

President.—On the other hand it might be cheaper.

Mr. Sen Gupta.—I don't think so.

President.—They have got these rejected splints; they have no overhead charges. They might be able to work at a lower cost.

Mr. Sen Gupta.—Overhead charge is counterbalanced by mass production.

President.—You are rather opposed to mass production?

Mr. Sen Gupta.—Not at all. I think that the development of match industry under the cottage system only is practically an impossibility, but still I support cottage industries for they give employment to a large number of people, without making them leave their hearth and home for employment and enable locally produced raw materials, to be used without constituting any burden on the consumer.

President.—That is to say the future of the Match Industry lies in mass production but for other reasons you support cottage industry.

Mr. Sen Gupta.—Yes, but I cannot say that the cottage system of manufacture has absolutely no future.

Dr. Matthai.—On the lines of hand loom weaving?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—That is no kind of match that you can make only in a cottage factory but in the case of the hand loom industry there are certain kinds of cloth which can only be woven on a loom.

Mr. Sen Gupta.—That is true. It is for purposes of an illustration that I think the case of the hand loom industry is an appropriate one.

Dr. Matthai.—You are putting an extra burden of 4 annas on the consumer.

Mr. Sen Gupta.—Not on the consumer as I have mentioned more than once but on the middleman. The consumer remains unaffected.

President.—There is another aspect of the case. You consider that about 4 annas excise on Indian made matches would be justified, but perhaps there

might be administrative difficulty in calculating or checking the outturn of these cottage factories and collecting the excise duty. Therfore it might be perhaps not worth Government's while to impose an excise duty on cottage industries while it might be quite a sound proposition to impose it on industries which work on the system of mass production. Does that commend itself to you?

Mr. Sen Gupta.—Yes, provided it is done as per second proposal, submitted by our Association.

President.—It has been suggested, for instance, that no box of matches should be sold unless there is a Government stamp that is a label, round it and that the stamps should be purchased beforehand by match factories and pasted on the boxes before they are sold. In the case of cottage factories would this be a sound proposition; would you be able to check that each box turned out by each factories carried a Government label?

Mr. Sen Gupta.—I don't think so.

President.—On the other hand do you think it would be possible to get a monthly return from these factories as to the number of boxes they turned out?

Mr. Sen Gupta.—If there is some legislation of that kind they must send monthly statements.

President.—But it is rather difficult to check, is it not; I mean they do not keep cost accounts?

Mr. Sen Gupta.—They keep all sorts of accounts.

President.—You think there will be no difficulty about it?

Mr. Sen Gupta.—That is my impression.

Working Capital.

President.—You say in answer to Question 81 that your working capital is Rs. 25,000. What does that represent?

Mr. Sen Gupta.—It is larger at present, Rs. 45,000. That represent wood and other raw materials and labour expenses.

President.—Could you give us your working capital under the following items:—Stocks and Stores and Outstanding account.

Mr. Sen Gupta.—Stocks of raw materials—Rs. 20,000, Stores—Rs. 10,000 and Outstanding debts Rs. 15,000. Total Rs. 45,000.

President.—So your working capital is Rs. 45,000?

Mr. Sen Gupta.—Yes.

President.—What do you mean by your answer to Question 84 "About Rs. 75,000"? The question was "Compare the working capital with the cost of one month's output".

Mr. Sen Gupta.—I think the figure is wrong.

Dr. Matthai.—You say in answer to Question 86 that your stock of raw materials is about Rs. 35,000 and you said just now that it was Rs. 20,000.

Mr. Sen Gupta.—That is correct because a certain amount of raw materials have been converted into finished product.

Head Office and Selling expenses.

President.—Then Head Office expenses. You say the annual amount of head office expenses is Rs. 1,200. What does that represent?

Mr. Sen Gupta.—Rent and pay of 2 clerks.

President.—What about agents' commission?

Mr. Sen Gupta.—About 1 anna 6 pies to 2 annas per gross.

President.—In answer to Question 90 you say "About 2 pies". What does that represent.

Mr. Sen Gupta.—That is all taken together. I am afraid I don't exactly remember on what basis that was put at the time we submitted our representation.

President.—When you deliver matches to your agent, does he pay you in advance?

Mr. Sen Gupta.—Not always.

President.—How many days does he take to pay?

Mr. Sen Gupta.—Generally 60 to 90 days.

President.—Mr. Dharamsey told us that his agent pays him immediately on delivery.

Mr. Sen Gupta.—That may be his special advantage.

President.—You pay him a commission of 1½ to 2 annas per gross? Is not that very heavy?

Mr. Sen Gupta.—Yes, but we cannot help it.

President.—You sell your matches at Re. 1-8-0.

Mr. Sen Gupta.—It is Re. 1-7-0 to Re. 1-8-0.

President.—That is what you receive. Have you got to allow any commission on that?

Mr. Sen Gupta.—On that commission has to be allowed.

President.—That is to say you get Re. 1-6-0 nett.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—That is for full size.

Mr. Sen Gupta.—Yes.

President.—What is the custom in the trade? How many month's credit do you allow to your agents?

Mr. Sen Gupta.—There is no fixed system in the trade. They generally try to get every advantage from the manufacturers. Previously the selling was done on cash system, but the Western India Match Company began to sell their matches—second class stuff—at 90 days sight or more than that. These agents are taking advantage of that and say: "When we are getting matches from the Western India Match Company at 90 days sight, why should we pay cash."

President.—We were told by the Western India Match Company that they made all their transactions on a cash basis.

Mr. Sen Gupta.—That may be, but generally in the market we find those who are real customers of matches have got 90 days sight or 60 days sight.

President.—From the Western India Match Company.

Mr. Sen Gupta.—Not from the Western India Match Company, but from Messrs. Forbes, Forbes Campbell and Company, Limited. Our agents are demanding a similar advantage from us.

President.—Mr. Dharamsey told us yesterday that his bania pays cash down and gets one anna per gross as commission. If the present price is Rs. 1-8-0, Mr. Dharamsey is getting cash Rs. 1-7-0 on the spot.

Mr. Sen Gupta.—May be. So far as I know nobody else gets cash. There are good many other factories who do not get cash. Messrs. Dharamsey and Company are the most fortunate manufacturers in Calcutta, I should imagine.

President.—Don't you think it would be profitable to emulate Messrs. Dharamsey and Company and to adopt the same procedure?

Dr. Matthai.—Sometimes you pay on your working capital 24 per cent., is that so?

Mr. Sen Gupta.—Yes.

Dr. Matthai.—How can you ever do business by getting your finance at 24 per cent.?

Mr. Sen Gupta.—The alternative is to close.

Dr. Matthai.—You have to borrow all your working capital.

Mr. Sen Gupta.—That is very seldom.

Industry's claim to protection.

President.—In your claim to protection you say first of all the industry possesses natural advantages, an abundant supply of raw materials, cheap power, sufficient supply of labour and a large home market. In the course of your evidence you have stated that so far as wood is concerned, your supply is rather scanty. That is correct.

Mr. Sen Gupta.—Yes. There is ample wood, but the supply is scanty on account of the disadvantages which can be got over if Government intervenes.

President.—However much wood there may be, it is not of any advantage to the industry unless it is made available in large quantities and at suitable prices.

Mr. Sen Gupta.—That is true.

President.—In answer to Question 94 (*c*) you say "Yes". That is the industry will eventually be able to face world competition without protection. Now the present revenue duty of Rs. 1-8-0 on matches comes to about 120 per cent. If that is to be withdrawn, the Swedish Match Company which sell at present at about Rs. 2-10-0 to Rs. 2-12-0 may be able to sell at Rs. 1-4-0 and that may not be their lowest price. Do you think it would ever be possible to manufacture matches in India comparable in quality to the Swedish matches and sell at not more than Re. 1-4-0 per gross.

Mr. Sen Gupta.—There are in the Re. 1-4-0 agents commission, wholesaler's commission, etc.

President.—Out of this Rs. 2-12-0 received for their matches, the Swedish Match Company pay Re. 1-8-0 as duty and that leaves Re. 1-4-0 which includes agents commission, landing charges, their freight out here and so on. Do you think it will ever be possible to sell matches including agents commission and so on comparable in quality with the imported matches at Re. 1-4-0 out here?

Mr. Sen Gupta.—If protection is given at least for 15 years, then we think we shall be able to meet world competition.

President.—You will be able to put your matches on the market at Re. 1-4-0 after allowing for overhead charges and so on.

Mr. Sen Gupta.—Yes, I am sure of it.

President.—Where do you think you will be able to make economies. At present your works cost is Re. 1-6-0. To that you must add your overhead charges which will perhaps come to As. 2.

Mr. Sen Gupta.—In that case we shall have to increase our output to diminish our overhead charges. We are trying to get some facilities and if we got those facilities it would decrease our cost. At the same time if we can import our chemicals on a co-operative basis, it would reduce our cost still further.

President.—These are the immediate reductions which you can make out at once.

Mr. Sen Gupta.—Yes.

President.—That would be say one anna on overhead charges and on chemicals As. 1-6. That would reduce it from Re. 1-8-0 to Re. 1-5-6 per gross.

Mr. Sen Gupta.—Yes, but our present cost is Re. 1-6-0. Without overhead charges.

President.—You would still want to get it down by about another As. 2. Where are you going to get that from?

Mr. Sen Gupta.—We hope to get wood at the same price as Messrs. Adamjee Hajee Dawood and Company are buying. We must try to get wood at that price and thus save our cost.

President.—Your charge for wood is As. 6 and Adamjee's is As 5.

Mr. Sen Gupta.—It may be.

President.—It was As. 7-8 and it is now As. 5-3.

Mr. Sen Gupta.—I shall give you a specific instance. Take for example this kind of wood (Bakota). 10 maunds of this is sufficient for 8 cases.

Dr. Matthai.—What do you mean by a case?

Mr. Sen Gupta.—50 gross make one case. That is on the splints. If this wood is available in sufficient quantities, then the price of splints will in no way exceed As. 2 per gross and the cost of veneers will be about 4 pice. The cost of wood will be only As. 3.

President.—That is a very big supposition that it would be available in such quantities and that you would be able to produce your splints at As. 2 per gross. All the evidence in Burma was that the quantities of wood available although possibly sufficient for the Rangoon factories are not sufficiently large to make it probable, that there would be any serious reduction in price.

Mr. Sen Gupta.—I don't know how the cost of their wood is so much when they are buying at half the price we pay. Papita wood generally comes to As. 4 to As. 4-6 per gross for splints, whereas their cost should not exceed As. 3 per gross according to my calculation.

President.—You have not yet got down to that figure.

Mr. Sen Gupta.—Because we now pay more for wood. We expect some reduction in wood when we shall be able to effect some savings.

President.—You mean you hope to. We all hope that you will be able to compete without any duty on matches in the world's market in course of time, but what the grounds are for supposing it I should like to know.

Mr. Sen Gupta.—Another thing is that the box filling is done by hand.

Dr. Matthai.—You do it now by hand.

Mr. Sen Gupta.—Yes.

Dr. Matthai.—You expect to reduce it by doing it by machinery.

Mr. Sen Gupta.—Yes. We are seriously thinking the matter over. We must do something to reduce the cost. There are other labour saving appliances such as packing machine, side painting machine, power saw, barking machine, etc., which, if introduced, would reduce the cost.

President.—They are all now used by the bigger manufacturers.

Mr. Sen Gupta.—Yes, by most such factories.

President.—The chief difficulty here is wood. The wood is not so circular and the outturn of splints and veneers is not so big as is the case with aspen wood in Sweden. So the industry does suffer from a definite drawback so far as that wood is concerned and the question is whether you will be able to counterbalance that either by the cheapness of the wood or in any other way. Up to the present no wood has been found satisfactory.

Mr. Sen Gupta.—Not like that of the imported wood.

President.—Even if it came to the same output the wood out of which you are making splints is not really so satisfactory.

Mr. Sen Gupta.—That is so.

President.—So that it remains to be discovered in the future whether there is any wood in India from which you can manufacture matches and put them on the market at the same price as the imported matches.

Mr. Sen Gupta.—That is so.

Foreign Capital—Anti-trust Legislation.

President.—You say an excise at the rate of As. 8 per gross should be imposed on the products of factories financed by foreign capital. You have also proposed an excise in the course of the examination.

Mr. Sen Gupta.—Yes.

President.—Your proposal is first of all that the revenue duty of Rs. 1-8-0 should be declared a protective duty. Secondly that an excise duty of As. 4 should be put on all matches produced in Indian factories and thirdly that an

additional As. 8 per gross should be put on matches produced in factories in India financed by foreign capital.

Mr. Sen Gupta.—Yes.

President.—How do you propose to decide whether a factory is financed by foreign capital and what is not?

Mr. Sen Gupta.—I mean factories financed and controlled by foreigners.

President.—For instance supposing the Swedish trust to which you are referring appoint Indian Directors.

Mr. Sen Gupta.—Our point is the capital must be raised in India from Indians.

President.—How do you mean in India by Indians? Do you mean to say that the share capital must be held by Indians?

Mr. Sen Gupta.—Yes.

President.—What about the Assam Match Company?

Mr. Sen Gupta.—For all practical purposes it may be termed a foreign Company though there is a small fraction of Indian capital in it.

Dr. Matthai.—Because most of the money in it is foreign money.

Mr. Sen Gupta.—Yes.

President.—Let us suppose that the Western India Match Company were to appoint Indian Directors and all their firms were floated on a rupee basis in India and all their shares were taken up by Indians and they continued their present policy.

Mr. Sen Gupta.—Then I can't say what will follow. If all the shares are taken by Indians the profit will go to Indians and it will not go abroad.

Dr. Matthai.—Supposing for example I arrange with some Swedish financier to hold his share capital in the Western India Match Company in my name, how are you going to stop a case of that kind? Could you say it is not Indian capital?

Mr. Sen Gupta.—I cannot say it is not.

President.—It means some sort of lengthy and protracted enquiry each year which might not give any definite results because the shareholders might be changing. It was suggested by somebody—I have forgotten whether it was you or one of the other applicants—that 'financed by foreign capital' might be defined as there being more than 25 per cent. of foreign capital in the concern. Even in the course of one year, in one month there might be 25 per cent., foreign capital and in another month owing to some transfer of shares there might be 26 per cent.

Mr. Sen Gupta.—I am afraid I cannot suggest a better definition.

President.—I know that it is an extremely difficult matter from the administrative point of view. Have you read the report of the External Capital Committee which is really pertinent to this enquiry?

Mr. Sen Gupta—No.

President.—Then another point of view is this. I am not quite clear whether what is aimed at by this proposal is to prevent some sort of monopoly being established by the Swedish trust?

Mr. Sen Gupta.—That is our main aim.

President.—The monopoly might be established by an Indian trust just as much as by a foreign trust. It seems to me that there is some slight confusion. I am not clear whether what is aimed at is not some anti-trust legislation, that is to say, some method to prevent the monopoly of a trust falling into the hands of one large concern whether Indian or foreign or whether it is a general principle that all Industrial concerns in India should be managed and financed by Indians. Those are two distinct propositions which I think are merged in this proposal. So far as the monopoly is concerned, it may be effected by an Indian corporation just as well as by a foreign corporation. Is it some sort of anti-trust legislation that you are aiming at?

Mr. Sen Gupta.—Not only anti-trust legislation but also the prevention of monopoly.

President.—Is it not the same thing?

Mr. Sen Gupta.—Yes.

President.—That is to say what you want to do is to prevent anything occurring in the Match industry such for instance as is sometimes alleged to have occurred in the oil business. It is sometimes alleged that there are some understandings between the oil companies in India which give them a partial monopoly. Is that what you want to prevent in the Match industry? Supposing for instance all the match companies joined together and joined with the Swedish trust, all forming a ring throughout the whole of India, while retaining their individual position as companies and continuing to be financed by Indian capital, you would be against that.

Mr. Sen Gupta.—Yes.

President.—How would you meet that? Would not that have exactly the same effect?

Mr. Sen Gupta.—Yes.

President.—If all big mass production companies joined together, would not the cottage industries come forward and say that something should be done against that?

Mr. Sen Gupta.—I don't think that all factories would ever join together.

President.—I am putting it merely on a hypothetical basis for the purpose of elucidating your position which is not clear to me. What I want to know is whether you want anti-trust legislation or whether you want a general penalisation of the use of foreign capital.

Mr. Sen Gupta.—I want both.

President.—How would you suggest that it should be done? As regards this external capital question, that has been fully considered by a Committee of the Government of India. In the first Steel Protection Act three conditions for the grant of bounties were embodied, *viz.*:—that a percentage of Directors should be Indians; that the capital should be rupee capital and that Indians should be trained.

Dr. Matthai.—Of course, you admit that as far as we are concerned the kind of thing against which action should be taken is not so much foreign capital as the influence of monopolies.

Mr. Sen Gupta.—Perhaps.

Dr. Matthai.—There are various companies which are financed by foreign capial in India which are working on a perfectly fair and legitimate basis, and it is not necessary at all from your point of view to differentiate against them.

Mr. Sen Gupta.—We can perhaps afford to overlook them.

Dr. Matthai.—You only want action to be taken against those foreign interests that are likely to compete with you unfairly.

Mr. Sen Gupta.—We want to safeguard in such a way that there may be healthy competition in the country.

President.—It is not a question of internal competition. It raises a large question, does it not? It is a question which extends considerably beyond the Match industry. It is a general question on which it would be difficult to arrive at conclusions on the basis of a single industry.

Mr. Sen Gupta.—It is a difficult question no doubt.

Unfair Competition.

Dr. Matthai.—In what way have they used their monopolistic influence in the Calcutta market? Can you give us any evidence of unfair competition?

Mr. Sen Gupta.—We cannot say anything regarding unfair competition.

Dr. Matthai.—Then?

Mr. Sen Gupta.—We can only say that they are working here with certain advantages which we do not possess. We cannot say anything definite about unfair competition against them. We may say that there is unfair competition. Formerly matches were sold on a cash system but now they are sold on a credit system and the change is due to the Swedish people.

Dr. Matthai.—You don't say that it is unfair, do you?

Mr. Sen Gupta.—We don't say that it unfair. We only say that we have also to follow suit as they have introduced this system. Formerly, there was no credit system.

Dr. Matthai.—If they are doing business on a large scale, they are able to effect certain economies. That does not make them a monopoly.

Mr. Sen Gupta.—Quite so.

Dr. Matthai.—Have they ever tried to sell in the Calcutta market at less than economic prices deliberately in order to drive you out of the market? That is one of the characteristic methods of a monopoly. Has that ever been attempted within your experience?

Mr. Sen Gupta.—They may not be doing that but they are selling at a price which fails to cover expenses in the cases of many an Indian factory.

President.—Your case is really not that they have actually attempted any cut throat competition for the suppression of Indian concerns but that you have fear that they may. Having regard to what had happened in other parts of the world, you want that precautions should be taken.

Mr. Sen Gupta.—As they are working on certain advantages, they can produce their matches at a much less cost. That is all I told you.

President.—That would also apply to Messrs. Adamjee Hajee Dawood's factory.

Mr. Sen Gupta.—No, it does not.

Dr. Matthai.—It would apply to Esavi's who produce about 5,000 gross a day.

Mr. Sen Gupta.—They have not attempted to reduce their selling price on their own initiative.

Dr. Matthai.—The economies resulting from large scale production are not necessarily the results of monopoly.

Mr. Sen Gupta.—The competition in the Calcutta market is controlled by the Western India Match Company.

President.—Messrs. Adamjee Dawood are also exporting their matches to Calcutta.

Mr. Sen Gupta.—May be. They are not carrying any weight on the market. We know that Messrs. Adamjee Hajee Dawood and Company are sending their matches to Calcutta. The Swedish people have factories in different places whereas Messrs. Adamjee Hajee Dawood and Company have got only one factory in Rangoon. Further, the capital of the Western India Match Company is 50 times larger than that of Adamjee's.

President.—The Western India Match Company have four or five factories.

Mr. Sen Gupta.—They have got them in different important commercial centres of India controlling market everywhere; a number of Indian match concerns has already been closed unable to stand the competition while many others are on the brink of the precipice.

THE ESAVI INDIA MATCH MANUFACTURING COMPANY.

B.—ORAL.

Evidence of Mr. E. S. ABDUL KADIR and Mr. A. FAIZULLABHOY recorded at Calcutta, on Monday, the 6th February 1928.

Introductory.

President.—Mr. Abdul Kadir, are you the proprietor of the Esavi India Match Manufacturing Company?

Mr. Kadir.—I am a partner.

President.—Is Mr. Faizullabhoy also one of the partners?

Mr. Kadir.—Yes.

Warning regarding speculation.

President.—Before proceeding with the enquiry to-day I would like to say a word or two about certain information which has been reaching us through different quarters. We have been told recently that whilst this enquiry is proceeding, there is a considerable amount of speculation going on amongst manufacturers and perhaps among importers too, as to what our proposals are going to be. We are told that some of them are carrying very large stocks of matches which they would ordinarily place on the market, in the belief that if our proposals include either an increase in the import duty or the levy of an excise duty, they will be able to make very large profits. The Tariff Board is not really concerned with what may happen to the manufacturers if they base their business on such speculation but I should like to warn them that we are still taking evidence and therefore it is not likely that we could have reached a stage at which we are able to formulate any definite proposals. That is one thing; secondly, our proposals in any case have to go to the Government of India and then action has to be taken through the Legislative Assembly. At present it is impossible to say what line Government or the Assembly may adopt. There is a belief, however, that we may recommend the levy of an excise duty but I think that if you yourself reflect on what an excise duty means you will understand that an excise duty is ordinarily levied for revenue purposes, and that it is levied only if the Government is satisfied that further revenue is required from this source. That will depend upon the necessity of the Government at the time when the Government considers the levy of an excise duty. It may be that Government may find that it does not require any money. In that case, no duty may be levied, or Government may find that the duty, if levied, ought to be very small, or on the other hand very high. As I say, it must entirely depend upon the view that the Government takes as regards its own revenue requirements. In such a case I think that the industry is running a great risk because no one can tell now what the position of Government may be at the particular moment; nor can any one say, even if the Government decides to levy a duty, at what time it may be levied. I think that the manufacturers must clearly understand what is involved in basing their calculations on what we might propose or what the Government might do, when all the circumstances are so indefinite and some of them cannot even be foreseen.

Mr. Kadir.—The first thing is that the manufacturers are taking a chance and the other thing is to find out who has begun it.

President.—Is it a fact that they are taking a chance?

Mr. Kadir.—Of course they are; but then as far as I know, all the Indian match manufacturers are selling quite all right except the Swedish people. They have raised their price since 1½ months. They have put their prices up from 8 annas to 12 annas and there is practically no sale. They are carrying very big stocks; they have begun it.

President.—It is immaterial to us who began it. We are not concerned with that. That is entirely a question between yourselves.

Mr. Kadir.—It is necessary to consider that point because if they hold stocks of say 10,000 or 15,000 cases, the result will be very bad. That is why I say they have begun it. Supposing an excise duty is levied on the 1st of March or whenever it is, and supposing they hold big stocks of say 10,000 or 15,000 cases; on the stocks they hold there won't be any excise duty, they can sell those cases at a cheaper price, so that the Indian manufacturers who will have no stocks will have to close down their factories. Suppose an excise duty of 12 annas was levied, the Swedish people could sell at 8 or 6 annas below the Indian manufacturers.

President.—This warning is intended for all, not merely for you.

Mr. Kadir.—I am only telling you what the result will be.

President.—Their position may be this. It may be that the Indian manufacturers are carrying large stocks in the expectation that if an excise duty is levied they will make large profits and therefore there are not sufficient matches in the market and it is only natural in that case for the Swedish people to put up their prices and take advantage of the present conditions of the market. That is what they might be doing.

Mr. Kadir.—As far as I know, they are making very little sales.

President.—We have done our duty. We have just pointed out to you the risk that the industry is running by carrying on this speculation.

Mr. Kadir.—It is not only this year particularly but every year when the 1st of March is nearing there is always a sort of speculation whether there will be a duty on timber, or on phosphorus or any other article.

Dr. Matthai.—There is far more of it this year.

Mr. Kadir.—This year the Swedish Match Company has begun it and I don't think that any Indian company is holding any very large stocks.

President.—What is the impression amongst the manufacturers just now? Do they think that an excise duty is going to be levied or what?

Mr. Kadir.—As there is a talk going on that Government requires revenue, they naturally think that an excise duty may come on.

President.—Who says that Government requires revenue?

Mr. Kadir.—It has been mentioned, has it not?

President.—I don't think Government has said that.

Mr. Kadir.—As far as I remember, you have to consider the Government revenue also.

President.—True, if Government wants the revenue, but nobody has said that Government does or does not want revenue. I think you are under a misapprehension as regards that. If Government wants the revenue, is an excise duty a suitable form of taxation? that is the point. That is what we are considering. We cannot say whether Government wants revenue or not.

Mr. Kadir.—The Tariff Board came in just when the revenue was falling.

President.—Quite true; that might have been the case then. How can you say what is the position of Government or what it would be when the Government comes to consider the question of protecting this industry?

Mr. Kadir.—The present position is this. The Swedish Match Company began to put up their rates and hold stocks. After a fortnight or so, the Indian manufacturers began to wonder why.

Dr. Matthai.—When did the Swedish Company start speculating?

Mr. Kadir.—A month and a half ago.

Dr. Matthai.—For about three weeks after they started there was no attempt on the part of the Indian manufacturers to hold stocks?

Mr. Kadir.—I think there is none even now.

Dr. Matthai.—There is none even now?

Mr. Kadir.—No.

Dr. Matthai.—But you think I suppose that if the other company goes on speculating, there might be a danger of the Indian companies also doing the same?

Mr. Kadir.—Not speculation exactly! They are thinking of holding stocks on the presumption that in case an excise duty was levied and they had not stocks their position would be serious. Supposing there was an excise duty of 12 annas the Swedish Match Company by reason of having large stocks could easily sell at 6 annas less than their Indian competitors. That would be the position.

Dr. Matthai.—You are speaking of Calcutta primarily, aren't you?

Mr. Kadir.—Yes.

Mr. Mathias.—Your complaint is that the Swedish Match Company have put up their prices?

Mr. Kadir.—Yes.

Mr. Mathias.—If they were to reduce their prices would you not complain that they were undercutting you?

Mr. Kadir.—That was one of the complaints before but not during the last one and half months.

Mr. Mathias.—So whichever way they go they seem to be doing the wrong thing!

Mr. Kadir.—Specially when it has been mentioned that speculation is going on I must mention what is taking place in the market.

President.—You did not answer my question: What do the manufacturer think just now as regards this? Have they got any ideas?

Mr. Kadir.—There is one idea I am sure and that is that there may be excise coming on.

President.—Does it not strike you as rather curious that you are committing the Board to a view before the Board is really in a position to form any views because we are still taking evidence?

Mr. Kadir.—During the month of February every year this speculation is always going on; the same thing has happened this year.

President.—It has nothing much to do with our enquiry?

Mr. Kadir.—I don't think so.

President.—You say that your firm was established in October 1923?

Mr. Kadir.—Yes.

President.—Before that time were you interested in importing matches?

Mr. Kadir.—Yes.

President.—From where?

Mr. Kadir.—From Japan. We used to buy from Sweden before the war but during the war we got all Japanese matches.

President.—For how many years had you been carrying on this import business?

Mr. Kadir.—Not the Esavi Match Company.

President.—Before you started this firm were you carrying on import business?

Mr. Kadir.—Speaking for myself we are in the match business for the last 50 years.

President.—You originally imported from Sweden and during the war entirely from Japan.

Mr. Kadir.—Yes.

President.—Were you doing business on a large scale?

Mr. Kadir.—Yes.

Early history of the Company.

President.—When you started this factory in October 1923 were you importing ready made splints and boxes?

Mr. Kadir.—Yes.

President.—When did you start actual manufacture?

Mr. Kadir.—As soon as the duty on splints and boxes was levied.

President.—That was about March 1924?

Mr. Kadir.—We started about June 1924 because at that time we had to wire for the machinery, so we actually started in June.

President.—Did you find dipping a profitable proposition before the duty was increased?

Mr. Kadir.—Yes. Everybody starts under the notion that he would make a profit.

President.—Did you find it profitable?

Mr. Kadir.—Yes.

President.—Was there a very big margin?

Mr. Kadir.—Not a very big margin, because the expenses were also high.

President.—Not in dipping surely?

Mr. Kadir.—Even for dipping we had to set up machinery and to cover the expenses we had no time.

President.—How many Japanese partners have you got?

Mr. Kadir.—Only one.

President.—He has got 30 per cent. interest, has he?

Mr. Kadir.—Yes.

President.—Has he been in the business since the beginning?

Mr. Kadir.—Yes.

President.—Has he got manufacturing experience?

Mr. Kadir.—Yes.

President.—What is his name?

Mr. Kadir.—Mr. Harima. He has been doing match business for the last 50 years.

President.—Was he manufacturing matches in Japan?

Mr. Kadir.—Yes.

President.—Have you been to Japan yourself?

Mr. Kadir.—Yes.

President.—Did you study the conditions of Japanese manufacture?

Mr. Kadir.—No.

President.—You did not go round the Japanese factories?

Mr. Kadir.—I did go, but I did not study it specially.

President.—In the Japanese factories what is the usual practice? Do they manufacture splints and veneers separately?

Mr. Kadir.—I don't know what they do at the present time. Formerly I think they bought splints and veneers. There were different factories for splints and veneers and different factories for the rest.

President.—The factories were on a large scale, were they not? Splints were manufactured on a large scale?

Mr. Kadir.—Yes.

President.—Veneers were manufactured by another factory?

Mr. Kadir.—Veneers and splints were manufactured in one factory.

Dr. Matthai.—And the subsequent processes in another factory?

Mr. Kadir.—Yes.

President.—Were all these processes in the other factory carried on on the premises or was the work given out?

Mr. Kadir.—Everything was done on the premises.

***Mr. Mathias.*—Is your factory laid out on the Japanese model?**

Mr. Kadir.—Yes.

Dr. Matthai.—When were you last in Japan?

Mr. Kadir.—In 1919.

President.—At that time was this the way in which they were manufacturing?

Mr. Kadir.—Yes.

President.—They don't have any continuous machines like the simplex in Japan, have they?

Mr. Kadir.—I don't think so. I have not seen the latest Toyo Match Company's factory. I saw their factories in 1907.

President.—That is a long time ago?

Mr. Kadir.—Yes. Of course I was again in Japan in 1919 but I did not go round the factories.

President.—Anyhow you are carrying on manufacture here according to your Japanese partner's advice?

Mr. Kadir.—Yes.

President.—You think that your manufacture is carried on in more or less the same way as in Japan?

Mr. Kadir.—Of course there is a difference. In Japan I don't think they were using these box making machines which we are doing here. They were doing it by hand.

President.—Some of your machines are Japanese?

Mr. Kadir.—The box making machinery is all German and Swedish.

Dr. Matthai.—There is no Japanese machine for box making, is there?

Mr. Kadir.—No.

President.—You give the total nominal capacity of your works as 4,000 gross?

Mr. Kadir.—That is not the capacity; what we said was that we produced 4,000 gross.

President.—According to these figures you do not produce that quantity, if you take 864,000 gross for 1926.

Mr. Kadir.—In the beginning we did not have so many machines; we have increased the number every year.

President.—What was your actual production in 1927?

Mr. Kadir.—1,275,000 gross boxes, that is an average of 4,250 gross a day. Sometimes we work 8 hours, sometimes 9 hours and 10 hours according to the amount of sales.

President.—Have you bought any more machinery since 1926?

Mr. Kadir.—We have already mentioned that we have 50 frame filling machines; there is one more now, making 51 in all.

President.—You are working longer hours, is that what it means?

Mr. Kadir.—No. As the labour gets more experience we get more out of the same machines per man. We have done the highest with the same number of machines, namely 5,500 gross in 10 hours.

President.—It may be that in the frame filling department when a man gets more experience, he may do more work, but take box making for instance. There a machine can only do a certain quantity in an hour. You cannot increase the quantity merely by more experience because the machine would refuse to turn out more work, isn't that so? Take the outer box making machine, for instance, doing 90 revolutions a minute; it can be run only at 90 revolutions a minute.

Mr. Kadir.—We ran at the beginning at less number of revolutions because if we ran it at a very high speed when the labour was not perfectly trained there would be a large amount of wastage. But since the labour has got more experience we have increased the number of revolutions.

President.—To that extent will your output increase, so it has got nothing to do with the labour.

Mr. Kadir.—With better practice the labour will be able to put in more work. With less experienced men there is a lot of wastage, so we cannot run the machines at higher revolutions.

President.—At how many revolutions did you run it before?

Mr. Kadir.—I will get the figure for you.

President.—Do you know the number of revolutions the outer box making machines are doing now?

Mr. Kadir.—I can't give you the exact figure.

President.—The point is, have you got the highest number of revolutions that the machines can do?

Mr. Kadir.—Our capacity is still more, but we have to close down this department for two hours because otherwise we would do more boxes than we can do the dipping. At the time we wrote to you we had 35 box wrapping machines; we have now 41 and there are 4 on the way.

Dr. Matthai.—That would make 45 altogether?

Mr. Kadir.—Yes.

President.—Without making many alterations in your factory, would you consider that as your maximum output?

Mr. Kadir.—Yes, 5,500 gross.

President.—What is your maximum output?

Mr. Kadir.—5,500 gross a day.

President.—You have not given it anywhere?

Mr. Kadir.—I am afraid I have not.

Dr. Matthai.—That is taking into account all the expected machines?

Mr. Kadir.—No, that is the present figure.

Dr. Matthai.—How much will you have when you get all these machines?

Mr. Kadir.—About 6,000 gross.

Value of the prejudice.

President.—When talking of the prejudice you say "we consider 12 to 14 annas as the value of the prejudice". How do you calculate that?

Mr. Kadir.—They are still buying Swedish matches at Rs. 2-13-0 to Rs. 2-14-0 against Indian matches at Re. 1-9-6 to Re. 1-10-0. When we originally represented to you it was a little more.

President.—That is the way in which you arrived at the value of the prejudice?

Mr. Kadir.—Yes.

Mr. Mathias.—That means that to retain your present market imported matches must sell at something like a rupee more per gross?

Mr. Kadir.—Yes.

Mr. Mathias.—Any further reduction in the price of imported matches means that your market will disappear to some extent?

Mr. Kadir.—Yes, it will.

President.—That difference is due to the fact that they have to sell their matches at a higher rate, that is to say owing to the smallest coin being one pice the next higher price will probably be 1½ pice?

Mr. Kadir.—You mean retail?

Mr. Mathias.—Yes. It is owing to that that this difference is maintained, they cannot sell at lower than one pice.

Mr. Kadir.—They can sell two for 3 pice or something like that. It is not that they must maintain this difference.

President.—You say 1½ pice; that means a difference of ½ pice per box or Re. 1-2-0 a gross.

Mr. Kadir.—They can sell 3 for 4 pice or something like that; they need not hold on to one pice. That is not necessary.

President.—Anyhow a pie would be the smallest difference; it cannot be less than that.

Dr. Matthai.—What is the retail price now that the actual consumer in the bazar pays?

Mr. Kadir.—One pice.

Dr. Matthai.—And for the imported?

Mr. Kadir.—1½ pice.

President.—That is a difference of half a pice?

Mr. Kadir.—Yes.

Dr. Matthai.—Supposing in the bazar I bought a dozen of your boxes and a dozen of the imported boxes?

Mr. Kadir.—3 annas 3 pies for the Swedish and 2 annas 3 pies to 2 annas 6 pies for ours.

President.—There also the difference is about the same.

Mr. Kadir.—Yes.

President.—Is it your opinion that if this difference was reduced, you would lose your market?

Mr. Kadir.—I should think so.

President.—And people would buy more Swedish matches because they would prefer to have them if they had to pay the same price for those matches as yours?

Mr. Kadir.—The Swedish matches having been in the field for years and having a wide reputation, whilst the Indian matches having had no reputation at all before these factories were started, they would certainly have an advantage over us. But if there were no Swedish matches and once people get used to our matches they will think this is the best thing they are having. It is the same in every commodity, once it has made a reputation it sells better.

President.—These prices that you have given us, are these for splints made out of aspen and boxes made out of Indian wood?

Mr. Kadir.—Yes, aspen splints and boxes made of genwa.

President.—Do you make any matches entirely out of Indian wood?

Mr. Kadir.—Yes.

President.—What is the difference between the price of matches made out of Indian wood and those out of aspen and genwa?

Mr. Kadir.—We get Re. 1-7-0 to Re. 1-7-6 for the former.

Mr. Mathias.—These Indian wood matches sell in the bazar for one pice a box in the same way as your aspen wood matches, do they not?

Mr. Kadir.—I think so.

President.—The retail price is the same?

Mr. Kadir.—Yes.

Mr. Mathias.—So far as the consumer is concerned he is prepared to have your Indian wood match at the same price as your aspen wood match?

Mr. Kadir.—There are different markets for these. In some markets where people prefer the aspen wood matches, these do not go. These are sold in different markets.

Mr. Mathias.—Is it correct to say that in the up-country markets people are not so particular and take Indian wood matches whereas in Calcutta they don't have them?

Mr. Kadir.—In Calcutta they like Swedish matches more.

Dr. Matthai.—You would sell your matches made entirely of Indian wood to the dealer at Re. 1-7-0 to Re. 1-7-6 but it will be sold by the dealer in the market for one pice a box and therefore the advantage of that goes entirely to the dealer?

Mr. Kadir.—Yes.

Dr. Matthai.—It would be to the interest of the dealer therefore to push the sale of the Indian wood matches, would it not?

Mr. Kadir.—Yes. But then in some places they don't like these because of the wastage in the splints.

Dr. Matthai.—As far as the dealer is concerned he gets it from you at Re. 1-7-6 and is able to sell at Rs. 2-4-0?

Mr. Kadir.—He can make a little more, but he cannot go beyond a certain extent which he can sell.

Dr. Matthai.—What proportion of your total output last year was half size?

Mr. Kadir.—About 1,700 gross half size and 2,500 gross full size.

Mr. Mathias.—Out of your total production how many are of Indian wood entirely?

Mr. Kadir.—At present we are making about 1,500 gross of Indian wood matches.

Dr. Matthai.—At what price are your half size matches sold?

Mr. Kadir.—The wholesale price is about Re. 1-2-6 to Re. 1-3-0 per gross.

President.—That is aspen splint and boxes made of genwa?

Mr. Kadir.—Yes.

Dr. Matthai.—The retail price of your half size matches would also be one pice each?

Mr. Kadir.—It does not sell in the Calcutta market but in the districts.

Dr. Matthai.—Would there be a difference in the retail price?

Mr. Kadir.—I think so; I think it would be four for 3 pice. In Darjeeling I saw they were selling 3 for 2 pice.

President.—That cannot be, because it would mean Re. 1-8-0 per gross. If you sell it at Re. 1-2-6 to Re. 1-3-0 he cannot sell it retail at Re. 1-8-0 in Darjeeling. It must be more than that.

Mr. Kadir.—I am sorry; that was Assam match.

President.—My colleague was asking you about your half size matches.

Mr. Kadir.—I will send for my salesman and let you have the figures.

Dr. Matthai.—Some years ago there was very little market for half size matches in Bengal?

Mr. Kadir.—It has been there all along since the war.

Dr. Matthai.—Is the market for half size increasing?

Mr. Kadir.—In the beginning we used to send half size matches from Calcutta to as far as Cawnpore and other places in the United Provinces, but now I think they are taking from Bombay.

President.—Is there any reason why people should use full size in preference to half size matches?

Mr. Kadir.—In the full size they have got more splints, about 80 to 90, and in the half size only 60 to 70.

President.—Why does the manufacturer want to sell these if he gets more or less the same price for the half size as for the full size?

Mr. Kadir.—It costs a little less to manufacture half size matches.

President.—Is it not better for the manufacturer to make more of the half size than the full size because he can make more money out of the former?

Mr. Kadir.—In Bengal they want the full size.

Mr. Mathias.—What is the reason?

Mr. Kadir.—They have been used to the full size all along.

President.—The half size is a more recent introduction in the market, is it not?

Mr. Kadir.—No; since the war. I think it is about 13 years now.

President.—Who introduced it?

Mr. Kadir.—We had ¾ size from Sweden before and I think the half size was introduced by Japan to compete with the ¾ size.

Dr. Matthai.—We were told in Bombay that since the half size was introduced in Bombay the demand has greatly increased.

Mr. Kadir.—That may be true as regards Bombay but not in Bengal.

Dr. Matthai.—You don't have much half size in Bengal?

Mr. Kadir.—No.

President.—Except so far as Burma and part of Bengal and also part of Madras are concerned, the rest of India use either ½ size or ¾ size, is it not?

Mr. Kadir.—I think in Madras it is full size mostly.

President.—The Bombay side produces quite a large quantity of half size matches.

Mr. Kadir.—On the Bombay side it is nearly all half size.

President.—Bombay's consumption may be perhaps 5 to 8 million gross.

Mr. Kadir.—Yes.

President.—Then there is Assam where they use the half size. You also make a certain percentage of half size.

Mr. Kadir.—Yes.

President.—In the United Provinces only ¾ size is used.

Mr. Kadir.—That is so.

President.—In the Punjab and in Guzerat also the ¾ size prevails.

Mr. Kadir.—Yes.

President.—So that if you take the whole production you will probably find that half size and three-fourth size are produced in larger quantities than the full size. It shows that the full size is gradually disappearing.

Dr. Matthai.—I may say in Madras where they have these small factories, most of them are producing three-fourth size, which seems to me to suggest that the market might take the three-fourth size in preference to full size even in Madras.

Mr. Kadir.—They may. But as far as our experience goes in Bengal they have stuck to the full size.

Wood Supply.

President.—Do you get your aspen from Japan?

Mr. Kadir.—Yes.

President.—At Rs. 120 a ton?

Mr. Kadir.—It is less now.

President.—What is the present price?

Mr. Kadir.—Rs. 115.

Mr. Mathias.—After paying the duty?

Mr. Kadir.—Yes, at our factory.

President.—Genwa is the principal wood that you use?

Mr. Kadir.—Yes.

President.—You have not given the price of genwa at all in your answers. What is the price?

Mr. Kadir.—At that time we were not making matches out of genwa.

President.—How much do you pay per ton or per piece?

Mr. Kadir.—The price of genwa varies. It drops sometimes as low as 8 annas per piece and goes up to as much as Re. 1-2-0.

Mr. Mathias.—According to the season I suppose?

Mr. Kadir.—Not according to the season. We have heard from the *manjis* that sometimes the forest officer does not allow their boats near the trees. Now they say the forest officer wants them to clear everything so they are taking more time to bring the timber to Calcutta than they used to do before. The price has now gone up to 14 annas.

Mr. Mathias.—Could you give us the average price?

Mr. Kadir.—12 annas will be the average.

President.—One piece is equal to about 1 cubic foot, is it?

Mr. Kadir.—Yes.

President.—How much does it work out to per ton?

Mr. Kadir.—About Rs. 37-8-0.

Mr. Mathias.—Could we take the price of genwa as Rs. 40 per ton?

Mr. Kadir.—Yes, that would be safe.

Mr. Mathias.—That is the price for all match factories.

President.—Since when have you been using genwa?

Mr. Kadir.—First of all we began making sticks with Indian wood from the Andamans; that was papita.

Mr. Mathias.—When did you start that?

Mr. Kadir.—About six months ago.

President.—You started using papita six months ago?

Mr. Kadir.—Yes.

Mr. Mathias.—What price did you pay for papita?

Mr. Kadir.—Rs. 60 per ton.

Mr. Mathias.—At the factory?

Mr. Kadir.—No, in the canal.

President.—How did you find papita?

Mr. Kadir.—I think papita—we used simul after that—and simul come to almost the same thing.

President.—How did you find it as a wood?

Mr. Kadir.—I think genwa is better than papita.

Dr. Matthai.—In what respect is it better? Is it whiter?

Mr. Kadir.—Not always whiter.

Dr. Matthai.—What about papita?

Mr. Kadir.—In papita sometimes you have even more wastage than what you have in good genwa wood. If you choose the genwa carefully for sticks then you will find the wastage to be less in genwa. As regards papita you don't get one kind of wood; it is all mixed up. In some the wastage is more and in some it is less.

Dr. Matthai.—In appearance how do they compare?

Mr. Kadir.—Taking everything into consideration papita is better.

Dr. Matthai.—In strength?

Mr. Kadir.—**It is just the same as genwa.**

Mr. Mathias.—Are you talking of splints?

Mr. Kadir.—Yes.

Mr. Mathias.—And for boxes?

Mr. Kadir.—We use genwa.

Mr. Mathias.—Do you find papita as good as genwa?

Mr. Kadir.—I don't think papita will make good boxes.

President.—Have you been using genwa all the time for boxes?

Mr. Kadir.—Yes.

Mr. Mathias.—Have you had any negotiations with Messrs. Martin and Company about the supply of wood from the Andamans?

Mr. Kadir.—I only bought once.

Mr. Mathias.—The price of Rs. 60 per ton seems to be rather a high figure

Mr. Kadir.—They told me "If you buy your annual requirements the price would be Rs. 55 per ton delivered at the steamer". I had no correspondence but I had been there myself.

President.—I want to understand how much wood you use for 100 gross of matches. You have given 35 c. ft. Is that all aspen or genwa?

Mr. Kadir.—Sticks of aspen.

Wood wastage.

President.—How many cubic feet of aspen do you want for splints?

Mr. Kadir.—12 c. ft. of aspen for splints only, and for boxes we require 23 c. ft. That is genwa wood, and of course it varies according to the quality of the wood.

President.—Is this your average?

Mr. Kadir.—This is the highest. 21 c. ft. will be the average for genwa.

Dr. Matthai.—Are you speaking of both half size and full size?

Mr. Kadir.—This is for full size.

President.—Are these the actual figures of production or how do you arrive at these figures?

Mr. Kadir.—I have not gone through the whole production yet. That is just six months, but I think this will be a safe average.

Mr. Mathias.—That would be roughly 2½ gross per cubic foot if you use all Indian wood.

Mr. Kadir.—21 c. ft. for boxes.

President.—What would be the quantity for genwa splints?

Mr. Kadir.—30 c. ft.

Dr. Matthai.—Are you quite sure of that figure?

Mr. Kadir.—We have been using genwa for the last three months and the average comes to that.

President.—As regards the half size how much aspen do you require for splints?

Mr. Kadir.—7 c. ft.

President.—How much Indian wood for boxes?

Mr. Kadir.—19 c. ft.

President.—Is that the average?

Mr. Kadir.—That is the highest; the average will come to 17 c. ft.

Dr. Matthai.—You say 19 is the highest; what would be the lowest figure?

Mr. Kadir.—Between 13 and 14.

Dr. Matthai.—It varies from 13 to 19 c. ft.?

Mr. Kadir.—Yes.

President.—Have you made boxes out of aspen?

Mr. Kadir.—Yes.

President.—What would be the consumption of aspen for the full size?

Mr. Kadir.—10 c. ft.

President.—And for the half size?

Mr. Kadir.—7 c. ft.

President.—How much Indian wood for the half size match?

Mr. Kadir.—Between 13 and 19 c. ft. for boxes.

President.—For splints how much would you require?

Mr. Kadir.—Between 16 and 19 c. ft.

President.—These figures that you give do not seem to agree with the figures that you have given us in your costs. Let us take your latest costs. You give 8 annas for splints and veneers. Is that for the full size?

Mr. Kadir.—Yes.

President.—How do you work that out? You say you use 12 c. ft. of aspen for splints. That comes to Rs. 27-6.

Mr. Kadir.—Yes.

President.—And you require 21 c. ft. of genwa for boxes at, say Rs. 40 a ton. It comes to 7 annas but you have given 8 annas?

Mr. Kadir.—I gave the cost as it was at that time. The genwa we are getting now is very bad.

President.—That was your cost even in the previous year. I really cannot understand this at all because we have got the Swedish Match Company's costs and their wood in 1926 cost only 5 annas 8 pies, and they make only full size. They have been using the same wood as you do and they have been buying in larger quantities than you.

Mr. Kadir.—They might be getting aspen at a lower cost.

President.—Their cost of aspen is Rs. 115 per ton.

Mr. Mathias.—They are charging the market rate.

Mr. Kadir.—I don't know how their cost is less.

Dr. Matthai.—The price of aspen has come down since you made out these costs, has it not?

Mr. Kadir.—It has.

Dr. Matthai.—We have been calculating at Rs. 115. At the time you made out these costs, was the price Rs. 115?

Mr. Kadir.—It was Rs. 120.

Dr. Matthai.—That would not make very much difference. I suppose Rs. 120 was the price at the factory?

Mr. Kadir.—Yes.

President.—I am just drawing your attention to the fact that their cost for 1926 was much less. Of course, their consumption of Indian wood was only about 17·5 c. ft. on an average. That may account for the difference to some extent.

Mr. Kadir.—May be.

President.—And your higher priced aspen may also account for it.

Dr. Matthai.—About the supply of genwa, you buy it from the boatmen.

Mr. Kadir.—Yes.

Dr. Matthai.—These boatmen are employed by middlemen, are they? or how exactly does the system work?

Mr. Kadir.—They have their own boats, but they sell through their agents here.

Dr. Matthai.—The boatmen sell through their agents.

Mr. Kadir.—Yes.

Dr. Matthai.—You buy it from their agents.

Mr. Kadir.—Yes.

Mr. Mathias.—There is a middleman, isn't there?

Mr. Kadir.—Yes. I think that he advanced them money to a certain extent.

Mr. Mathias.—Do you find the supply of genwa difficult to obtain in the hot weather?

Mr. Kadir.—In the first year when we commenced working, there was a scarcity of wood in the hot weather, but last year we did not have any difficulty.

Mr. Mathias.—Did it arrive in a fresh condition?

Mr. Kadir.—Yes. It depends upon the size; sometimes they bring small size and sometimes big size.

Mr. Mathias.—I am speaking of the condition of wood in the hot weather.

Mr. Kadir.—It is a little bit dry in the hot weather.

Dr. Matthai.—Is there any other use for genwa?

Mr. Kadir.—Yes, it is used for packing cases.

Dr. Matthai.—Is there a big demand for it?

Mr. Kadir.—All the local packing cases are made of genwa.

Mr. Mathias.—Have you any idea of the price of genwa wood for packing cases?

Mr. Kadir.—The price is the same and for Jhuri the price is Rs. 40 to Rs. 42 per 100 maunds.

Dr. Matthai.—You don't anticipate any difficulty about getting sufficient supply of genwa in the near future?

Mr. Kadir.—I don't think we will have any difficulty.

President.—As regards prices, what is the price of the Wimco matches at the present moment in Calcutta?

Mr. Kadir.—Rs. 1-12-0 per gross, but if anybody buys 100 cases, he receives a discount of 1½ annas.

President.—Per gross?

Mr. Kadir.—Yes.

President.—This is for full size, is it not?

Mr. Kadir.—Yes.

President.—What is your price?

Mr. Kadir.—From Rs. 1-9-6 to Rs. 1-10-0.

President.—Then, you cannot complain that they are underselling you. If their price is two annas higher than yours, what reason have you to complain?

Mr. Kadir.—They have raised their price only about 1½ months ago.

Mr. Mathias.—What was it before?

Mr. Kadir.—It was Rs. 1-8-0 till the end of November 1927.

Mr. Mathias.—And they have put it up by 4 annas.

Mr. Kadir.—Yes; they increased it in the first instance by 2 annas and then again by two annas.

Mr. Mathias.—What was your price for November?

Mr. Kadir.—We had kept the same rate.

Mr. Mathias.—What was the rate?

Mr. Kadir.—Rs. 1-9-6 to Rs. 1-10.

Mr. Mathias.—You have not increased your rate at all.

Mr. Kadir.—No.

President.—This is rather contrary to the general evidence we have received. The trend of the evidence is to the effect that their prices are generally higher than those of other Indian matches by 1½ to 2 annas.

Mr. Kadir.—No.

President.—I am telling you that is the general evidence, as regards Bombay at any rate.

Mr. Kadir.—Even when the price was Rs. 1-8-0, they used to give a discount of 1½ annas.

President.—It would make it still less.

Mr. Kadir.—Yes. Their Monkey Brand they sold at Rs. 1-7-0. They gave a special rate for the Calcutta market.

Dr. Matthai.—That is not on the market now.

Mr. Kadir.—No.

Mr. Mathias.—You sell outside Calcutta, I suppose.

Mr. Kadir.—We sell everything in Calcutta, and our agents sell outside Calcutta.

Mr. Mathias.—You are now speaking of the prices at the factory.

Mr. Kadir.—We sell everything to Mr. C. A. Muhammad. This is Mr. Muhammad's selling price.

President.—Is he your sole commission agent?

Mr. Kadir.—We don't sell on a commission basis.

President.—Do you sell on the consignment basis?

Mr. Kadir.—We sell on the value of the market, not like this that they keep stocks and get discount on sales. We fix a price for a week and then sell all our production to Mr. C. A. Muhammad.

Mr. Mathias.—What is your nett price to Mr. C. A. Muhammad?

Mr. Kadir.—We also give 1½ annas discount.

Mr. Mathias.—That comes to Rs. 1-8-0.

Mr. Kadir.—That is at the factory.

Mr. Mathias.—What was the Wimco price at the factory before November?

Mr. Kadir.—This is their selling price from the Western India Match Company's godown.

Mr. Mathias.—Do you mean their selling agents' godown?

Mr. Kadir.—They allow their selling agents a discount of 1½ annas.

Mr. Mathias.—They sell at a gross price which includes the selling commission.

Mr. Kadir.—Not including! We do not know exactly what they give to their agent but this much we know that whoever buys 100 cases gets 1½ annas discount per gross.

Mr. Mathias.—Their price before November was Rs. 1-8-0.

Mr. Kadir.—Yes.

Mr. Mathias.—Your price before November was also Rs. 1-8-0.

Mr. Kadir.—Our factory price was Rs. 1-8-0.

Mr. Mathias.—Your price before November was the same as now.

Mr. Kadir.—Yes.

President.—Supposing your price is higher than theirs would you not find it difficult to sell your matches in competition against their matches?

Mr. Kadir.—The thing is this. Some of our brands are well-known now, being for a long time on the market. So, we are able to sell all our production.

President.—Can you tell me how much of your matches are sold in the bazar here and how much in the districts?

Mr. Kadir.—Very little is sold for Calcutta consumption. It is all sold for the districts.

President.—Will you please tell me how much is sold in the Calcutta market or how much is sold outside?

Mr. Kadir.—For the local market we sell about 5 cases a day.

President.—5 cases of 100 gross each or what?

Mr. Kadir.—5 cases of 50 gross each; that is full size.

President.—You manufacture about 80 cases a day.

Mr. Kadir.—Yes, on an average.

President.—You sell about 6 per cent. in the Calcutta Market?

Mr. Kadir.—Yes, and the rest is sold in Bengal.

President.—Have you got any understanding with the Western India Match Company people about these markets?

Mr. Kadir.—No.

President.—You have no working arrangement with them.

Mr. Kadir.—No.

President.—Do you sell in direct competition with them? You have not divided the markets between yourselves, have you?

Mr. Kadir.—No, we havn't.

President.—Do you sell your matches in the same markets as they do?

Mr. Kadir.—Yes.

Mr. Mathias.—They have no interest in your company of any kind.

Mr. Kadir.—None, though they approached us to take up our company.

Mr. Mathias.—Did you come to any sort of arrangement with them?

Mr. Kadir.—They approached my partner Mr. Harima through the trust in Japan to sell this factory to them, and he wired to us down here. I saw Mr. Schele at that time. He asked me " will you sell the company?"

President.—When was this?

Mr. Kadir.—About two years ago.

Mr. Mathias.—Did you part with any share of your company to them?

Mr. Kadir.—No, I did not want to sell; so, I told him " I will sell for Rs. 30 lakhs ". I knew that they would not buy at that price and I did not like to part with my industry.

President.—They did not wish to pay Rs. 30 lakhs.

Mr. Kadir.—No.

Mr. Mathias.—They took no share in your company.

Mr. Kadir.—No.

President.—Can you tell me what is the nett average price get on all your production? You must be selling at one price in one place and at another price in some other place.

Mr. Kadir.—There is not much difference.

President.—You sell all your production at the factory and your agent sells in the districts.

Mr. Kadir.—Mr. C. A. Muhammad makes all his sales in Calcutta.

President.—In one place you may be selling at some price and in another place you may be selling at a higher price.

Mr. Kadir.—The highest difference is only about half an anna.

President.—What I want to know is this. Supposing you manufacture 1 million gross a year, what do you get nett in your office for that 1 million gross?

Mr. Kadir.—I will have to get that information for you.

President.—It is rather important to find out what is the average price that you get. You must have different prices for different localities.

Mr. Kadir.—Not much difference—only half an anna at the most.

President.—Yes, but that may work out to a substantial sum.

Mr. Kadir.—I think that if you put 2 pies on it, it would be a safe calculation; that is Rs. 1-9-6 *plus* 2 pies. The bulk of our sales will be at Rs. 1-9-6; say, about two-thirds will be at this price and the balance, *viz.*, one-third will be sold at Rs. 1-10-0.

President.—There is not very much difference in that case.

Mr. Kadir.—No.

Dr. Matthai.—Could you tell me the retail price of your half size? At what price is a single box sold?

Mr. Kadir.—At 1 pice per box.

Dr. Matthai.—When it is sold in dozens?

Mr. Kadir.—On an average the matches are sold at Re. 0-2-6 per dozen.

President.—You say that the smallest unit of production should be 1,500 gross per day. How do you make that out? We have been told that it is rather a small unit.

Mr. Kadir.—I wrote that because when we started, we started with 25 cases.

President.—You might have started like that, but would it pay a man if he were to start business on that basis?

Mr. Kadir.—No, it would not pay.

President.—Would it not pay better if you were to have a larger unit?

Mr. Kadir.—Yes. The bigger the unit, the less is the cost.

President.—Up to what point the price will go down? If you increase the output, say, from 5,000 to 10,000 gross a day.....

Mr. Kadir.—If we make 10,000 gross a day, our cost would be much less because the overhead charge is the same.

President.—We have been told by the Swedish Match Company that you should not have a unit of less than 5,000 gross a day or more than 10,000 for economic production. Do you agree with that?

Mr. Kadir.—As far as I know their overhead charge must be very heavy.

President.—What is your experience? Your own unit is 5,000 gross a day. You made it so because you found it economic.

Mr. Kadir.—If we go on increasing our output, it will be more economic. A factory producing 10,000 gross a day is indeed very big.

President.—They say that 10,000 gross is the largest single unit and if you have a unit producing under 5,000 gross a day the costs will be high.

Mr. Kadir.—Anything that goes below makes the cost higher.

President.—Anything below 5,000 makes the cost higher.

Mr. Kadir.—If I make 6,000 gross a day, my cost will be less than what it will be if I make only 5,000 gross.

President.—If you were to erect a factory and compete, would you make it 1,500 gross or would you make it 5,000 gross?

Mr. Kadir.—If we can we will make it 5,000 gross. There is no question about that because the higher the production the less is the cost.

Dr. Matthai.—Their point is apparently if you increase it beyond 10,000 or 12,000 gross you would have to increase the standing charges.

Mr. Kadir.—I have no experience of a factory producing 10,000 gross a day.

President.—As regards your machinery, one frame filling machine is good for how many gross per day?

Mr. Kadir.—We have got 51 frame filling machines, and the highest we have made is 5,500 gross. It makes a little difference between half size and full size. Half size gives more work than full size.

President.—How do you mean?

Mr. Kadir.—You can make more half size than full size.

President.—On the same frame filling machine?

Mr. Kadir.—Yes.

President.—Supposing you are making half size, how much would you get from one frame filling machine? Is the thickness of the splint the same, whether it is half size or full size?

Mr. Kadir.—Yes.

President.—Why should you get more if it is half size?

Mr. Kadir.—The longer sticks take a little more time to go into those tubes.

President.—There are no tubes in the frame filling machines.

Mr. Kadir.—Yes, they are all tubes.

President.—What difference would it make?

Mr. Kadir.—We have got 13 half size filling machines which make about 40 cases of 50 gross each and we have got 38 full size filling machines which make about 70 cases of 50 gross each.

President.—For half size you want less machines. You get about three cases a day on each machine.

Mr. Kadir.—Yes.

President.—What about emptying?

Mr. Kadir.—Emptying is the same.

President.—You have fewer emptying machines.

Mr. Kadir.—Because it does not take a longer time. Fifteen frame emptying machines are more than sufficient. There is no difference between half and full size.

President.—How many men do you have on each frame filling machine?

Mr. Kadir.—One man on each for working.

President.—Does he work all the time?

Mr. Kadir.—He gets an interval. For bringing and taking the racks we have got another man.

President.—How many racks do you want?

Mr. Kadir.—300 racks.

President.—How many men do you have on them?

Mr. Kadir.—About 10 men. If he is an experienced man, one will be sufficient; but if he is new, one man won't be able to manage and then we will have to put in two.

President.—Do you mean on the frame filling machine?

Mr. Kadir.—Yes. If he gets experience, then singly he will be able to manage it.

President.—Then you have paraffining.

Mr. Kadir.—Yes, there are two machines for that and we have 20 men.

President.—For dipping, how many men do you require?

Mr. Kadir.—15.

President.—How many dipping machines have you got?

Mr. Kadir.—Eight dipping machines.

President.—As regards drying, how do you dry your matches? Have you driers?

Mr. Kadir.—We have drying rooms.

President.—How many men do you have to employ on drying?

Mr. Kadir.—About 10 men.

President.—How many splint levelling machines do you have?

Mr. Kadir.—Six machines.

President.—How many men have you got?

Mr. Kadir.—Seventy men.

President.—Why so many men?

Mr. Kadir.—Because they have to arrange the trays.

President.—You dry them in the drying room.

Mr. Kadir.—Yes.

President.—You have to take them out again.

Mr. Kadir.—Yes.

President.—How many men have you got there?

Mr. Kadir.—About the same number of men; about 10 men.

President.—You say you have 70 men on the splint levelling machines. That seems to me to be a large number. Are you sure that you have 70 men?

Mr. Kadir.—Yes; that is because we have to take the splints to the splint levelling department; then we have special men for working the machines and we have also special men to take them out and give them to the women. There is such a lot of women to fill in those trays that the number employed in this department is really as high as 70.

President.—Is the splint levelling machine a Japanese machine?

Mr. Kadir.—Yes.

President.—Does it require more labour than the Swedish machine because it does seem a large number?

Mr. Kadir.—The work is given out on piece rate. All the women who are employed in this work are paid according to the amount of work done by them. Some women are satisfied with a small amount and as soon as they do that amount of work, they go away.

President.—How many box making machines have you?

Mr. Kadir.—Thirty-five.

President.—How many inner and how many outer?

Mr. Kadir.—15 outer and 20 inner.

Dr. Matthai.—When you make it 45, how many inner and how many outer will there be?

Mr. Kadir.—20 outer and 25 inner.

President.—Are you getting ten more machines?

Mr. Kadir.—Yes. Six are already there and four more will come.

President.—You have on the whole 41 now.

Mr. Kadir.—Yes, 18 outer and 23 inner.

President.—How many outer and inner machines are you going to get?

Mr. Kadir.—Two each.

President.—That will give you a production of 6,000 gross a day.

Mr. Kadir.—Yes.

President.—How many boys do you employ on say one outer machine?

Mr. Kadir.—1 man and 1 boy.

President.—Why do you have two?

Mr. Kadir.—One is for the machine and the other for selecting genwa and for pasting the paper properly whenever necessary. So, the other man does these two things at the same time.

President.—It seems that your labour is not as well trained as, for instance, in Bareilly where they have one man on each machine.

Mr. Kadir.—If we have only one, then the wastage is more, and we find it more economical to have two.

Mr. Mathias.—Why is that?

Mr. Kadir.—Sometimes genwa is very rough.

Mr. Mathias.—Why can't you have it picked before taking it to the machine?

Mr. Kadir.—That is not possible.

Mr. Mathias.—Why?

Mr. Kadir.—He does two things, *viz.*, sorting the genwa as well as sticking the paper on some of the boxes which are not properly pasted when they come out of the machine.

Mr. Mathias.—In other factories they don't find it necessary to do that. Pasting is done automatically.

Mr. Kadir.—From our experience we find that we should have two. Of course we are trying to make as much economies as we can, but in this case it is not possible.

President.—It does seem that you have far too many men on these machines. In your factory, except splint cutting, peeling and frame filling, everything else is done by hand.

Mr. Kadir.—Filling is done by hand.

President.—Labelling is done by a machine, is it not?

Mr. Kadir.—Yes, we have 20 labelling machines.

President.—But box filling is done entirely by hand.

Mr. Kadir.—Yes.

President.—Dipping is also done entirely by hand.

Mr. Kadir.—Yes.

President.—So also is side painting done by hand.

Mr. Kadir.—Yes, but we have ordered side painting machines.

President.—But so far?

Mr. Kadir.—It is done by hand.

President.—Box wrapping is done by hand in your case, is it not?

Mr. Kadir.—Only a little.

President.—Have you got wrapping machines?

Mr. Kadir.—We have no packeting machines. That work is done by hand.

President.—Do you intend to get machinery for box filling?

Mr. Kadir.—No, because they say that it would not suit genwa wood.

President.—For aspen splints, it is all right, is it not?

Mr. Kadir.—Yes. I think that Mr. Mehta imported one and I understand that it is a failure.

President.—We have seen these machines at work in other factories and they don't seem to give very much trouble.

Mr. Mathias.—Even for Indian wood?

President.—And they are said to be more economical.

Mr. Kadir.—Yes; if it works all right, it should be economical because all work done by machinery is economical.

President.—As regards your costs, I think you have given your costs as Rs. 1-8-0 per gross. There is a reduction of two annas since last year.

Mr. Kadir.—Yes.

President.—The Western India Match Company's costs are Rs. 1-3-11.

Mr. Kadir.—For aspen wood?

President.—Aspen wood for splints and Indian wood for boxes. Supposing we are to make a proposal to protect this industry, we cannot make two proposals, can we, one for you and one for them. If your costs are not brought down at least to their level we cannot say that you should get five annas more protection than they, can we?

Mr. Kadir.—They are in this industry for years.

President.—It is not a question of competition against any foreign manufacturer?

Mr. Kadir.—They have experience of this industry for nearly 80 years and we have just begun here.

President.—They are competing against their own products made in Europe by producing matches in this country and you are doing the same. If we were to fix a measure of protection, it must be the difference between the Indian price and the foreign price generally speaking. If we were to do that and if we were to accept their figures, then protection would be 5 annas less than if we accepted your figures. But can we accept your

figures unless you are able to show that your costs will come down to Rs. 1-3-11?

Mr. Kadir.—I do not know about Rs. 1-3-11 but I know this that when we increase our output, we will be able to bring our costs down.

President.—What reduction do you hope to make in your costs? Their costs may be even lower than this now.

Mr. Kadir.—May be higher also?

President.—May be higher, but it is very unlikely. You cannot say that they are giving us incorrect costs. That would be going too far, would it not? Supposing their costs as given to us are correct costs, unless you reduce your costs to their level, your position would be rather an awkward one.

Mr. Kadir.—Of course it would be.

President.—In what way do you propose to reduce your costs?

Mr. Kadir.—The thing is this. As we go on we will of course economise every year.

President.—I want to know what reduction you expect to make in your costs.

Mr. Mathias.—For instance, you have brought down your cost of wood from 8 annas to 7 annas.

Mr. Kadir.—I think by making 6,000 gross a day we might still come down by two annas.

President.—Then, it would bring your costs to Rs. 1-6-0. How do you hope to compete against another whose costs are very much lower?

Mr. Kadir.—As time goes on, we will be as efficient as they are.

President.—In the meanwhile what do you suggest if your costs remain higher than theirs? How do you expect to compete in that case?

Mr. Kadir.—I think that this Indian industry should be for Indians.

President.—That is another question. We are not dealing with that. How do you expect the two prices to be fixed in such a way that you get a higher price and they get a lower price?

Mr. Kadir.—I think that Government should put an excise duty on them.

President.—What reduction do you think you can definitely make in your future costs?

Mr. Kadir.—I have not gone fully into figures, but by making 6,000 gross we can bring down our costs by two annas.

President.—That will make your costs Rs. 1-6-0.

Mr. Kadir.—Yes.

President.—On top of that, these costs do not include depreciation.

Mr. Kadir.—It includes everything.

President.—Let me see what is included. It includes depreciation. How much have you calculated for depreciation?

Mr. Kadir.—6¼ per cent. on machinery.

President.—How much per gross have you included in this?

Mr. Kadir.—We have included that in the overhead charge.

President.—In this Rs. 1-8-0, have you included your depreciation?

Mr. Kadir.—Yes, according to the percentage.

President.—Have you included all your other expenses, head office expenses and everything?

Mr. Kadir—Yes.

President.—Have you included your interest on working capital in this Rs. 1-8-0?

Mr. Kadir.—No, not in this.

President.—Nor have you included any profit?

Mr. Kadir.—No. Of course, I must say that the depreciation which I have calculated at 6¼ per cent. is rather low. So, that difference also should be added on to the cost.

President.—Just now, according to your figures, if you are getting a price of Rs. 1-9-6 to Rs. 1-10-0, you are getting a profit of Re. 0-1-6.

Mr. Kadir.—That is the selling price of Mr. C. A. Muhammad.

President.—What is your factory price?

Mr. Kadir.—Our factory price is less Re. 0-1-6.

President.—Your selling price is how much?

Mr. Kadir.—Rs. 1-8-0 to Rs. 1-8-6.

Mr. Mathias.—Then, you are losing money at present.

Mr. Kadir.—Not losing exactly. We make about 1 pice per gross.

Mr. Mathias.—If you allow for interest on working capital as well as for depreciation?

Mr. Kadir.—Depreciation is already included in that.

Mr. Mathias.—The interest on working capital is not included, is it?

Mr. Kadir.—We get cash from Mr. C. A. Muhammad. We don't require any.

Mr. Mathias.—You require working capital for spare parts, wood, matches in the course of manufacture, etc. That comes to something.

Mr. Kadir.—Yes.

Mr. Mathias.—If you allow for that, you must be working at a loss.

Mr. Kadir.—The capital is sufficient.

Mr. Mathias.—The capital must have interest.

Mr. Kadir.—Our cost is Rs. 1-8-0 and our average selling price will be Rs. 1-8-3.

Mr. Mathias.—If you allow a quarter anna or so for interest on working capital, you cannot be making any profit on your present figures.

Mr. Kadir.—Our cost calculation is quite safe.

President.—If we were to accept these costs, we must come to the conclusion that your business must close down. You say that you could only reduce your costs by two annas. On that basis no reasonable man would carry on business.

Mr. Kadir.—To economise, we are increasing our output to 6,000 gross a day.

President.—Here you say 'please treat the above as confidential'. You don't press that point, do you?

Mr. Kadir.—No.

President.—You allow these costs to be published.

Mr. Kadir.—Yes.

Mr. Mathias.—We have had an application from the representatives of the cottage industry saying that whatever treatment other match manufacturers may receive, there should be some preference shown to the cottage industry; that is to say, if an excise duty of 6 annas is recommended, the cottage industry should bear only 4 annas for example. Have you any comments to make on that request?

Mr. Kadir.—Up to what output, do you consider a cottage industry?

Mr. Mathias.—Up to, say, 50 gross a day?

Mr. Kadir.—There are many factories in that application that produce much more than 50 gross a day. Most of them buy our rejected splints and if we stop selling our rejections, the industry is finished.

Mr. Mathias.—So far as you are concerned, you don't think that the cottage industry has any great future.

Mr. Kadir.—I don't think so.

Mr. Mathias.—Would you resent any sort of preference shown to the cottage industry in the way of a lighter tax to enable them to compete? You were saying just now that you sell them their splints. Supposing an excise duty was levied and they had an advantage of two or three annas, would you still sell your splints to them?

Mr. Kadir.—We will have to limit them to certain output. As soon as they make a little money, they will try to expand.

Mr. Mathias.—They may start two or three factories, or even dozen factories.

Mr. Kadir.—They may do that also. If they begin to increase their output, it would be a difficult thing.

Mr. Mathias.—The suggestion does not appeal to you, does it?

Mr. Kadir.—No.

Mr. M. N. METHA.

B.—ORAL.

Evidence of Mr. P. M. N. MEHTA, recorded at Calcutta, on Tuesday, the 7th February, 1928.

Introductory.

President.—Mr. Mehta, you are one of the proprietors of this company?

Mr. Mehta.—Yes.

President.—Are you the son of Mr. M. N. Mehta?

Mr. Mehta.—Yes.

President.—Is it a private registered Company?

Mr. Mehta.—Yes.

President.—How many partners are there?

Mr. Mehta.—There are two partners, my father and myself.

Dr. Matthai.—You do various other business besides this?

Mr. Mehta.—We do.

President.—You started the factory in 1925?

Mr. Mehta.—In the month of October, 1925.

President.—Before that you were importing matches from Japan?

Mr. Mehta.—Yes.

President.—For how many years were you doing that?

Mr. Mehta.—For the last 30 years.

President.—Did you import any matches from Sweden or was your business confined to Japan?

Mr. Mehta.—More or less to Japan.

President.—In November 1925 were you only dipping splints?

Mr. Mehta.—We started the whole process. We used to import the logs and do the whole process here.

President.—Before that did you try dipping with imported splints?

Mr. Mehta.—No.

Dr. Matthai.—That is to say, you did begin the manufacturing of matches before 1925?

Mr. Mehta.—Not in any form whatsoever.

President.—Who was your technical adviser?

Mr. Mehta.—We brought out a Japanese expert from Japan.

President.—Have you still got him?

Mr. Mehta.—Yes. But he is leaving us within two months time.

Dr. Matthai.—He has been with you from the beginning?

Mr. Mehta.—Yes, from the very start.

President.—Your capacity is, you say, 2,500 gross per day.

Mr. Mehta.—Yes.

President. But you reached only 3 lakhs gross in 1925-26. What is your production now?

Mr. Mehta.—At the present moment we are manufacturing 2,200 gross per day.

President.—Have you been working all the time since November 1925 or did you have to close down your factory for a little while?

Factory closed for one month.

Mr. Mehta.—We had to close down on account of keen competition during the month of September 1927 for one month.

President.—Only one month?

Mr. Mehta.—Yes.

President.—What sort of keen competition did you have to face?

Mr. Mehta.—We were not in a position to face the competition.

President.—How do you mean?

Mr. Mehta.—The Swedish concern went on selling their Wimco matches during the month of May 1927 made out of Indian wood at Rs. 1-6-0 a gross. That was the "Lantern" brand. They also sold their "Duel" brand at Rs. 1-7-0. These are second quality matches. While they were selling at Rs. 1-6-0 they used to give 1 anna 6 pies to 2 annas special commission to their agents. There was another temptation for the buyers. If a man happened to buy 100 cases on contract, they allowed him Rs. 4-11-0, that meant another 1 anna 6 pies. In other words 3½ annas would go off from Rs. 1-6-0 which meant that the price came to Rs. 1-2-6. On account of such keen competition we thought we would not be able to carry on and we asked our labourers to come to some terms.

Dr. Matthai.—This special competition began in May?

Mr. Mehta.—Yes, in May 1927.

Dr. Matthai.—How many months did it last?

Mr. Mehta.—Till the month of November.

Dr. Matthai.—You were faced by this competition during the month of September as a result of which you had to close down.

Mr. Mehta.—Yes, on account of this keen competition we had to close down.

Dr. Matthai.—You closed down for only one month?

Mr. Mehta.—Yes.

Dr. Matthai.—And you re-opened in November?

Mr. Mehta.—Practically on the 15th October. The whole of September we had closed down our factory and opened somewhere about the 15th of October.

Dr. Matthai.—What led you to re-open the factory?

Mr. Mehta.—The labourers came to terms with us. Formerly my cost of labour used to be 7½ annas per gross which I was able to reduce by 3½ annas thus bringing my cost to 4 annas a gross.

President.—From 7½ annas to 4 annas.

Mr. Mehta.—Yes.

Dr. Matthai.—That is your total labour cost?

Mr. Mehta.—Yes, and that helped me.

Dr. Matthai.—Are these second class matches still on the market?

Mr. Mehta.—Yes, they are, but as a matter of fact since last November or December they have raised their prices and at the present moment this very quality they are selling at Rs. 1-12-0 per gross.

Dr. Matthai.—That is the "Lantern" brand?

Mr. Mehta.—No, the "Duel" brand which they used to sell at Rs. 1-7-0 in the Calcutta they are now selling at Rs. 1-12-0 and in the up-country market at Rs. 1-10-0.

Dr. Matthai.—What about the "Lantern" brand; has it disappeared from the market?

Mr. Mehta.—Yes, practically it has disappeared because the quality was not good.

Mr. Mathias.—Do you know how much "Lantern" brand was sold?

Mr. Mehta.—They used to sell about 300 cases. What happens is this. They have got various labels and they always try to introduce new labels and in order to push the sale of these they sell these cheaper as an inducement to the agents. If these are approved by the consumer they manufacture on a large scale. At the present moment their well-known brands are "*Panpatty*" and "*Gayatri*".

Mr. Mathias.—I take it this low price of the "Lantern" brand was to introduce a new label?

Mr. Mehta.—Yes.

Mr. Mathias.—It is really a form of advertisement.

Mr. Mehta.—Yes.

President.—This does not seem to have done you much harm if you were able to reduce your costs by 3½ annas. I mean if you have been able to reduce your cost as a result of this competition, this has done you good?

Mr. Mehta.—We are losing money all along last year.

President.—You really cannot complain against them when they were the means of enabling you to reduce your costs by 3½ annas on labour alone?

Mr. Mehta.—As a matter of fact they held out a threat to buyers of our matches that if they bought their matches from Indian manufacturers they would see that within a short time all the Indian factories were compelled to close down. They have said that many a time.

President.—That is their way of doing business.

Mr. Mehta.—It is more for taking up the whole trade in their hands than anything else, that they are doing it.

President.—On your own showing yours cost was higher than it should have been. You cannot blame them if they manufacture matches at a smaller cost.

Mr. Mehta.—As they have vast capital they are quite able to cut down their rates and even dump the market and even if they lose, it would not affect them whereas in the case of manufacturers like us it would affect our position to a great extent.

Dr. Matthai.—Supposing you had been able to reduce your labour cost from 7½ annas to 4 annas and supposing the "Lantern" and "Duel" brands remained at Rs. 1-6-0 and Rs. 1-7-0, in that case would you be able to carry on?

Mr. Mehta.—No. Even when their price was Rs. 1-7-0 you must deduct 3½ annas out of that. At the present moment we are able to sell because they have raised their price. On account of this we are able to sell 100 cases a day.

President.—If you were doing business would you fix your selling price according to your own costs or your opponent's costs?

Mr. Mehta.—On my own cost.

President.—I will show you how it has been happening. Their average cost in 1927 was Rs. 1-3-11 against your cost of Rs. 1-6-0. If their average cost were Rs. 1-3-11 or Rs. 1-4-0 and if they were selling at Rs. 1-3-6.....

Mr. Mehta.—It means they were losing money.

President.—They were selling at the factory at Rs. 1-7-0 per gross. You must remember that these are their average costs. These are not the costs of their second quality at all. These are their average costs of aspen splints and Indian wood boxes. So, the average costs of their second quality would be very much smaller.

Mr. Mehta.—At the same time our average cost comes to Rs. 1-6-0, with aspen wood for splints and Indian wood for boxes.

President.—I am now dealing with their costs. Their cost in 1927—this is up to October—is Rs. 1-3-11. You have not given us your costs for September.

Mr. Mehta.—Rs. 1-11-0 is our cost.

President.—Your cost is Rs. 1-11-0 as against theirs of Rs. 1-3-11 or Rs. 1-4-0.

Mr. Mehta.—We sent this in the month of April.

President.—Yes. It is only after September that you have been able to reduce your cost.

Mr. Mehta.—As a matter of fact we were losing money from the month of May and it was impossible for us to carry on further. So, we thought fit to close down the factory.

President.—In order to prove unfair competition, you must establish that they were selling at a loss. What they do is—this is their practice—supposing their costs are Rs. 1-5-0 to-day and they expect their cost to come down to Rs. 1-4-0 next month, they will make that reduction of one anna this month.

Mr. Mehta.—According to your own version.....

President.—This is not my version.

Mr. Mehta.—According to their statement made to you, their average cost was Rs. 1-4-0 or to be exact Rs. 1-3-11.

President.—We do not know what their lowest costs were at that time. As you know their costs in the previous year were Rs. 1-11-7. So their cost must have been very much higher than Rs. 1-4-0 in the beginning and they must have gradually come down. Their costs might be even very much less now. We have not got their more recent costs. We are trying to get them. It is no use your trying to suggest that they are entering into any unfair competition without your satisfying us that they were actually selling at a loss for the whole period.

Mr. Mehta.—They have vast resources.

No evidence of unfair competition.

President.—That may be so. We are not concerned with that for the moment. This is what you have got to establish, if you want to prove a case of unfair competition against them, that they were selling at prices at which they could not afford to sell having regard to the actual costs at the moment and the possible reduction in costs they might reasonably expect at that time; but I say you were not able to give us any evidence on that point.

Mr. Mehta.—I have just placed before you the matter as it stands and I do not know their costs at the present moment. I am just showing you how things really happened.

President.—Your chief complaint against them is then this that they were able to reduce their costs because they had more experience and more resources at their disposal.

Mr. Mehta.—Undoubtedly.

President.—And therefore they were able to reduce their prices in the market. But you were not able to do so because you had not had that experience and such vast resources.

Mr. Mehta.—Exactly. As compared with their experience, we are just in our infancy. We started this industry only about three years ago.

Dr. Matthai.—The difficulty that you experienced has now disappeared, has it?

Mr. Mehta.—Yes, at the present moment.

Dr. Matthai.—You are able to carry on at the present moment.

Mr. Mehta.—Yes, but if again they dump the market, we shall be washed out.

President.—What do you mean by dumping the market?

Mr. Mehta.—I mean this. Supposing they were selling at Rs. 1-7-0 if they reduced their price to Re. 1, then we should be washed out.

President.—Supposing their costs came down to Re. 1?

Mr. Mehta.—There should be a discriminating duty on foreign capitalists.

President.—To tax a man who is more efficient than you? Supposing we were satisfied that they were not selling below their works costs and there was a fair margin for depreciation and profit, do you suggest that they should be taxed because they are more efficient than you are?

Mr. Mehta.—They should be taxed because they are foreigners.

President.—That is another point. The main reason why you want a tax put on them is that they are more efficient than you. Does not that follow?

Mr. Mehta.—I don't put it in that form.

President.—It comes to that.

Mr. Mathias.—Is it not your case that you have a very dangerous rival or competitor and whether he is a foreigner or an Indian, you would like to eliminate him? Supposing that an Indian firm proceeded to undersell you, you would like to eliminate it.

Mr. Mehta.—Yes.

Mr. Mathias.—That is your case, is it not?

President.—Supposing instead of this being a foreign company, it was an Indian company pure and simple and by its greater efficiency it was able to reduce its costs very much below yours, what would you suggest in that case?

Mr. Mehta.—If it was an Indian company, we would also be on the same level.

President.—Not on these costs?

Mr. Mehta.—As a matter of fact, as they have more experience, their costs may be a little cheaper than ours. I am now speaking of the Swedish concern. At the same time I would like to say that we are trying to reduce our costs as far as we possibly can.

Mr. Mathias.—We have found the costs of some Indian manufacturers at least as low as those of the Swedish and in some cases even lower than the Swedish costs.

President.—Particularly in Bombay?

Mr. Mehta.—I have no idea of Bombay.

President.—That is the case. Some of the costs given to us are actually lower than those of the Swedish Match Company.

Dr. Matthai.—If we levied a discriminating excise duty, you would not be tempted to make the reduction in labour costs that you made last year of about three annas.

Mr. Mehta.—At the same time we have to look to the Indian labourers too. If they were left with very little wages, it would be impossible for them.

Dr. Matthai.—How did you reduce your labour costs?

Mr. Mehta.—By reducing the piece rate.

Mr. Mathias.—By the improvement in the efficiency of the Indian labour.

Mr. Mehta.—Yes.

President.—They also employ Indian labour.

Mr. Mehta.—At the same time they have Simplex machines.

President.—They haven't. If they used Simplex machines, their costs would come down still more.

Mr. Mehta.—We have been given to understand that they have.

President.—I do not know where you got your information from. It is in evidence—and we have also seen their factory—that they have not got Simplex machines.

Mr. Mathias.—The Simplex is used to-day by the most up-to-date Indian factories.

President.—What did you say as your actual output now?

Mr. Mehta.—2,200 gross per day.

President.—What was your total output in 1927 for the whole year?

Mr. Mehta.—We manufactured 10,000 cases of 50 gross each, that is about half a million gross.

President.—That comes to just under 1,700 gross.

Mr. Mehta.—Yes. We work for 300 days in a year.

President.—You have been increasing your output recently, have you not?

Mr. Mehta.—Yes.

President.—Since when?

Mr. Mehta.—Since last December.

President.—Is it to reduce your costs or is it for any other purpose that you have increased your output?

Mr. Mehta.—On account of the increased demand we are making more matches.

President.—Have you got large stocks now?

Mr. Mehta.—Not more than 1,000 cases. That we do keep on account of labour having a strike when they want an increase in their wages.

Dr. Matthai.—What proportion of your total output is half size?

Mr. Mehta.—We manufacture very little of half size.

President.—It is nearly all full size.

Mr. Mehta.—Yes.

President.—What price are you getting for your matches?

Mr. Mehta.—We are selling at Rs. 1-7-0 without any commission whatsoever. That is for our first quality.

President.—Is that nett?

Mr. Mehta.—Yes, and Rs. 1-6-0 is for our second quality.

President.—What do you mean by second quality?

Mr. Mehta.—Matches made out of genwa wood.

Dr. Matthai.—Do you mean both splints and veneers are made of genwa?

Mr. Mehta.—Yes.

Mr. Mathias.—You get considerably lower prices than the Esavi India Match Manufacturing Company.

Mr. Mehta.—I do not know.

President.—You don't impregnate your matches, do you?

Mr. Mehta.—No.

President.—Don't you think that the reputation of Indian matches is partly spoilt by your not impregnating them?

Mr. Mehta.—Indians don't care much about that.

President.—Then, you cannot blame the Swedish Match Company for saying that your matches are inferior to theirs.

Mr. Mehta.—They don't impregnate their second quality matches (samples shown).

President.—Do they now manufacture this "Panpatty" brand?

Mr. Mehta.—They do.

President.—Do you know for certain?

Mr. Mehta.—We got this from the market yesterday.

President.—We shall enquire into that because they have told us that they impregnate all their matches.

Dr. Matthai.—You don't impregnate your matches either first or second quality.

Mr. Mehta.—No.

Dr. Matthai.—How much first quality and how much second quality, do you make?

Mr. Mehta.—Three-fourths are made with aspen splints and those are our first quality matches and the remainder is second quality matches which are made entirely of Indian wood.

Wood.

President.—The wood that you use is genwa, is it not?

Mr. Mehta.—Yes.

Dr. Matthai.—You mention some other Indian wood in reply to question 13. What is that wood?

Mr. Mehta.—It is the same genwa wood. The branches are called *juri.*

Dr. Matthai.—It is really genwa.

Mr. Mehta.—Yes.

Mr. Mathias.—What is the average price you pay for genwa?

Mr. Mehta.—At the present moment?

Mr. Mathias.—What shall we take as the average price of genwa?

Mr. Mehta.—13 annas per piece.

Mr. Mathias.—That is the average, is it not?

Mr. Mehta.—Yes.

Mr. Mathias.—That is about Rs. 10 a ton.

Mr. Mehta.—Yes.

President.—What is the price at the present moment?

Mr. Mehta.—13 annas per piece.

President.—When does the price go up? Is there a seasonal price? Does the price vary according to the season or what?

Mr. Mehta.—I should say during the rainy season the price goes up. We have experience of that.

Dr. Matthai.—What is the highest price you have paid?

Mr. Mehta.—Rs. 1-6-0 per piece.

Mr. Mathias.—Do they extract this wood during the rainy season?

Mr. Mehta.—I think they do extract, but on account of the uncertainty of the weather—the river not being favourable for the *majis*—they don't bring the timber regularly.

Mr. Mathias.—But they do extract and transport to Calcutta.

Mr. Mehta.—Yes: otherwise we would have to close down our factory.

President.—Do you have any difficulty in getting wood at any time?

Mr. Mehta.—No.

President.—Have you tried to get wood from the Andamans?

Mr. Mehta.—Yes, we bought wood through Messrs. Martin and Company.

President.—What wood was it?

Mr. Mehta.—Papita and dhup.

Dr. Matthai.—How did you find papita?

Mr. Mehta.—It would not stand in the frame filling machine; it breaks.

Mr. Matthai.—Dhup was better, was it not?

Mr. Mehta.—Yes, but the price being Rs. 60 per ton, we gave up the idea of using it.

Mr. Mathias.—What did you pay for papita and dhup?

Mr. Mehta.—We bought only one ton.

Mr. Mathias.—How much did you pay?

Mr. Mehta.—Rs. 60 ex-ship. We wrote to Martin's and asked them whether they would reduce the rate but they flatly refused to do so.

Mr. Mathias.—Even when you said that you would buy your annual requirements from them?

Mr. Mehta.—Yes. Here I have got their letter. If you want, I can show you.

President.—What do they say?

Mr. Mehta.—They say they regret that they cannot reduce their rate under any circumstances.

Mr. Mathias.—Was papita sold at one time by Messrs. Martin and Company at Rs. 35 per ton?

Mr. Mehta.—I cannot say.

President.—What did you ask them to do?

Mr. Mehta.—We asked them to reduce the rate and said that if they reduced the rate we would take a large quantity from them. They replied that they could not do it.

Machinery.

President.—As regards your equipment, most of your machines are Japanese machines, aren't they.

Mr. Mehta.—Japanese and German machines, both combined.

President.—What German machines have you got?

Mr. Mehta.—All box making machines are German machines.

President.—Are they Roller's?

Mr. Mehta.—All Roller's.

President.—Could you tell us what price you paid for these machines?

Mr. Mehta.—About 900 rupees each with duty.

President.—Landed here?

Mr. Mehta.—Landed at the factory.

President.—Did you pay the same price for the outer and the inner?

Mr. Mehta.—The outer is cheaper than the inner.

President.—What is the difference in price?

Mr. Mehta.—The inner box making machine is Rs. 300 to Rs. 400 more.

President.—Is Rs. 900 the average price?

Mr. Mehta.—That is the price of the outer?

President.—What is the price of the inner box making machine?

Mr. Mehta.—It is Rs. 400 more.

President.—How many outer have you got and how many inner?

Mr. Mehta.—We have got 10 outer and 14 inner.

President.—Then, you have got only one box filling machine which I see you don't use.

Mr. Mehta.—We don't use it. There are two reasons for that. The first reason is this. When we got out this machine we used to pay to our labourers Rs. 4-11-0 for 50 gross and then we worked this machine. It gave us a cost of Rs. 3-2-0 for 50 gross. So, we told the labourers " are you willing to accept on the same basis all piece work " to which first of all they refused, but after a fortnight they said " yes ". Then, we thought we would keep the machine by and employ Indian labour.

President.—But you did not pay the Indian labour more.

Mr. Mehta.—The machine would bring the cost down to Rs. 3-2-0; whereas if it was done by hand, the cost would be Rs. 4-11-0. We have helped Indian labour because we want really 100 to 150 people for filling.

President.—Are not you paying the same as it would cost you if you were using the machine?

Mr. Mehta.—Yes.

President.—Do you think that that is a great advantage?

Mr. Mehta.—Yes, looking from the point of view of the labourers concerned.

President.—What about the machine's point of view?

Mr. Mehta.—The machine is starting at us but the point is this that whenever they want an increase in their wages, we start the machine.

President.—You keep the machine not for using but in order to enable you to reduce your wages; is that the idea?

Mr. Mehta.—Because it has brought the cost to the same level. At the same time I would require more machines. This one machine will not enable me to turn out 2,200 gross a day. It will not manufacture more than 8 cases; that means 400 gross whereas I am now manufacturing 2,200 gross a day. So, I would require more machines.

Mr. Mathias.—Do you think that it would be a good principle to be applied to all industries that the payment of Indian labour on hand processes should be regulated by the cost at which the same article could be produced by machinery?

Mr. Mehta.—As far as matches are concerned, I would say "yes".

President.—Does your labour work on the premises or do you distribute the work outside?

Mr. Mehta.—Everything is done on the premises.

President.—Do they keep regular factory hours?

Mr. Mehta.—Yes.

President.—In all cases, they are paid by the piece.

Mr. Mehta.—All by the piece. We have got about 100 coolies to whom we pay per day.

President.—And the rest?

Mr. Mehta.—By the piece.

Dr. Matthai.—At the time you framed your answers you said you had a total labour force of 600; but now your total output is 2,200 gross.

Mr. Mehta.—Yes, but the total labour force is 500.

Dr. Matthai.—You have reduced it from 600 to 500 in spite of the increase in output.

Mr. Mehta.—Yes. Formerly we used to make boxes by hand but when we got out these box making machines, we had to reduce the number of men.

Dr. Matthai.—Since April 1927 what processes have you begun to do by machine?

Mr. Mehta.—Side painting which was done by hand is now done by machine. Then we had box making both by machine and by hand but now everything is done by machine.

Dr. Matthai.—The box making is entirely done by machine.

Mr. Mehta.—Yes.

Costs.

President.—As regards your costs, you have made a reduction from Rs. 1-11-0 to Rs. 1-6-0 since 1925-26.

Mr. Mehta.—Yes.

President.—Are these the lowest costs that you have ever got or have you got your lowest costs for any particular month?

Mr. Mehta.—This is our lowest.

President.—Is any charge for depreciation included in this?

Mr. Mehta.—Yes (item No. 7).

President.—It does not include your interest on working capital.

Mr. Mehta.—No.

President.—Your working capital is how much?

Mr. Mehta.—Rs. 1½ lakhs.

President.—Your machinery is how much?

Mr. Mehta.—Rs. 2 lakhs.

President.—You have got to add the interest on Rs. 3½ lakhs.

Mr. Mehta.—Yes, *plus* the interest on the amount locked up in raw materials.

President.—The working capital must include that. You have got to calculate your interest on Rs. 3½ lakhs. If you add that to your Rs. 1-6-0, then you get your selling price.

Mr. Mehta.—Yes.

President.—If you take it at the rate of 10 per cent., it comes to a little less than 1¼ annas. So, the price of Rs. 1-7-6 will leave you a profit of 10 per cent.

Mr. Mehta.—Yes.

President.—But you want more apparently.

Mr. Mehta.—I would be quite satisfied if I get 10 per cent.

President.—You consider that fair.

Mr. Mehta.—Yes.

President.—That is on your price and it is for you to show how you are going to get that price?

Mr. Mehta.—That is my main argument from the very start.

President.—If you don't get that price, it is not due to any competition from a foreign manufacturer but is due to the competition amongst yourselves in the country. How is any Government going to enable you to get that price? Leave out the Swedish Match Company for the moment. How are you going to get that price of Rs. 1-7-6?

Mr. Mehta.—If there is no foreign competition, we would be able to combine and have our own association as in other countries like Japan. There we find that a certain article is sold at a certain rate. Although there may be many manufacturers, it has been laid down that being members of the Association they will not sell below the specified rate. Similarly, we would be able to form an association in India.

Dr. Matthai.—And fleece the consumer?

Mr. Mehta.—No, not that.

Mr. Mathias.—Are you thinking of forming an Association for the whole of India?

Mr. Mehta.—Yes.

President.—Supposing you form a combination like that which enables you to get a higher price without considering the question whether the costs could be reduced or not, people may have to say something about it afterwards.

Mr. Mehta.—There would be clauses put down in the constitution of the combination. The combination would sell at a certain rate which would be to the advantage not only of the manufacturers and middlemen but also of the consumer. It is not that by having an association we would fleece the consumer. We would say " let us live and let others live ".

Mr. Mathias.—In your Association you would have to fix your price according to the weakest member.

Mr. Mehta.—No; in the Association it would be laid down that we should, looking at it from everybody's point of view, sell at an average cost all our matches and on that *plus* 10 per cent. or whatever it is all the goods will be sold by the syndicate, by the manufacturers or whatever body it may be.

Mr. Mathias.—Would not your members with higher costs be incurring a loss whilst those with lower costs would be making excessive profit?

Mr. Mehta.—Those people whose costs are high would try to reduce their costs.

President.—If that is your view and if the Swedish Match Company were to join this Association, it would enable them to secure larger profits.

Mr. Mehta.—We would be too willing to take them in. Of course, that is my own personal opinion. If they joined us, it would be all the better.

President.—What would happen is that your costs being higher than theirs, the selling price will have to be so fixed that you make a profit on your costs.

Mr. Mehta.—Yes.

President.—The difference between their costs and yours being four annas, they make a profit of 4 annas more than you or more than they need. Do you think that would be to the advantage of the country?

Mr. Mehta.—It will be on a ratio. Each manufacturer will manufacture so much and nothing more.

President.—You agree as to the quota, but I am talking of the price now. The price must be so fixed that the more inefficient factories are also able to live; otherwise they won't join the Association and therefore the price of all the matches will be fixed by the price not of the most efficient but of the most inefficient factory under such a combination.

Mr. Mehta.—Yes.

President.—Do you think that the country would agree to that?

Mr. Mehta.—It depends upon the sentimental view.

Dr. Matthai.—I suppose that you would fix the price in such a way that the least efficient is not allowed to exist and that only the most efficient ones will be allowed to survive.

Mr. Mehta.—Yes; others should improve.

Dr. Matthai.—In that case, it would be very difficult to effect a combination.

Mr. Mehta.—That is my own suggestion.

President.—But the consumer may well say "I will have the price fixed in accordance with the costs of the most efficient". What have you to say to him? I am putting to you the consumer's point of view. The consumer may say "why should I part with my four annas a gross when I could get the same kind of match at so much less than I would from this combine". Do you understand my question?

Mr. Mehta.—I do.

President.—What is the answer? What benefit is the consumer going to get if he sacrifices four annas? What inducement is there for you to reduce your costs if you are going to get 4 annas more than the Swedish Match Company? We must put the case up to Government and satisfy them that this would be in the general interests. They would want to know what benefit the country is going to get by allowing Mr. Mehta four annas more?

Mr. Mehta.—A certain rate would be fixed. Those people whose costs are more should try to reduce their costs.

President.—Your costs are Rs. 1-6-0. What reduction do you expect to make in your costs in the near future?

Mr. Mehta.—As our labour gets more efficient, we might be able to reduce our costs further more.

President.—Have you considered how much more could you reduce your costs?

Mr. Mehta.—They will not be reduced at the present moment.

President.—So Rs. 1-6-0 is the lowest.

Mr. Mehta.—Yes, at present.

President.—The Swedish Match Company's cost are Rs. 1-4-0 in Calcutta. Those are the average costs for the whole year. What do you suggest we

should say if you say that your costs are Rs. 1-6-0 and will remain at that figure?

Mr. Mehta.—The fact is that in respect of chemicals they are controlling the market. We have to depend upon them for certain chemicals.

President.—May I tell you their cost of chemicals? Your cost is Re. 0-2-6 per gross whereas their cost is Re. 0-2-11. Their chemicals are not cheaper than yours.

Mr. Mehta.—At the present moment we are discussing the Swedish people. I say that they have a monopoly in amorphous phosphorous.

President.—They have not got a monopoly in that.

Mr. Mehta.—They have a monopoly. They have cornered the market in Europe.

President.—Don't you see that the costs here show that their chemicals cost more than yours?

Mr. Mehta.—They may be getting some commission. Being a vast concern they must be buying cheaper. If they stopped supplying us with amorphous phosphorous, we must cease manufacturing.

President.—Why should you assume that?

Mr. Mehta.—It cost us Re. 0-2-6 when we bought amorphous phosphorous at the rate of £185 per ton. Now the quotation is £210 per ton.

President.—Amorphous phosphorus is not such a big item in your costs.

Mr. Mehta.—It is.

President.—How much per gross does it come to?

Mr. Mehta.—For 100 gross we consume about 1½ lbs.

Mr. Mathias.—How much does 1½ lbs. cost?

Mr. Mehta.—I am only saying that if they stopped supplying us we would have to close down our factory.

President.—The quantity is so small that it does not make any difference. They use about 2 lbs. It is not going to break anybody's back. Their costs are not low on that account because their chemicals cost more. Their costs must be lower for other reasons. Their wood costs less. Probably you are using more wood. Your labour also costs more than theirs.

Mr. Mehta.—At the present moment we cannot reduce our labour costs; it is impossible. As far as wood is concerned, if Government could supply us with genwa at a cheap rate, then we would be able to reduce our cost.

President.—They are also buying in the open market like you. Their cost of wood is Re. 0-5-8 against your Re. 0-7-0.

Mr. Mehta.—Perhaps they may be getting aspen from their own forests.

President.—But they debit their works with the world price. It is no use saying all that. So far as costs are concerned, they are paying the same price as you do. If you are paying Rs. 115 for your aspen, they are also paying the same price.

Mr. Mehta.—Our cost is Rs. 119 for aspen.

President.—Theirs is between Rs. 115 to Rs. 120. As far as costs are concerned, the prices that you pay for your materials, chemicals and wood are no higher than what they pay. They may be making their profit on sales; that is another matter.

Mr. Mehta.—We went through our costs very very minutely when we had to close down our factory and we found that it was impossible to work at the present moment under the present cost of Rs. 1-6-0.

Dr. Matthai.—Have the Swedish Match Company made any proposal to you about a working arrangement?

Mr. Mehta.—No; on the contrary they have told their buyers that within a short time they will see that our factory is closed down. They have deliberately said that.

President.—We hope it will not be closed.

Mr. Mehta.—We trust not, provided you give us protection.

Allegations against the Swedish Match Company.

President.—We always give what you gentleman deserve and nothing more. If you show that you deserve anything we will be prepared to consider that. You have sent us some very interesting letters and I should like to put you a few questions on them. One of your complaints is that they are trying to find out what their competitors are doing.

Mr. Mehta.—Yes.

President.—What objection have you to that? Is it not good for you to find out what your competitors are doing?

Mr. Mehta.—They are writing letters to their agents asking them to see that the sale of Indian matches is stopped.

President.—I am just dealing with your complaints one by one. You say they are now giving their attention more closely to competitive factories and asking their agents to get details of every factory in their territory. What is wrong about that?

Mr. Mehta.—The wrong is that they desire to know to what the others are manufacturing so that they may be able to curtail their rates in accordance with what the Indian manufacturers are selling at.

President.—Would you not try to do the same thing that your competitors are doing? How are you going to get into the market unless you know what your competitors are doing? I don't understand your complaint. Is there anything wrong in that. Supposing I am in the same business and you are my chief rival. I will try to find out what you are doing. Is there anything wrong in that? What is your suggestion?

Mr. Mehta.—My suggestion is that as businessmen they should not try to find out what their competitors are manufacturing and supplying and so on. I can give you a concrete instance. They deliberately sent their durwan to our factory to find out what labels we were manufacturing and the amount of our production. No businessman would do that. We won't even think of sending our durwan to their factory to find out how many cases have been sent out, what labels they use and so on. This practically means that they have got a very large organization for the purpose of crushing the Indian industry and nothing else.

Mr. Mathias.—Surely you can make enquiries as to what they are doing?

Mr. Mehta.—As far as I am concerned I won't.

Mr. Mathias.—Have you not tried to find out what amount of commission they pay to their dealers?

Mr. Mehta.—I had to do that because our sales were diminishing.

President.—They don't blame you for your doing it; they cannot. In the same way they also want to know what you are doing.

Mr. Mehta.—There is no answer to that.

President.—Then you complain that the Swedish concern ask their dealers to furnish them with market reports, etc. Is there anything improper in trying to find out what is the condition of the market. Every business firm has to find out what its market is otherwise how can it put itself into touch with the market?

Mr. Mehta.—Their idea is to find out what the Indian factories are manufacturing and where they are selling so that they could sell their goods in those localities at a cheaper rate to wipe out the Indian concerns altogether.

President.—Do you think there is anything improper in this?

Mr. Mehta.—If you take it in a broad light it may not but with my views I say, yes.

President.—I hope you are broad-minded enough, Mr. Mehta?

Mr. Mehta.—As I said our principle is "live and let live", but they would not let other people live.

Mr. Mathias.—How many big concerns have been closed down as a result of this competition?

Mr. Mehta.—There were nearly 30 match factories in Calcutta and there are only 5 or 6 now.

Mr. Mathias.—I am talking of big factories.

Mr. Mehta.—Three big factories have shut down.

Mr. Mathias.—Could you name any factory producing 3,000 gross which had to close down as a result of this competition?

Mr. Mehta.—The New Sunderbans Match Factory.

Mr. Mathias.—What was its output?

Mr. Mehta.—About 500 gross.

Mr. Mathias.—I don't want that. Obviously if a foreign trust was trying to crush the Indian factories, they would strike at the big factories, would they not?

Mr. Mehta.—We had to close down on account of the keen competition.

Mr. Mathias.—You are still going on.

Mr. Mehta.—The reason is that they have raised their rates otherwise we could not do it. If they bring down their rates again I don't know where I will be.

Mr. Mathias.—If they were anxious to see you closed down, they would not have raised their price.

Mr. Mehta.—I don't know what is their idea. Perhaps they want to show that it is we that are reducing the rates.

Mr. Mathias.—May be, but at the same time if, as you say, the Trust has a settled policy to crush all the Indian factories, first of all their policy would be consistent. If they caused one Indian factory to close down they would see that that factory did not revive. Secondly, in the course of the last two years having enormous resources at their back, they would have attained some success in their object, don't you think so?

Mr. Mehta.—As a matter of fact my view is that they find that an enquiry is being carried on by the Tariff Board and therefore they are simply watching what is going on. Once the thing is definitely decided one way or the other you can take it for granted that even if an excise duty is levied they will compete and try to crush us because with their vast resources it is immaterial for them whether there is a duty or not.

Mr. Mathias.—You are speaking of the future, I am speaking of the past. It does not appear from the past that they have pursued an intensive policy of competition with a view to closing down the successful Indian factories.

Mr. Mehta.—They have vast resources. In the past they crushed the factories in Japan.

Mr. Mathias.—You are talking of Japan but I am talking of India.

Mr. Mehta.—They used to sell their matches in 1925 at Rs. 2-2-0; they are selling at the present moment at Rs. 1-12-0 or so.

Mr. Mathias.—The President has suggested an explanation that the cause might be ordinary business competition with no ulterior motive.

Mr. Mehta.—Their idea is to sell their matches at a cheaper rate just to induce the public to buy their goods by showing that they are offering their goods at a cheaper rate, but their desire really is to crush the Indian industry.

Mr. Mathias.—You have said that they have vast resources. If that is so they have been remarkably unsuccessful in their attempt.

Mr. Mehta.—They are not unsuccessful, they are simply watching. If they take it into their head to crush the Indian industry they would do it now; they can offer their matches at 12 annas a gross.

Mr. Mathias.—Why have they not done it?

Mr. Mehta.—They have not done it at the present moment for the simple reason that they want to see how the recommendations of the Tariff Board are received by the Government.

Mr. Mathias.—Why have they not done it before the Tariff Board was asked to enquire?

Mr. Mehta.—Because as far as matches are concerned the Indian people were buying their product, and there would be sentiment too.

Mr. Mathias.—Why have they not reduced their price to 12 annas?

Mr. Mehta.—They have been continually reducing it.

President.—What they have suggested to us is this, that when they first came into the market the prices were very high and therefore they also started making matches in the country as you did. They fixed their prices according to their costs and as the costs came down they reduced their price. That is their explanation. If that is the position your only complaint against them can reasonably be that they have been able to reduce their costs and consequently reduce their prices. That is what it comes to.

Mr. Mehta.—If you asked me candidly I should say they might have shown you that in figures.....

President.—Mr. Mehta, it is a very serious allegation to make against them that they have not given their correct costs.

Mr. Mehta.—That is not exactly my idea, I am only saying that they can sell their goods at any rate they want.

President.—That is not the point. Their case is this. Every time they have reduced their price the reduction has corresponded more or less either to the actual reduction in the cost or an anticipated reduction.

Mr. Mehta.—They have given you their cost for May as Rs. 1-3-11.

President.—That is their average cost. We do not know what their costs for May are.

Mr. Mehta.—If that be the case I have nothing to say.

President.—Supposing we found that they were not selling below their cost at any time and that they made reductions in accordance with the reductions in their cost or anticipated reduction in costs, what is your grievance against them. It is simply this, is it not, that they have been able to reduce their costs and thus bring down their prices?

Mr. Mehta.—There can be no other grievance if that is actually the case.

President.—If the reduction in price corresponded to the reduction in their costs, then you have no grievance?

Mr. Mehta.—No.

President.—But in your mind you are not satisfied that that has been the case.

Mr. Mehta.—Yes, that is what I feel.

President.—We are investigating that very point. Supposing we found that what they said was true?

Mr. Mehta.—Then we would shut down our factory and start some other business rather than lose money.

President.—You have sent us some very interesting circulars. Where did you get these from? They must have been issued by the dealers.

Mr. Mehta.—It is the Swedish Company who have printed them in the name of the dealers.

Dr. Matthai.—Why don't you try and fight them on their own methods.

Mr. Mehta.—It is impossible to fight them, with the vast resources that they have got at their back. If I had Rs. 25 crores I would be too willing to compete with them but as far as individual firms are concerned it is impossible for us to compete.

Dr. Matthai.—Apart from reducing your price why not try and understand your market better and why not do propaganda as they do?

Mr. Mehta.—Two years ago there was a circus in the Central Avenue. There was a clown who asked for a match. An Indian match was given to him. He lit it and threw it away and said "Oh, it has burnt my finger. Bring me a Swedish match. This Indian match is no good". I was in the box and offered him my match and said "try this". He wouldn't do it. The Swedish Company paid the clown. It was two years ago that this happened. This is how they carry on propaganda against Indian matches.

President.—Your contention therefore is—this is what you are trying to establish—that they are trying to spoil the reputation of the Indian matches.

Mr. Mehta.—Undoubtedly and they are also trying to popularise their own matches.

President.—That is done everyday. This is known as "puffing" in the ordinary court of law. Unless people are deceived by that there is nothing wrong about it. Are people deceived by this?

Mr. Mehta.—Their idea is to impress upon the consumer that whatever matches are produced by Indian factories, are no good. So it makes a difference.

President.—There is one very important point about this. We were just talking about the clown in the circus. If the clown's fingers were burnt it was probably because the Indian match was not impregnated. Do these circulars refer to the Swedish imported matches or what?

Mr. Mehta.—No, they refer to the Wimco matches.

President.—The Indian matches are put before the public unimpregnated whereas the bulk of their production is impregnated. If a man is accustomed to impregnated matches and gets one of your matches and says that your matches are bad, they are simply taking advantage of this fact. That is what it means. You say you don't wish to impregnate your matches.

Mr. Mehta.—Yes, because we don't get more money for it.

President.—You are only enabling these people to spoil your reputation by omitting a very simple process. That is one thing undoubtedly.

Mr. Mehta.—As far as the Indian consumers are concerned they don't require the matches to be impregnated because when they light the match they use it and at once throw it away, but as far as Europeans are concerned it is essential for them that the matches should be impregnated because they take some time and if the head falls down it may catch fire.

President.—What nationality did the clown belong to?

Mr. Mehta.—He was an Indian but he was paid for it.

President.—We shall look into this matter and if we find that they are trying to mislead the public we shall have to ask for an explanation but if they do this only to push their matches against yours, one does not see that there is anything wrong in it. There is nothing to prevent you from damning their matches by propaganda of this kind. To put it differently you may say "Use Swadeshi matches instead of foreign matches" and thousand and other things. You have got to find out your own method of carrying on propaganda to push your matches against theirs.

Mr. Mehta.—When I went to Sweden in 1924 I had to pay a foreigners' tax of 10 per cent. being a foreigner whereas they come to our country, they get all the benefits and with their vast resources try to kill our industry.

President.—That tax has nothing to do with industry.

Mr. Mehta.—That is a foreigners' tax.

President.—The foreigner does not pay any income-tax and so they make him pay like that. It has nothing to do with any business.

Mr. Mehta.—In foreign countries we cannot establish any sort of factory. We have to pay some sort of special tax to Government.

President.—That depends upon the policy of different Governments.

Mr. Mehta.—I am just giving you an instance.

Protection against internal competition.

President.—I think we have now gone over all those points and now I wish to hear your views as to what proposals you wish us to consider to give you protection against internal competition—not against the Swedish Match Company, but against your other Indian rivals.

Mr. Mehta.—As I have said, there should be an association.

President.—We cannot form the association. We will discount the points one by one. The first point is, how can we give you protection against your Indian competitors?

Mr. Mehta.—We don't want any protection against our Indian competitors.

President.—Are you quite sure?

Mr. Mehta.—Yes.

President.—If you are, I have nothing to say. But I have my own doubts about looking at your cost and the cost of some other people. Then what is your proposal as regards the Swedish Match Company in this country?

Mr. Mehta.—As I have said, an excise duty should be placed on them.

President.—On whom.

Mr. Mehta.—On foreign capital.

President.—They have got rupee capital in this country. It is a company registered in India.

Mr. Mehta.—It may be Swedish money.

President.—Supposing they raised the capital in this country by calling for subscriptions as is done in most industries, take the jute industry, for instance, which is largely managed by European firms with Indian capital. They may do the same thing.

Mr. Mehta.—Then the only alternative is that we should join hands with them.

President.—Take the case of the Assam Match Company. They have formed that company with Indian capital; they have got Indian directors and Indian shareholders. They carry out the law.

Mr. Mehta.—They always carry out the law.

President.—Then what are we to do? It is no use making any suggestions which we cannot put forward.

Mr. Mehta.—There is nothing to say against them if that be the case.

President.—I am asking you because the proposal has come from you. I am suggesting to you that the Swedish Match Company are a business corporation who know their business and they may be able easily to comply with the law, that there should be Indian capital, there should be Indian directors and many other things which Government may prescribe.

Mr. Mehta.—They may be nominal Indian directors.

President.—How is Government going to find that out whether they are mere nominees or not. You ask for an increase in the duty from Rs. 1-8-0 to Rs. 3. Are you serious about it?

Mr. Mehta.—Yes.

President.—On what grounds would you put it?

Mr. Mehta.—Even at the present moment 25 per cent. of the goods are being imported. We want to put a stop altogether to importation.

President.—Do you know what the imports were last year?

Mr. Mehta.—I have not got the figures.

President.—They were 3 million gross. They have come down to that figure from 6 millions.

Mr. Mehta.—Even now these 3 million gross matches are coming.

President.—Sufficient matches are not made in the country and therefore some must be imported. Supposing we are satisfied that the imports are vanishing very fast what good would the increased duty do?

Mr. Mehta.—Supposing all the imports are stopped.

President.—What then? They will manufacture 3 million more matches in India.

Mr. Mehta.—We want the imports to cease.

President.—Supposing the importations disappear with the duty of Rs. 1-8-0 as it stands at present.

Mr. Mehta.—It will not diminish for the simple reason that there are buyers who would insist on having Swedish matches with the duty at Rs. 1-8-0, but if it is increased to Rs. 3 then the consumer who has still got the prejudiced mind would be willing to buy Indian matches.

President.—India requires, say, 20 million gross—I don't know what the correct figure is—India can only manufacture 17 million gross just now. Therefore 3 million gross have got to come from somewhere, otherwise the price of the 17 million gross goes up. Is not that the position? When people want 20 million gross, you have only 17 millions to offer, therefore the price of the 17 million gross goes up. So that so long as India is not able to manufacture its full requirements the remaining 3 million gross matches must come from somewhere.

Mr. Mehta.—The 17 million gross which India is producing now is on one shift alone. If we have two shifts and others follow suit I am sure we would be able to manufacture the remaining 3 millions.

President.—What benefit are you going to get by this increased duty supposing imports of matches cease?

Mr. Mehta.—More Indian matches would be used.

President.—The Swedish Company will manufacture 3 million gross more in the country. They have got a capacity of 5 million gross for one shift and they will work half a shift more. What benefit would you get by it?

Mr. Mehta.—Still the whole country will be benefited and more Indian labour would be utilized.

Mr. Mathias.—Why do you put it as low as Rs. 3? Is there any ground for fixing the duty at that figure?

Mr. Mehta.—Rs. 3 would be the duty and the cost of material would be about Re. 1 and so it would have to be sold at Rs. 4-8-0. Those who are now paying Rs. 2-12-0 would have to pay Rs. 4-8-0. In those circumstances people would prefer to have Indian matches.

Mr. Mathias.—Would not your purpose be effected by putting a duty of Rs. 10 or prohibit it altogether? We have to frame our report on the line of discriminating protection not on the line of American protection which is to prohibit imports altogether. Our terms of reference prevent us framing a report on those lines. We have to find out what is a reasonable measure of protection.

Mr. Mehta.—Government should fix up an association as I have said by which matches will be supplied at a certain rate.

President.—Who is going to form this association?

Mr. Mehta.—The Indian match manufacturers.

President.—Why tell us if you can do it yourselves. What good could we do to enable you to form an association?

Mr. Mehta.—Government would say " you are to supply to the consumers at, say, Rs. 1-8-0 and nothing more ".

President.—Nor less.

Mr. Mehta.—Undoubtedly.

President.—And therefore Government must enquire into the whole question from time to time and say "as the costs have come down the prices must be lower or *vice versâ*.

Mr. Mehta.—It won't be in that way. By putting up the duty Government would put an excise duty on the Indian match manufacturers and they would get their revenue in that way. At the same time there would be a clause that the matches should be sold at a certain specified rate.

President.—Apart from the quality of matches?

Mr. Mehta.—No. There would be gradations. Each factory will have a ratio.

President.—What about the quality? Who is going to determine the quality?

Mr. Mehta.—The Board of the association will decide it.

President.—The question of quality is very important: how is the association to fix the quality of the matches?

Mr. Mehta.—By dividing the matches into three or four grades.

President.—In the case of steel we can define the quality precisely but as regards matches who can define the quality?

Mr. Mehta.—The Indian match manufacturers.

Dr. Matthai.—Have you talked over the scheme with the Match Manufacturers in Calcutta: Are they agreeable to it?

Mr. Mehta.—Yes. They say if the Swedish concern don't join us it would be impossible. I am also of the same opinion.

President.—Do you mean the combination will be formed between yourselves and the Swedish Match Company?

Mr. Mehta.—Yes. At the same time as Government are losing revenue out of matches they can put up the duty and make it protective and also levy an excise duty on matches made locally.

President.—Government only comes in when it wants an excise duty. Up to that stage you don't want the Government to step in? At what stage does Government step in? I want to understand what your views are. If you can form the association yourselves what can the Government do?

Mr. Mehta.—Government would get the revenue.

President.—Supposing Government does not want the revenue.

Mr. Mehta.—The idea of Government was that the revenue having dropped the question whether the duty should be reduced or should remain on as a protective duty, should be considered.

President.—Supposing there was a protective duty, what then? You were not here yesterday when I said what I had to say about the question of excise. That is a matter entirely for Government. Government has got to decide whether it wants revenue or not. Unless it wants any revenue from excise it has got nothing to do with this association. Is that the idea?

Mr. Mehta.—Yes.

President.—Then what is there to prevent you from forming this association yourselves by arrangement with the Swedish Match Company?

Mr. Mehta.—I was given to understand that they did approach a few Indian match concerns but their terms were rather ridiculous and they had to drop the idea.

President.—Now that everybody has seen that this sort of competition does not do, it might be simpler if the manufacturers themselves took action.

Mr. Mehta.—Yes.

President.—Are you contemplating taking any such action. Is there any movement on foot?

Mr. Mehta.—We, manufacturers, have expressed our views to the Indian Match Manufacturers' Association in Bombay and at the same time to our Indian Chamber of Commerce here as well.

President.—The Indian Chamber of Commerce, Bombay, is coming to give evidence before us and I wish to know whether you have consulted with them on that point.

Mr. Mehta.—Not the Chamber of Commerce there but the Calcutta Chamber. As far as we are concerned we have expressed our views to them through the Match Manufacturers' Association, Bombay.

Dr. Matthai.—You are not a member of the Indian Match Manufacturers' Association, Calcutta?

Mr. Mehta.—No, but we are members of the Association in Bombay.

President.—As you know we have issued a circular letter to all the Chambers of Commerce and the only Chamber of Commerce that is really going to give evidence is the Indian Chamber of Commerce, Bombay. It is a pity that this Association that you are talking about have not given their views. The Indian Merchants' Chamber, Bombay, will probably give evidence in consultation with the Indian Chamber of Commerce here.

Mr. Mehta.—The bigger factories are either with the Indian Chamber here or with the Indian Chamber, Bombay.

President.—The point is, you have been considering this circular letter?

Mr. Mehta.—Yes.

President.—We expect to hear the views of the Association when we examine witnesses next week.

सत्यमेव जयते

BANGIA DIASALAI KARJALAYA.

B.—ORAL.

Evidence of Mr. K. C. DAS GUPTA and Mr. U. C. GHOSE, recorded at Calcutta on Wednesday, the 9th February, 1928.

Introductory.

President.—Mr. Das Gupta, are you the proprietor of the Bangiya Diasalai Karjalaya?

Mr. Das Gupta.—No, Mr. U. C. Ghose is the proprietor.

President.—What are you then? Are you interested in this work in any way?

Mr. Das Gupta.—I am the manager of the Government Match Factory at Patna. Mr. Ghose is going to purchase it, and I am to be the manager of the firm.

President.—Have you brought down the machinery from Patna?

Mr. Das Gupta.—No; we will do that ere long.

President.—Is the factory situated at 69, Belgachia Road yours?

Mr. Das Gupta.—No. Our factory is at 37, Ultadingi Road. It was formerly located at Belgachia.

President.—You had your factory originally at Belgachia and you have since removed it to Ultadingi?

Mr. Das Gupta.—Yes.

President.—You are using the same machinery just now as you were using at Belgachia?

Mr. Das Gupta.—Yes.

Dr. Matthai.—And working on the same lines?

Mr. Das Gupta.—Yes.

President.—Are you manufacturing only splints?

Mr. Das Gupta.—No. Ours is a finishing factory. We buy splints and veneers and finish them. In the beginning when the factory was at Belgachia we wanted to make splints and veneers in our own factory but that factory was handed over to another party and we started this finishing factory at Ultadingi Road.

President.—Is that other man still manufacturing splints and veneers at the old place?

Mr. Das Gupta.—Yes.

President.—At present what are you doing?

Mr. Das Gupta.—Finishing matches as I told you. We purchase splints and veneers from another firm.

President.—From whom?

Mr. Das Gupta.—The Bengal Splint and Veneer Factory.

Dr. Matthai.—Where is it located?

Mr. Das Gupta.—It is our old factory at Belgachia, now called the Bengal Splint and Veneer Factory.

President.—What do you pay for your splints and veneers?

Mr. Das Gupta.—7 annas 6 pies per gross.

President.—How much do you pay for splints?

Mr. Das Gupta.—5 annas, and 2 annas 6 pies for veneer.

President.—What wood are the splints made of?

Mr. Das Gupta.—Generally of genwa.

President.—And you pay 5 annas per gross?

Mr. Das Gupta.—Yes.

Mr. Mathias.—Are these splints that you buy rejected splints?

Mr. Das Gupta.—No, they are first class splints.

Mr. Mathias.—Are the veneers also made of genwa?

Mr. Das Gupta.—Yes; sometimes we get them made of other wood also. For example there is another species of wood called *pituli*. But this is very rare; we get this only rarely (sample shown).

Dr. Matthai.—Is that an Indian wood?

Mr. Das Gupta.—Yes. The drawer and the outer cover of this sample are made of genwa, but the splints are made of *pituli*.

Dr. Matthai.—What is its botanical name?

Mr. Das Gupta.—Trewia nudiflora.

Dr. Matthai.—Where do you get it from?

Mr. Das Gupta.—It is available, as we understand from people supplying splints, in Calcutta suburbs and in the villages of Bengal.

Dr. Matthai.—What is the present capacity of your factory?

Mr. Das Gupta.—200 gross per day.

Dr. Matthai.—Are all the splints and veneers required for 200 gross a day obtained from the Belgachia factory?

Mr. Das Gupta.—Yes.

Mr. Mathias.—Are these waste veneers?

Mr. Das Gupta.—No; they are first class veneers. We never buy waste veneers.

Dr. Matthai.—Do the people at Belgachia sell splints and veneers to other cottage factories?

Mr. Das Gupta.—Probably they do.

President.—To these small cottage factories?

Mr. Das Gupta.—Yes.

President.—What do you do by way of finishing?

Mr. Das Gupta.—We do all the usual processes. First of all we level the splints, then we fill the frames; then there is paraffining, dipping, drying, emptying the frames, etc. As regards box veneers, these are distributed to people outside with paper and paste and they wrap them up and bring the boxes to us.

President.—The splint side of the work is done in the factory itself?

Mr. Das Gupta.—Yes.

Mr. Mathias.—Have you any factory building specially erected for the purpose?

Mr. Das Gupta.—No.

Mr. Mathias.—Is manufacture carried on in an ordinary house?

Mr. Das Gupta.—Yes. We have rented a separate house in which we do all this work.

President.—How many people do you employ in that house?

Mr. Das Gupta.—About 60.

President.—Does not that make it a factory?

Mr. Das Gupta.—No.

President.—You use no power at all, do you?

Mr. Das Gupta.—No. Everything is done by hand.

Costs.

President.—Could you tell us how much it costs you to convert these splints into matches?

Mr. Das Gupta.—We have not adopted that sort of costing yet. We have got the cost of the whole manufacture.

President.—As regards veneers you pay by the piece, do you?

Mr. Das Gupta.—Yes.

President.—How do you pay?

Mr. Das Gupta.—We pay 10 annas per thousand, for making boxes.

President.—For side painting how much do you pay?

Mr. Das Gupta.—This is done by a man who is paid per day. We pay him at Rs. 25 a month, that is about Re. 1 per 200 gross.

President.—For box filling?

Mr. Das Gupta.—One anna per gross.

President.—For packeting?

Mr. Das Gupta.—3 pies per gross—that is for 13 parcels: 12 dozen packets and one gross packet.

President.—What is the amount you spend on your labour for the making of splints into matches?

Mr. Das Gupta.—As I told you we have no accurate record of it but I might give the following as an approximate estimate of cost under different heads:—

	Per gross.		
	Rs.	A.	P.
Levelling and frame filling	0	1	0
Paraffining and dipping	0	0	6
Frame emptying	0	0	3
Box making	0	1	6
Side painting	0	0	1
Box filling	0	1	0
Packeting	0	0	3

President.—That is altogether 4 annas 7 pies for the labour. What about chemicals, papers and other things?

Mr. Das Gupta—

	Per gross.		
	Rs.	A.	P.
Paper and labels	0	2	6
Chemicals	0	4	6
	0	7	0

Mr. Mathias.—Does that include the paraffin?

Mr. Das Gupta.—Yes. Then there is label pasting. That would be about 3 pies. Of course this includes the paste.

President.—That makes a total of Rs. 1-3-4?

Mr. Das Gupta.—Yes.

Mr. Mathias.—Do you do any gross packeting?

Mr. Das Gupta.—Yes.

Mr. Mathias.—What rent do you pay for the house?

Mr. Das Gupta.—Rs. 50 per month.

Mr. Mathias.—How many gross do you make in a month?

Mr. Das Gupta.—About 4,000 to 5,000 a month.

President.—House rent comes to 2¼ pies per gross?

Mr. Das Gupta.—Yes.

President.—What other expenses have you got?

Mr. Das Gupta.—Tax, lighting charges, choukidar's wages.

President.—How much do these come to?

Mr. Das Gupta.—Between Rs. 45 to 50 a month.

Mr. Mathias.—Does that include insurance?

Mr. Das Gupta.—No.

President.—That brings the total altogether to about Rs. 1-3-9.

Dr. Matthai.—Have you any selling expenses?

Mr. Das Gupta.—We have no selling expenses. We sell the matches straight to the parties and they pay us after a fortnight or a month.

President.—How much do you get now for your matches?

Mr. Das Gupta.—It ranges between Rs. 1-6-0 and Rs. 1-7-0.

President.—Then it is not a bad thing for you; you make about 2 to 3 annas a gross?

Mr. Das Gupta.—We cannot make 2 to 3 annas a gross.

President.—Why not?

Mr. Das Gupta.—Because we have to engage some people for supervision.

President.—How much have you got to add for supervision?

Mr. Das Gupta.—About Rs. 150 per month.

Mr. Mathias.—How many men does that cover?

Mr. Das Gupta.—Three men, one for keeping accounts, one man for supervision and the other for marketing.

Mr. Mathias.—You pay them Rs. 50 each?

Mr. Das Gupta.—No. The sum total of the amount comes to Rs. 150 per month.

Mr. Mathias.—That would be about 7½ pies per gross?

Mr. Das Gupta.—Yes, it may be so.

President.—How much capital have you invested in the business?

Mr. Das Gupta.—About Rs. 15,000.

President.—What was this Rs. 15,000 invested on?

	Rs.
2 frame filling machines at Rs. 750 each . . .	1,500

President.—Are these Japanese machines?

Mr. Das Gupta.—Yes. Then we have:—

	Rs.
1 levelling machine	250
2 frame emptying machines	700
Paraffining and other heating arrangements . .	450
Dipping machine	150
Frame racks (25)	600
Frames (about 600)	1,200
Emptying, side painting and box filling trays . .	500
Drying chamber	400

President.—Have you got a drying drum?

Mr. Das Gupta.—No.

President.—Is it a masonry chamber?

Mr. Das Gupta.—It is made of asbestos sheets. Then we have a chemical grinder costing Rs. 150, and furniture and other appliances costing about Rs. 1,500.

President.—That is a total of Rs. 7,400 and I suppose you require about Rs. 7,500 for working capital?

Mr. Das Gupta.—Yes.

President.—Is that your own capital?

Mr. Ghose.—Yes.

President.—Making no allowance for depreciation and for interest on your capital your costs amount to Rs. 1-4-4¼.

Mr. Das Gupta.—Then, there is the remuneration of Mr. Ghose.

President.—Mr. Ghose is apparently thrown in in this price. If you get Rs. 1-6-0 or Rs. 1-7-0, you can just manage.

Mr. Das Gupta.—Very barely.

President.—What do you propose to do because the costs of the bigger factories are lower than yours?

Mr. Das Gupta.—It will be better for us to leave this question to you to decide.

Mr. Mathias.—There must be reasons for the action you wish us to take.

Mr. Das Gupta.—We would demand such measures to be taken as would make their costs higher than ours by about four annas.

President.—What do you suggest we should do? Your costs are higher than theirs.

Mr. Das Gupta.—Yes, and we have also one further disadvantage. With the small capital at our disposal, we cannot afford to wait for the payment after a fortnight or so. That is a disadvantage which is keenly felt by all of us. Unless there is a difference of at least 4 annas between our costs of production and those of the factory workers, there is no chance of our surviving.

Cottage industry and factories.

Mr. Mathias.—Would you call yourself a cottage industry?

Mr. Das Gupta.—Yes.

President.—What are we to do? Could you suggest anything? Could you really expect to compete against factories with four annas difference?

Mr. Das Gupta.—Yes.

President.—How are you going to get that? What do you suggest we should do?

Mr. Das Gupta.—I cannot find any means that might solve this problem.

President.—You are quite frank. I confess I see some difficulty myself and I just want to know in what way we can make proposals so that you can be helped. Is there anything that you can think of? What can you do if the factories undersell you? What can Government do? Can they prevent the factories from doing that?

Mr. Das Gupta.—You can easily demand an excise on the production of factories.

President.—Somebody will have to pay four annas more to enable you to carry on?

Mr. Das Gupta.—Let the middlemen pay it.

President.—How?

Mr. Das Gupta.—The consumer won't pay anything more. My point is this. Even if there is a difference of four annas between the cost of production of the cottage workers and that of the factory workers, the consumer will not have to pay anything more. As the matter stands now, our cost of production is about Rs. 1-7-0, and if an excise duty is levied on them, it will have to be such as to enhance their cost to Rs. 1-11-0.

President.—Supposing their costs are Rs. 1-3-0 and yours Rs. 1-7-0, you suggest that Government should put an excise duty of four annas on them, don't you?

Mr. Das Gupta.—No; what I suggest is that the excise duty which would be imposed on them should be such as to make a difference in the cost of production in our favour to the extent of four annas.

President.—Supposing Government does not want any excise duty?

Mr. Das Gupta.—Then, of course we have to find some other means.

President.—An excise is a revenue duty. Government may not want any revenue from this source. Can Government levy this duty simply for the purpose of helping the cottage industries?

Mr. Das Gupta.—That is a matter for Government. I cannot say whether Government can or cannot. But what we feel is that a protective excise is needed quite apart from revenue consideration.

President.—I am only asking you for your opinion. We are considering that proposal. Can we ask the Government to do it? Government may say "we don't want the revenue".

Mr. Das Gupta.—That you can ask. I have no reason to believe you that it would be refused. The fact is that cottage production employs 66 per cent. more labour than the industry on factory lines does.

President.—At 4 annas more cost?

Mr. Das Gupta.—Yes. This distributed capital which we are going to work with benefits a larger population.

Mr. Mathias.—Surely a very small part of the population?

Mr. Das Gupta.—By population, I don't strictly mean the population of the country but the population engaged in the industry just now. What I want to say is this that if it is not possible to impose an excise on factories, the people working on cottage lines will lose their means of livelihood till they get some other job.

Mr. Mathias.—How will they be worse off than they are at present?

Mr. Das Gupta.—They are earning now.

Mr. Mathias.—There is no excise now on the output of Indian factories.

Mr. Das Gupta.—We shall not be able to continue if there is no safeguard for us factories because our cost of production is too high at present. If there is no way of giving them time to organise then the cottage workers cannot survive.

Mr. Mathias.—On the other hand, if an excise duty of four annas or whatever it is, is levied, the result will surely be that the dealers who will be selling the matches produced by factories will be induced to sell more and more your matches.

Mr. Das Gupta.—Yes.

Mr. Mathias.—That would mean that in course of time the cottage industry would supplant the big factories which would go into liquidation? You will start more cottage industries.

Mr. Das Gupta.—This could not take place so rapidly as to become really a danger, there would be time to deal with it.

Mr. Mathias.—On what grounds?

Mr. Das Gupta.—Because the output of the cottage industry is small or a hundred such industries may have a joint output of less than half of that of a big factory.

Mr. Mathias.—Still I don't understand, if we put on an excise duty of four annas, how that would not result in all the custom going to the cottage industries and therefore in the number of cottage factories increasing and big factories going out of existence. It seems natural. That is really what you are aiming at?

Mr. Das Gupta.—That is not so. I don't really understand what real danger they would run.

Mr. Mathias.—The difficulty is obviously this. If an excise duty is levied on all the large factories, then the middlemen who are selling their matches to-day and making more profit, will, if they continue, be getting only a smaller profit.

Mr. Das Gupta.—Yes, but the time when the cottage industry could supply the demand need not be thought of at present.

Mr. Mathias.—Therefore it is to the interest of the middlemen to sell more and more your matches and less and less the matches produced by big factories, with the result that the latter will reduce their output.

Mr. Das Gupta.—That they won't do, because the demand has to be supplied somehow.

Mr. Mathias.—The big factories will be losing more and more money.

Mr. Das Gupta.—By the constant improvement of machinery they are constantly reducing their cost. Their money won't be lost and they can afford to wait for a certain time to get back their money.

Mr. Mathias.—They would lose their interest on it.

Mr. Das Gupta.—Yes, if they give credit.

Mr. Mathias.—They will lose that, won't they?

Mr. Das Gupta.—They can afford to do that.

President.—Supposing we put an excise duty of four annas on all big factories and their cost comes down by four annas, do you want the Government to increase the duty to eight annas?

Mr. Das Gupta.—All measures are temporary in their nature and will have to be reconsidered in the light of developments.

President.—In the cottage industry, you cannot effect much economies as they can in a big factory, can you?

Mr. Das Gupta.—If it is a question of economy which may come subsequently, it may be by co-ordination.

President.—There is nothing in common between you and the big factories.

Mr. Das Gupta.—Take the case of timber. These people are in a position to purchase timber in large lots so that the cost of timber may be cheaper to them. The probable methods of economy that may be adopted must be definitely known before the prognosis is declared.

Dr. Matthai.—I don't quite follow you. Supposing they are able to buy their wood cheaper because they are buying in larger quantities, that is an advantage that you are not likely to have.

Mr. Das Gupta.—I want some specific instances in which they can effect economies.

Dr. Matthai.—Take this particular point that you have mentioned. They buy all their raw materials in larger quantities than you do, and therefore their costs must be cheaper.

Mr. Das Gupta.—As regards timber and other raw materials we can also form a co-operative organization.

President.—You are competing with manual labour against machinery. Machinery can always bring down costs whereas you cannot. They can by the use of better machinery, increase their output which you cannot do. Human muscles cannot go beyond a certain point.

Mr. Das Gupta.—Our strength must be in co-operation and that the cottage industry, like for instance spinning, can employ people who would not work in a factory and so can get cheap labour.

Mr. Mathias.—I don't quite follow the grounds for such a differentiation. Would you call Esavi Match Company a moderately big factory?

Mr. Das Gupta.—Yes.

Mr. Mathias.—The processes in the Esavi factory are almost exactly the same as the processes described by you in your factory. They employ hand labour to a very large extent; they give employment to hundreds of the same class as you employ. Then why should we differentiate against those people in your favour? That is what I don't understand. I don't follow the reason.

Mr. Das Gupta.—They are working on a larger scale with more capital.

Mr. Mathias.—They have no more advantages than you would have if you were to organize yourself on a large scale. Then we also should cease to be a cottage industry.

Mr. Das Gupta.—If we are able to have a co-operative organization in Calcutta for all the cottage workers we could collect capital and purchase chemicals and other things in lump and we can thus meet the situation.

Mr. Mathias.—Until you have taken some action of that kind surely it is rather premature to suggest that there should be differentiation between you and other factories who adopt similar processes as yours.

Mr. Das Gupta.—It is just at this stage that we require the protection to enable us to take the steps that would allow us to survive.

Mr. Mathias.—Supposing it is put to you that you will not survive because you are not sufficiently organized?

Mr. Das Gupta.—I don't agree with you on this point. We are organized to this extent at least that we are manufacturing matches but we are struggling against odds, and we apprehend that unless we have some differentiation for our safeguard against big capitalists, big organized factories with modern up-to-date equipment, we cannot stand. We apprehend that and we frankly place our demand before the Board for your consideration.

Mr. Mathias.—I still don't quite follow the grounds for differentiating between you and the Esavi factory for instance.

Mr. Das Gupta.—On the ground that their cost of production is cheaper and we cannot make our cost of production as cheap as those people.

Dr. Matthai.—Your position really is this, that on the present costs, in order to enable you to carry on, you want some kind of temporary relief in the form of excise if an excise is to be levied?

Mr. Das Gupta.—I am not particular about excise. If there is any better method to give us assistance that better method may be adopted. I simply place before you our demand for some sort of assistance either in the shape of excise or anything else. You are competent enough to think out some method which may save the cottage workers.

President.—We are doing our best to think out something, but it is difficult, is it not?

Mr. Das Gupta.—We expect you will be able to find a solution for those difficulties.

Probable disappearance of cottage factories.

Dr. Matthai.—Supposing we were not in a position to suggest any relief to the cottage workers what would happen to them?

Mr. Das Gupta.—They will disappear.

Dr. Matthai.—Are they disappearing gradually in Bengal?

Mr. Das Gupta.—Yes. Many have disappeared.

Dr. Matthai.—Are you speaking from personal knowledge?

Mr. Das Gupta.—Yes.

Dr. Matthai.—Was that because they were not able to compete with the large capitalists?

Mr. Das Gupta.—Yes.

Dr. Matthai.—The difficulty is this. Supposing we did give you some kind of relief, even then after a few years you might still disappear because their cost might come down?

Mr. Das Gupta.—Yes. It is not possible to foresee what may happen in the future but so far as the present position is concerned we can tell this much that if there is no relief given to us, there is no chance of these cottage workers surviving. That is my frank opinion. I don't know what difficulties may arise in the future, but if we can now emerge from the difficulties we shall be able to carry on. When that time comes we hope we shall be able to find out some method to fight against it.

Dr. Matthai.—Are you personally acquainted with cottage workers in Calcutta?

Mr. Das Gupta.—Yes.

Dr. Matthai.—How many people are engaged in the Calcutta area in the cottage industry?

Mr. Das Gupta.—About 4,000.

Dr. Matthai.—Do you mean in the cottage factories?

Mr. Das Gupta.—Yes. I may tell you that in connection with our factory alone there are about 120 persons working in their own houses.

Mr. Mathias.—Any proposed differentiation between cottage factories and larger factories will have to be a permanent measure of relief which will have to be maintained always, will it not?

Mr. Das Gupta.—No. It may be that a time may come when no further relief might be found necessary.

President.—What position do you expect to be created? In what direction could you expect any economy?

Mr. Das Gupta.—We may have different factories for different parts of the work. For example the inner cases may be produced by one factory, splints may be manufactured by another, veneers by another factory and so on and in this way the capacity and efficiency may increase.

President.—That thing has been tried in Japan but it has failed.

Mr. Das Gupta.—We know that it did not succeed very well but we do not know what the reason was for the disaster.

President.—The only reason was that they could not produce their matches as cheaply as the big factories. That is the only reason one can see. It is manual labour against machinery.

Mr. Das Gupta.—I cannot fully agree with that.

President.—I am not asking you to agree with me in anything. I am only stating to you a fact. That has happened in Japan and it has gone out of the market, and its place is being taken by those people who are using more and more machinery even in Japan itself. Why should we make the same mistake as Japan made?

Mr. Das Gupta.—Could we possibly compare the conditions in India with those of Japan? The conditions of the ordinary class of people here, the standard of living and so on, are all so different.

President.—You will admit that the Japanese labourers will be at least as intelligent as the Indian.

Mr. Das Gupta.—How can we put forward a comparison between the conditions of Japan and India. I don't think I should make any remark against this question on a comparative basis.

Dr. Matthai.—You are working on a fairly big scale compared with cottage factories.

Mr. Das Gupta.—Ours is a cottage industry but, of course, there are smaller ones.

Dr. Matthai.—And the thing is done in a building set apart for manufacturing purposes?

Mr. Das Gupta.—Yes.

Dr. Matthai.—But generally you find that in Calcutta they are doing it in their own houses.

Mr. Das Gupta.—There are very few of these.

Dr. Matthai.—Take the case of a man doing say 30 gross a day. He buys splints and veneers and mixes the chemicals and does the dipping in his own house. That is generally the position of the small factories in the Calcutta area.

Mr. Das Gupta.—That is not the general position.

Dr. Matthai.—What is the general position?

Mr. Das Gupta.—These people do not mix the chemicals and dip the splints in their own houses.

Dr. Matthai.—Then?

Mr. Das Gupta.—They have a separate house for that. Simply the box filling and that sort of thing are done in the house.

Mr. Mathias.—In a separate room?

Mr. Das Gupta.—In a separate house, sometimes.

Mr. Mathias.—In the case of smaller factories which I have seen in Calcutta there are separate rooms in the house where they do it.

Mr. Das Gupta.—They do that in separate houses.

President.—Supposing there is a 4 annas discriminating duty between you and the factory owner. Mr. Ghose is a cottage worker. You say to Mr. Ghose, "You make splints and veneers next door and here I will finish the matches and the boxes". In that way whatever is now manufactured in one place may be manufactured in two places. Take the Esavi factory for instance. One of his partners will manufacture next door and say to the other, "You buy these splints and veneers and finish them in your place". Is there anything to prevent them from doing so? If you were to exempt splints also from all excise.

Mr. Das Gupta.—We should be only too pleased if this could happen; it would be the very thing India wants under the present condition giving more people employment and industrial training as it would tend to keep the industry to cottage methods. We do not however anticipate that it would happen because it would increase costs.

President.—How can it be controlled? I am asking you this question. What will be there to prevent Mr. Ghose from having his splint factory and veneer factory and giving you the splints and veneers next door. They are two distinct establishments. You say to each other, "There is the 4 annas benefit which we will share". The others may do the same thing. That is a very easy thing to do, is it not?

Mr. Das Gupta.—This has been answered, we should not want it controlled.

President.—You say that yours is a cottage factory, and therefore there must be a 4 annas excise duty which should be levied on matches produced in big factories and that you should be exempted from that on the ground that you are a small factory. Mr. Esavi tells Mr. Mehta—let us say, as an illustration—"I will manufacture splints and veneers and you finish the boxes in five different houses all adjoining each other, manufacturing 200 gross in each house".

Mr. Das Gupta.—The position will be the same for us all.

President.—How are you benefited then?

Mr. Das Gupta.—I should not be benefited then except that I should cease to be at a disadvantage.

President.—Their cost will be very much less because they manufacture with the help of machinery.

Mr. Das Gupta.—If they manufacture splints and veneers and install small factories on home industry lines then there will be so many small factories that their cost will be increased. What they will gain in the manufacture of splints and veneers they will lose by establishment of so many small units of manufacture, and hence they are not likely to undertake it.

President.—Why should they be small units? They will have ten rooms.

Mr. Das Gupta.—That will add to their cost of production as I have already stated.

Mr. Mathias.—Dipping is done in ten rooms for instance; that does not mean that they will have 10 different establishments. The other processes will be carried out in the factory.

Mr. Das Gupta.—Each such unit must have separate production, and they must have separate supervision for these different things. How can they avoid that? Of course if they take some unfair means there is no help for it.

We cannot suggest anything to prevent any unfair methods. But if everything is fair, how can they avoid having different establishments?

President.—Supposing we were to recommend an excise duty to give you a little preference, we must be able to show to Government that a time will come when you will be able to do without the excise duty.

Mr. Das Gupta.—The time may come. We have experience of reduction of cost by about 6 annas in past two years' work. Two years ago the cost was Rs. 1-12-0 against Rs. 1-6-0 of to-day.

President.—We can't say "it may come"; we must say "it will come". We must show it by figures and say "here are Mr. Das Gupta's figures to show that the costs will come down from Rs. 1-6-0 to Rs. 1-2-0."

Mr. Das Gupta.—We are not in a position to declare one way or the other. We can only say that it may or may not.

President.—If you say it may or may not, Government will say "it will not" and nothing can be done.

Mr. Das Gupta.—It is as difficult to establish "will not" as to establish "will". But from our past experience we are inclined to support the latter probability.

President.—We have got to show them figures from which they can see.

Mr. Das Gupta.—If we are saved now and can live and come to such a position then and then only we can declare the prognosis but without figures we cannot declare anything definitely.

Dr. Matthai.—Is there any item in your costs in which you expect to make a reduction in the future?

Mr. Das Gupta.—That depends upon certain conditions.

Dr. Matthai.—Can you say generally whether there are any items in which you can effect any economy?

Mr. Das Gupta.—Splints and veneers can be had at a cheaper rate.

Dr. Matthai.—That is the only item?

Mr. Das Gupta.—Yes. Also in other raw materials if we can organise a co-operative buying system for our benefit.

President.—That is nothing to you. That is the work of the factories. If their costs of splints and veneers are lower their cost of matches will also be lower.

Mr. Das Gupta.—The percentage of difference will remain the same.

President.—How are you going to reduce the difference? That is the point.

Mr. Das Gupta.—I cannot imagine what may specifically happen in the future so I cannot answer that.

President.—You are making this proposal and we have got to examine you. Therefore it is for you to satisfy us by saying "here are the directions in which we can effect economies".

Mr. Das Gupta.—We cannot say what is going to happen in the future. We are simply waiting and expecting increase of efficiency and of the workers.

President.—I am just trying to point out to you that we have got to explain to Government, but you are not able to assist us. We have to explain to Government that here is this 4 annas excise duty which should be levied but it will be only for a short time because we think the costs will come down in such and such directions. But you have not shown us the way in which we can make that statement.

Mr. Das Gupta.—Mr. Ghose suggests that in the near future we can take a stand and organize some splint and veneer factories also.

President.—How will that help you? Because if you organize splint and veneer factories the cost of the big factories may also come down. You cannot invent anything by which your splints can be made cheaper for you than the big factories can make them for themselves.

Mr. Das Gupta.—That is true. Mr. Ghose's idea is this, if such factories are worked by those who are now doing the finishing on cottage lines then

the marginal profit which the splint factories are now getting will be earned by themselves.

Mr. Mathias.—They are not making very much profit on their splints.

Mr. Das Gupta.—This is not with reference to the present conditions. This is only a speculation as regards the future.

Mr. Mathias.—At present there is not room for much reduction in the cost of splints?

Mr. Das Gupta.—In any case they have a share of profit in selling their splints and veneers.

Mr. Mathias.—The profit must be very small.

Mr. Das Gupta.—It is not nothing.

President.—Whoever make splints and veneers will expect to make some profit; why should he sell them to you without profit?

Mr. Das Gupta.—If such an organization as suggested by Mr. Ghose comes into being it will manufacture splints and veneers by cottage factories for themselves and the profit would come back to them.

President.—How can they make them cheaper than big factories?

Mr. Das Gupta.—They will manufacture them in the forest for people working on cottage lines.

President.—Anyone who manufactures those splints for you will try to make some profit out of it.

Mr. Das Gupta.—Our proposal is this, that these splints and veneers will be manufactured by the organization which conduct the cottage industries.

President.—They will also require some profit just as other splint and veneer manufacturers.

Mr. Das Gupta.—At present the cottage workers are purchasing their splints and veneers, but if the splints and veneers are produced by the organization the profit would only benefit them.

President.—Why?

Mr. Das Gupta.—Because the profit is now going to other people. If we have this organization it will be identical with ours.

President.—Quite so. If you extend your operations you would expect to make some profit for the extension, won't you?

Mr. Das Gupta.—Yes.

सत्यमेव जयते

Bihar and Orissa.

The Puri Match Industries Company Limited, Puri, Bihar and Orissa.

Representation, dated 29th December 1926.

In reference to letter No. 16041-42, dated Patna, 20th December 1926, of the Director of Industries, Bihar and Orissa, forwarding us a copy of the Press Communiqué regarding the Match Industry in India, we have the honour to bring to your kind consideration the following among other facts:—

The Match Industries in India, as we have found from our experience of these five years' certainly satisfies the three conditions mentioned in paragraph 97 of the Report of the Indian Fiscal Commission.

The industry possesses natural advantages; match wood is very abundant in our parts of the country. The Government forest in Balugaon and Chandaka in the District of Puri can supply any amount of match wood, that can be consumed during the year. As a matter of fact, we are using these woods in our factory for the last five years. Mr. A. P. Ghose, the Match Expert, employed by the Government of Bihar and Orissa to investigate into the possibility of successful Match Industry in this province, clearly testifies in his report submitted to the Government, that the Balugaon and Chandaka forests can supply match wood in any quantity and ours is the only Match Factory in the District of Puri.

Mr. Hubback, the Commissioner of the Orissa Division, who kindly paid a visit to our factory, moved the Forest Department for having match wood cultivation in one area and we are gratified to learn that the Forest Department have since begun such cultivation for our purposes. When that is accomplished, the supply of match wood to our factory will be satisfactorily solved.

We now employ one oil engine of 6 H.P. for our purposes of producing 20 gross of matches per diem and this power is even sufficient if the daily output becomes fourfold, as we intend to do very shortly when we get the Frame Emptying and Sawing Machines from Mr. A. Roller & Co., Berlin. This engine consumes only half a tin of crude kerosene oil for working eight hours daily and managed by one of our workers getting Rs. 15 per month. This arrangement is very cheap and it will be cheaper still, when we increase our daily output.

The labour we employ is more than sufficient for our purpose. Although the wages of manual labour has gone on high in recent years, the high caste people such as Brahmin and Karan middle class people are most reluctant and feel it beneath their dignity to serve on high wages. But they are eager to serve in a factory on a low salary varying from Rs. 7 to Rs. 12 a month and we are employing 16 such persons in our factory and many more are available whenever we want them.

We are practically selling all our products in the local markets and some merchants of Cuttack and Balasore are also patronising our factory. We sell our finished matches at Re. 1-8 per gross and this is the lowest rate in the market.

The Government of India was pleased in the year 1910 to enquire into the future prospects of the Match Industry in India and a report was consequently submitted to the Government. That report is bold enough in its recommendations that this industry has a very bright future before it. But as the big foreign match concerns of Sweden and Japan were practically sweeping the Indian market, it was thought desirable in the interest of Indian Match Industry to protect it by imposing heavy import duties. Ours is one of the indigenous match industries that cropped up in consequence of this import duty and is heading its way to success through vicissitudes of its career. In the report above referred to, we find that the prospects of Match Industry are so great, that we can very easily compete with foreigners and can export matches to foreign countries. If Sweden employing Siberian match wood

brought from Siberia, a distance of 200 miles, could easily compete in the Indian market, it will be very easy for any Indian firm like ourselves employing local match wood and cheap labour to face world competition and eventually to be able to stand alone if the present protection is given to the industry to grow in the meantime.

We desire to claim protection for the industry in India and we also consider that the present rate of duty *qua* revenue duty should be maintained. We hope, we have satisfactorily shown above that our industry comes under the three conditions mentioned in paragraph 97 of the Fiscal Commission Report.

The Government of India was pleased to impose an import duty which rose to its present expanse on finished imported matches only in order to protect indigenous Match Industry. The foreign capitalists, finding no way out, wanted to avoid the duty and instead of importing finished matches, imported splints and veneers to India and turned them into finished matches in this country and sold them at a cheap rate. The Government in order to check this method on the part of the foreigners, imposed another duty on the imported splints and veneers. In this way the foreign importation was effectively checked and indigenous match industry got a very fair field before it and many factories cropped up being fortified by the protective duty.

But the foreign capitalists were not idle in the meantime: they were planning altogether a new method by which they can safely avoid the duty and at the same time they can make enormous profit by their trade. They thus employed their capital in establishing various factories in India and thus avoided the duty and made enormous profits, whereas the indigenous firms could not compete with them. Thus the very persons whom the Government wanted to check by the imposition of the protective duty and thereby to facilitate the way for the indigenous match industry, got the better of it at the cost of the firms that employed local capital.

An industry is truly called indigenous that employs indigenous (1) capital, (2) labour and (3) raw material. Judging from this standard the firms that have recently been established in this country with foreign capital by any stress of imagination cannot be called indigenous and our Government is in no way justified to protect them at our expense.

In our humble opinion the match factories that are now working in India can be classed under two distinct heads, *viz.*, those that employ foreign capital and those that employ Indian capital. A statement showing the location of match factories should be made under these two heads and the amount of daily output should also be stated against the name of each such firm. When that is done, the loss to Government revenue now made as a result of the imposition of the protective duty should be made up by taxing those factories that employ foreign capital by rateably distributing the amount of loss among these factories in proportion to their daily output. The factories that are truly indigenous will thus be protected without any loss to the Government revenue and when after some years the indigenous firms grow in strength to face world competition, then, and then only, there will be an occasion for the Government to consider whether the indigenous factories will be taxed.

As a special case, we beg to submit that we began our concern five years ago with a very small capital and produced matches to a very limited extent with a crude machine. Being emboldened by the protective duty and the sympathy that was evinced by the Department of Industries of our province we began to raise our capital by registering our company under the Indian Companies Act, 1913, and floating shares. We also approached the Government of Bihar and Orissa for an aid under the Bihar and Orissa State Aid to Industries Act, 1923, and our Government being fully satisfied by our work and the very fair prospects that lay before us was pleased to grant us State Aid on the hire purchase system and thus supplied us very useful machines from Mr. A. Roller, Berlin, Germany. Seeing our daily output and the interest the Government of the Province took in the matter local rich public subscribed many shares of our company. We built a commodious house for the location of the factory and began to establish our concern on a sound

business basis. Many high Government officials such as the Hon'ble Minister, the Accountant General, the Commissioner of the Orissa Division, so kindly and sympathetically visited our factory and were fully satisfied with our working and promised all possible help.

We have already employed Rs. 20,000 in our business and our Government has again promised to supply us some machines from Mr. A. Roller, Berlin, at a cost of Rs. 2,000. The Forest Department has undertaken match wood cultivation from this year and we find no difficulty now to procure local match wood at a very moderate price.

We are now selling our matches at a very cheap rate in the local market. But all this is due to the protective duty so kindly imposed. We have undertaken this concern only for a protective duty and if this duty is reduced or withdrawn, our concern will be nowhere and we will be quite unable at this stage to face world competition and cannot fulfil our obligations with our Government. We see a very bright future for our industry at no distant date and so we press for the maintenance of the present protective duty at any cost.

Under these considerations, we most respectfully beg to pray that you may be pleased to put our case before your Board for consideration. We are ready to send a representative to you for examination, if that is considered necessary.

Government Domonstration Match Factory, Bihar and Orissa.

(1) *Letter dated the 12th May 1927.*

I have the honour to send herewith the replies to the Tariff Board's questionnaire in seven copies. I regret the delay in sending same which was unavoidable on our part.

Introductory.

1. The firm represented was established on 28th July 1925. It is the Demonstration Match Factory of the Government of Bihar and Orissa.

2. The capital invested is entirely Bihar and Orissa Government's. There is no European employed in the Factory.

3. The whole process of manufacture is going on in the factory.

4. On the 8th January 1926.

5. About 100 gross per day.

6. The dimension of the match boxes manufactured is $2\frac{1}{2}'' \times \frac{1}{8}'' \times \frac{5}{8}''$ ($\frac{1}{4}''$ size).

Each box contains 63 matches average.

7. Actual output is 2,000 gross per month average.

8. Gulzarbagh, Patna

(*a*) Not in vicinity.

(*b*) Yes.

(*c*) Yes.

(*d*) Yes.

In selecting the site of a factory the most important factors to be considered are :—

1. Easy and sufficient supply of suitable wood in green state and at low cost of transport.
2. Easy Railway or Steamer communication with some port city and market.
3. Easy water supply.
4. Availability of labour.

9. (*a*) Yes, in neatness of splints and boxes the Indian manufactured matches with local wood falls far short of the standard of imported matches.

(*b*) Apart from the question of quality, generally the markets are often prejudiced at the price of Indian matches. General tendency is to get the cheapest matches.

(*c*) A difference of about Rs. 1-2 per gross might represent a fair measurement of the difference and a little further difference by one anna more would probably be sufficient to overcome the prejudice against Indian matches, because the consumers pay 4·5 pies for a box of imported matches against 3 pies for local article.

Raw Materials

10. No.

11. Wood used in the manufacture of—

(*a*) Splints is Trowia Nudiflora and Bombax.

(*b*) Veneers is Odina Wodier and Bombax.

(*c*) Packing case not manufactured in the Factory

12. The Indian wood is not as satisfactory as imported wood. They are inferior to imported wood in respect of—

(1) Smooth and fineness of grains,

(2) Strength,

(3) Colour

and (4) General growth. They are mostly uncared for and wild with knots, bends, cracks and hollows and scarcely grown or reared to suit particularly for manufacture of matches incurring high percentage of wastage. This will improve if the Forest Department will begin nursing growth of these wood.

13. Annual requirement of wood is 12,000 cubic feet to 15,000 cubic feet.

14. About 40 cubic feet of wood is required for manufacturing 100 gross.

15. The dimension of the packing case used is $34\frac{1}{2}'' \times 25'' \times 22''$ and contains 00 gross. 2 cubic feet of planks are required to make one case.

16. The factory draws its main supply of wood from Nepal Terai forest, Bagaha—which is about 150 miles away from the factory. A map is herewith sent showing the site of the factory and the forest area.

17. The Bettiah State supplies the wood. From the forests the wood is carted to the river side and then made into raft and floated down. In case of wood which do not float they are transported by slinging on either side of boats.

18. Supplier is the owner and price includes everything—the rate includes a Royalty of annas . . . .

19. We have no details under the heads referred to. The cost per 50 cubic feet at the factory is Rs. 35 (last year's average).

20. We buy wood and the questions do not arise.

21. No, the supply* in quality is often noticed. The deterioration of wood is generally due to storing after felling to assemble them in number sufficient for despatch at a batch for convenience and minimising the cost of transport. They are hardly available fresh after felling.

22. No, the supply of wood is not yet found to be constant in respect of quantity. The supplier complains difficulty of felling in the forest due to Horse flies during the rains and flood and rise of river interrupts regular transport throughout the year.

(*a*) No.

(*b*) No.

---

* (The supply of wood is not constant in respect of quantity but deterioration.)

(*c*) We do not know.

23. We do not know.

24. There is no definite assurance yet of sufficient supply for a very long period. Recently there has been some trial plantation of trees suitable for match manufacture by the Forest Department of the Government of Bihar and Orissa.

25. (*i*) No.

(*ii*) Yes, if any concession is allowed by rails and steamers it will be of advantage as that will be a facility for quick transport.

Other raw materials.

26 and 27. The following raw materials (other than wood) are required in this factory:—

Materials.	Quantity required for 100 gross.		
	lb.	oz.	
Gum Arabic	1	11	Head Composition.
Gum Arabic	1	3	Side „
Gum Tragacanth	0	1	
Amorphous phosphorus	4	0	
Sulphide of antimony	0	3	Head „
Sulphide of antimony	4	0	Side „
Glass powder	6	9	Head „
Glass powder	0	6	Side „
Chalk	0	7	
Dextrine	0	3	
Glue	4	8	Head „
Chlorate of potash	27	0	
Bichromate of potash	1	2	
Sulphur	1	11	
Umber	4	2	
Infusorial earth	0	9	
Red ochre	0	9	
Red Lead	1	2	
Match wax	17	0	
Wheat flour	0	9	Paste.
Wheat flour	16	0	
Copper sulphate	1	4	
Outer Box paper	2	Reels.	
Inner Box paper	5		
Box label	14,400		
Dozen label	1,200		
Gross label	100		
Dozen packing paper	14,400		
Gross packing paper	100		

28. (*a*) and (*b*) We buy them from Indian market, but nothing is directly imported by us.

29. The following chemicals can be manufactured in India:—Gum Arabic, Glass powder, Chalk, Glue, Infusorial earth, Red ochre, Match wax, Wheat flour and Copper sulphate.

Labour.

30. We buy wood and we have no knowledge.

31. There has been no necessity of importing labour from abroad. Though skilled labour is not locally available, the local labour is given training and they get skilled gradually.

32. No imported labour employed here.

33. This question does not arise with us.

34. Total labour employed:—

Men.—55 at the average rate of As. 10 to As. 12 per head per diem.
Children.—18 at the average rate of As. 6 per head per diem.
Women.—Nil.

35. Yes, from the vicinity of the factory.

36. Yes, there is record.

37. There is no arrangement for housing labourers. They make their own arrangement.

Power.

38. Steam.

39. Electric power is not used and we have no relative knowledge.

40. Coal is used as fuel.

41. One ton of coal required for Power production per 100 gross output for this factory.

42. 149 miles.

43. The waste woods does not meet requirements—The rest of the question do not arise with us.

Market.

44. We have no knowledge about India's total demand for matches. It may roughly be taken to be about 100 to 135 lacks gross per annum.

45. It may with the increase of population—should the Industry be developed properly, but we are unable to make a forecast.

46. Local market consumes all of the manufacture of this factory.

47. No.

48. (*a*) We have no definite knowledge.

(*b*) No, I have no knowledge.

Competition.

49. Sweden, Wimco and Indian Manufacturers who use imported wood for splints.

50. Possibly with great difficulty they are competing with either. The severe competition is from Indian matches made with imported wood.

51. (1) We have no knowledge.

(2) This is beyond our period.

(3) We have no information.

52. From the statements of sea-borne trade and navigation of British India and from Commercial Intelligence Department.

53. I have no knowledge. These are points of their trade secrecy.

54. Yes. The Indian manufacturer is at a disadvantage in all of the points.

55. (*a*) May be said to be permanent.

(*b*) and (*c*) Temporary for about 10 years.

(*d*) Temporary for say about 20 years, in case the forest owners commence plantation and rearing of match wood and reserve the species suitable for Industry for the purpose of match manufacture alone. Transport difficulty is expected to close earlier and as soon as Railway and Steamer Companies give concessions.

(*e*) Temporary so long as Raw materials are not manufactured within the country.

(*f*) Temporary so long as there is no concession allowed by Railway or Steamer Companies.

(*g*) Temporary so long as wood is not grown or reserved particularly for the purpose of match manufacture.

(*h*) This is a matter for Government to adjust.

(*i*) Temporary so long as the capitalists will not be convinced of the prospects and till suitable measures are adopted to establish confidence in the future of the Industry.

Equipment.

56. No, it is not at all. The smallest unit of production in my opinion is 1,000 gross per day which can be operated economically under present day condition.

57. About 44 per cent. of the total capital outlay has been incurred on Plant and Machinery.

58.

No.	Name of machines.	Makers.	Date on which first brought to use.
1	Engine	Davey Paxman	
1	Boiler	Davey Paxman	
1	Cross cut saw	Arehns & Co., Sweden.	
1	Peeling machine	Arehns & Co., Sweden.	
1	Peeling machine	Bengal Small Industries, Calcutta.	
1	Box chopping		
1	Splint chopping		
1	Splint drying		8-1-1926
1	Splint polishing		
1	Splint cleaning		
1	Splint levelling	Arehns & Co., Sweden	
1	Frame filling		
1	Outer box machine		
1	Inner box machine		
1	Box labelling		
1	Side painting		
1	Frame emptying		

(*b*) The machinery was purchased under the arrangement that the payment will be made after trial.

59. (*a*) Machinery and other equipment can be said up-to-date. We cannot compete and shall not be able to compete if the present duty is not maintained and in case an excise amounting to at least 8 annas per gross be not imposed on the products of big factories within India financed by foreign capital.

(*b*) (*i*) Debarking, (*ii*) Case filling, (*iii*) Paraffing, (*iv*) Dipping, (*v*) Box filling, (*vi*) Dozen and Gross parcelling and all transport of materials from one department to another. For a small factory as this, the foresaid operation by machines incurs great block capital which we are not in a position to afford to invest just now and hence advantageous for us to do manually.

60. (*a*) No.

(*b*) Yes, I contemplate addition of 3 box machines, two frame filling machines, one dipping machine and one box filling machine.

61. Nothing made in India.

Capital account.

62. (*a*), (*b*), (*c*) *Nil.*

(*d*) Rs. 47,565-15-3 is the block value of Plant and Machinery.

(e) Rs. 2,982-7-11 is the block value of other assets.

63. Factory started hardly one year and there has been no reserve accumulate as yet.

64. We have no provision as yet.

65. The factory has recently been installed and no difference of cost in installing a new one at the present day is expected.

66. 67. 68. 69. 70. 71. 72. 73. 74. We work with our own capital.

Works cost.

75. We commenced work in 1926-27 and the form refers to time beyond our period.

76. In our period of work the factory had to stop manufacture for 4 months in the year and the items principally effected were office establishment, house-rent and other non-manufacturing overhead charges.

77. Yes, sent herewith.

78. No, we are not in a position to answer this.

79. Rates of depreciation allowed by Income-tax office is not available.

A provision for depreciation should be made at the rate of:—

(a) 12½ per cent. for match machineries.

(b) 10 per cent. for wood construction.

(c) 5 per cent. for repairs shop machineries.

(d) 10 per cent. for Boiler.

(e) 6 per cent. for Engine.

(f) 45 per cent. for leather belting.

These rates are suggested on estimation of the life of these machines.

80. Having no knowledge about the depreciation of Income-tax rates this cannot be determined.

Working capital.

81. (i) and (ii) Working capital required for this factory is Rs. 15,000.

82. We required an additional grant last year.

83. This was a grant from the Government and provision for interest at 6¼ per cent. should be made.

84. The cost of one month's output is about one-fifth of the working capital.

85. The value of our present stock is about Rs. 7,000 last year, the sale was arranged on two months' sight payment.

86. Yes, moderately large. The value of stock held is Rs. 8,000.

87. Yes. The Director of Industries' office is the head office.

88. (i) The head office (Director of Industries' office) does not charge any office expense up till now.

(ii) The Agent's commission is 5 per cent.

89. It is 5 per cent. of the total cost of matches, he removes at the rate of Re. 1-4 per gross.

90. (i) *Nil.*

(*ii*) Agent's commission is one anna per gross, whatever may be the output.

91 to 93. The question do not arise, as this is not a limited concern.

Claim for protection.

94. (A) Yes, India has so much forest areas that it has been observed that she can yield wood to meet any requirement for match manufacture in case due measures be taken. Regarding question of labour, it must be admitted that scarcity of labour cannot be apprehended. Of course skilled labour is often wanting at the start. But they pick up the work soon.

India's need for matches is about 100 to 135 lacks gross per annum, and she has thus a home market for about 40 factories of 1,000 gross output per day. Briefly speaking India possesses every natural advantage for the Industry which have been studied and observed by the Imperial Forest Economist Mr. R. S. Troup, F.C.H., in 1910 and subsequently by the Department of Industries of Bengal and that of Bihar and Orissa Governments.

(B) Yes, without the help of protection, the Industry is not likely to develop at all. It can hardly be expected that an Industry just attempted to be taken up by a country may possibly live in competition with the long established manufacturers of the countries abroad even with all her natural advantages. India must have sufficient protection till she comes out to be the fittest to survive.

They say that the Industry in India is in its infancy, but it is far from that yet. India only conceived and this was sufficient to create a good deal of alarm in the continent and reckonable manufacturers from abroad, have immediately rushed in with huge capital for saving duties and all that to establish themselves firmly in the meanwhile within the country to give a death blow to India's conception about the Industry. Under the circumstances without sufficiently strong protection and care, miscarriage is inevitable.

(C) The disadvantages India is experiencing at present, *vide* answer to question No. 55, are all temporary and it is expected that she will eventually be able to compete with world competition without any protection in time.

95. (A) and (B) Yes.

96. The labourers of the isolated districts and those who are not usually occupied whole of their time will work in an industry very cheaply. These people are generally so much in economic stress that they are always open to take up any work which will bring some extra income over and above their usual work. Thus, division of process if this Industry is expected to make it particularly suitable to Indian economic condition.

97. (*a*) Re. 1-8 per gross on finished matches and As. 4-6 and As. 6 per lb. of splints and veneers for boxes respectively.

(*b*) We have no knowledge.

98 and 99. The amount of protection necessary is the retention of the existing duties on matches, splints and veneers.

Other than these protective duties, assistance is needed by way of:—

(*a*) Imposing an excise at the rate of at least As. 8 per gross on the products of factories within India financed by foreign capital.

(*b*) Moving the different railway and Steamers authorities to grant us facilities by reducing the freight of matches, chemicals and wood. The present rate is causing great hardship.

(*c*) Preventing anything of the nature of monopoly or cornering the market in wood.

For reasons of recommending the above assistance, *vide* the views expressed by Indian Match Manufactures Association in their letter No. 327 of 16th October 1926 to the Commerce Department, Government of India. We endorse the views.

(2) *Letter No. 1047, dated the 15th December 1927.*

With reference to your letter No. 929 of 28th November 1927, I have the honour to send herewith the " Production accounts " of this factory as desired by you in your above letter.

Production account of the Demonstration Match Factory, Gulzarbagh, for the period 8-1-26 to 30-9-26.

	Rs.	A.	P.	Rs.	A.	P.	Cost per Gross. Rs.	A.	P.
1. *Direct productive materials*—									
Timber consumed . .	4,733	8	6						
Chemicals ,, . .	3,503	7	11						
Paper, label and paste consumed	1,992	7	7						
Carriage inward . . .	949	0	3	11,108	8	3	0	14	11·9
2. Direct productive labour				4,060	7	9	0	5	5·8
3. *Non productive expenses*—									
(*a*) Labour—	Rs.	A.	P.						
Supervision	3,564	3	0						
Power .	420	0	0						
Miscellaneous	1,126	8	6	5,110	11	6			
(*b*) Materials—									
Power* .	1,694	5	6						
Loose tools and engineering stores	825	10	10						
Spares and repairing materials	257	8	0						
Miscellaneous	432	5	6	3,236	13	10			
(*c*) Miscellaneous . .				316	5	0	8,663	14	4	0	11	8·2
4. *Fixed burden*—									
Rents and rates, taxes, insurance and Boiler fee, etc.				1,587	7	0			
Interest on capital . .				2,828	12	2			
Depreciation on plant and machinery . . .				4,535	15	4			
Depreciation on furniture and fixture . . .				119	0	3			
Preliminary expenses written off				168	12	0			
Audit fee				500	0	0	9,739	14	9	0	13	1·7
							33,572	13	1			
5. Less Work in progress							—120	0	0			
							33,452	13	1	2	13	2

Total production during the period 11,850 gross.

---

*Fuel, water. lubricants, etc.

Production account of the Government Demonstration Match Factory, Gulzarbagh, for the half year ended 31st March 1927.

	Rs.	A.	P.	Rs.	A.	P.	Cost per Gross. Rs.	A.	P.		Rs.	A.	P.
1. *Direct productive materials*—													
Timber consumed .	1,880	5	11										
Chemicals ,, .	2,244	4	4										
Paper, label and paste consumed .	1,656	0	1	5,780	10	4	0	13	9				
2. *Direct productive labour* . . .				2,444	4	4	0	5	10	By trading and profits and loss account—	20,611	13	1
3. *Non-productive expenses*—													
(*a*) Labour—													
Supervision .	1,806	9	0										
Power . .	221	6	0										
Miscellaneous .	1,040	12	11	3,068	11	11	0	7	4				
(*b*) Materials—													
Power . .	1,168	5	3										
Loose tools and engineering stores . .	447	3	11										
Spares . .	596	4	0										
Miscellaneous .	89	4	2	1,406	9	6	0	3	4				
4. *Fixed Burden*—													
Rents, rates, taxes, insurance, Boiler fees, etc. . .	1,241	7	9										
Interest on capital .	2,877	13	2										
Depreciation on plant and machinery .	3,109	2	9										
Depreciation on furniture and fittings .	89	0	9										
Preliminary expenses written off . .	112	8	5										
Audit fee . . .	500	0	0	7,930	0	10	1	2	11				
				20,630	14	1							
5. Deduct increase in work in progress				19	1	0							
Total .				20,611	13	1	3	1	2		20,611	13	1

Total quantity manufactured during the half-year 6,710 gross.

PROVISIONAL.

Production account of the Government Demonstration Match Factory, Gulzarbagh, for the half year ended 30th September 1927.

	Rs. A. P.	Rs. A. P.	Cost per Gross. Rs. A. P.
1. *Direct productive materials*—			
Timber consumed	4,621 12 10		
Chemical and paste consumed	3,071 5 2		
Paper and labels consumed	2,116 0 1	9,809 2 1	
2. *Direct productive labour*		4,534 11 0	
3. *Non-productive expenses*—			
(*a*) Labour—			
Supervision	1,788 0 0		
Power	316 4 0		
Miscellaneous	550 4 6		
Materials—			
Coal	1,433 13 0		
Loose tools and engineering stores	368 6 9		
Spares	561 5 2		
Miscellaneous	30 15 5	5,049 0 10	
4. *Fixed Burden*—			
Rates, rents, taxes, insurance and Boiler fee, etc.	1,029 2 3		
Interest on capital	3,120 0 0		
Depreciation on plant and machinery and furniture fixture	3,230 6 1		
Preliminary expenses written off	98 7 2		
Audit fee	500 0 0	7,977 15 6	
Total		27,370 13 5	
5. Deduct increase in work in progress		967 6 0	
Total		26,403 7 5	
Less sale proceeds of refuse wood		194 0 0	
Total		26,209 7 5	2 4 9·9

Total quantity manufactured during the half-year 11,386 gross.

Burma.

Messrs. Adamjee Hajee Dawood and Company, Limited, Rangoon.

(1) *Representation, dated 30th December 1926.*

With reference to the Resolution of Government of India, Commerce Department, No. 235 T., dated the 2nd October 1926, referring to the Indian Tariff Board the question of protective duty on imported matches and the various aspects of the Match industry of India, we beg to submit our views on the subject as under.

The Government of India communiqué raises three distinctive issues in the reference as covered by paragraph 97 of the report of the Indian Fiscal Commission, which we categorically deal as under.

Firstly, India possessing natural advantages, namely supply of raw material, labour, etc.

As to the raw material we have got definite reason to believe from our own direct experience that both in India and Burma, and the latter particularly, there is an abundance of wood suitable for the manufacture of matches, although it is a fact that so far as our own knowledge is concerned, that particular variety of wood from which splints of attractive colour can be made has not yet been located. We have at the same time every reason to believe that if a proper research work is carried on under the direct control of Government and with an avowed object, it is not impossible to locate a supply of that particular species of wood.

As to the supply of cheap power we have also learnt from our own experience that no difficulty is to be anticipated in this direction. The labour peculiar to this industry at this stage of its development may not be called fully skilled, but there is not the slightest doubt about its being had in abundance and not very expensive at that. During the short period in which factories have been established in India and Burma they have made eminently satisfactory progress towards being qualified as skilled labour and it can safely be hoped and expected that provided the industry is encouraged by the fostering care of the Government, and if it does not perish in its infancy, the labour will in no long time be fully qualified as to skill.

There is no question as to the finding of a home market and this fact will be easily borne out by the statistics of the imports during the three years succeeding in which the duty according to the Government communiqué for the purpose of revenue was levied and that during the three years immediately preceding it. The difference is no doubt due to the perceptible growth of the industry in India during this short period.

As regards the second point laid down by the Indian Fiscal Commission, the only thing we could state is that the industry began to thrive only after the imposition of the import duty on foreign article levied even though it was in the interest of revenue. For a number of years at least such a duty in our opinion is absolutely necessary for the protection of vested interests already created as well as for according encouragement to more enterprises in the same direction. There is not the slightest apprehension about hurting the consumer inasmuch as they are not yet called upon to pay any higher price for the article than what they did prior to the coming in to the market of the indigenous article nor is there the remotest chance of such a condition arising in the near future. On the contrary, if foreign monopolist succeeds in asserting himself, the chances are that he will make up for the lost opportunities when he has the field to himself, from the consumer.

Coming to the third point of the Indian Fiscal Commission, we are convinced that given the chance of consolidating its interests, the local industry must need thrive after a reasonable period and eventually stand on its own legs without protection and face open competition.

With reference to paragraph 3 of the Press communiqué and in regard to the creation of vested interests we have only to state that ourselves alone

have got a block of over Rs. 25 lakhs in that industry and that there are good many other concerns spread all over India and Burma of varying sizes and importance. It will not be difficult to understand that these ventures are the outcome of the imposition of the duty on the foreign article. If, therefore, any revision is contemplated in this duty at this stage, the natural sequence will be the extinction at one blow of all these vested interests which though may not total large amount, yet for the beginning of the industry does certainly represent fairly big capital investments in India. The revision, if any, should in our opinion be for the enhancement of the existing scale of duty rather than reduction.

Three years is but a short time to judge the results of a new industry. We say three years, not ignoring the attempts made prior to the imposition of the duty, because these failed in the face of strong competition by foreign imports and in the absence of any protective tariff at home. The real epoch of the industry therefore begins after the imposition of the duty. It is natural that during this brief period it has had to face many difficulties, particularly those of a technical nature; but we have every reason to hope and believe that in course of time all these difficulties will disappear. We are therefore in a position to state with all the emphasis at our command that it is in the best interest of the establishment of a new industry in the country that no change may be made in the present rates of duty on imported matches, splints and veneers; and that the same may be declared as *protective duty* without attaching great importance to the consideration of the falling off in the revenue.

It is possible to derive some revenue from the import of various materials and chemicals necessary in the manufacture of this article and the revenue also may benefit in the direction of income-tax if the industry is allowed to prosper. It should also be borne in mind that this industry provides means of livelihood to several thousand labourers and reduced unemployment even though it may be to an insignificant extent. The loss in revenue may also be made up to a certain extent by the levy of a discriminating excise on the products of factories run or financed solely or partly by foreign capital; but on no account any imposition of taxation of any shape must be thought of at the present stage, at any rate, on factories run purely by Indian enterprise and capital.

We conceive it is the duty of the Government to afford protection to the home industry as against the foreign and to co-operate with the pioneers in every direction by carrying research work and by removing from their path any difficulty that they may be faced with, particularly of raw material and the transport of it and that of the manufactured article. We shall be pleased to furnish the Tariff Board with any further information at our disposal or explaining any point arising out of this communication.

---

(2) *Replies to the Questionnaire.*

1. Adamjee Hajee Dawood & Company started business in the year 1914 and was converted into a private limited liability concern and registered at Rangoon in July 1920. Our firm is thus a private registered company.

Our match factory was started in the year 1924.

2. The capital invested in our firm is wholly Indian.

The total number of Directors is 6, all of whom are Indians.

We are at present employing in our factory two Europeans, both in the capacity of machinery experts.

3. Our factory undertakes the whole process of manufacture.

4. Our factory commenced to manufacture matches on the 15th February 1924.

5. **The full capacity of our factory as at present equipped is for the manufacture of 6,000 gross of boxes of matches per day of 10 hours.**

6. The dimensions of the match boxes manufactured by us and the average number of matches in each are as shown below:—

Size.	Dimensions.	Average No. of splints in each box.
1. Full size	58 mm. × 37 mm. × 18 mm.	80
2. ¾ ,,	49 ,, × 31 ,, × 15 ,,	55
3. Half ,,	47 ,, × 33 ,, × 16 ,,	70

7. We have stated in our reply to question No. 4 above that our factory commenced to manufacture matches in February 1924. We state below the actual output of our factory since that date.

Year.	Output.
1924	356,608 gross of boxes.
1925	858,208 ,, ,, ,,
1926	1,101,716 ,, ,, ,,

8. Our factory is situated at Pazundoung, Rangoon.

(*a*) Yes.

(*b*) Yes.

(*c*) Yes.

(*d*) Yes.

In our opinion all the factors mentioned in (*a*), (*b*), (*c*) and (*d*), under this question are equally important.

9. We agree that Indian manufactured matches made out of indigenous wood are not so attractive in respect of appearance and finish as imported matches owing to the slightly dark colour of the wood. It is also possible that Indian manufactured matches may be slightly inferior in respect of the composition of chemicals, and if so, we believe that with increasing experience, it is not difficult to remedy this defect.

(*b*) Apart from the question of quality, there exists a certain amount of prejudice against Indian matches generally. This prejudice arose owing to inferior quality of matches having been put on the market in 1923, and 1924 when the industry was entirely in an infant stage. But since 1925, the quality has been improving and with the improvement in quality the prejudice is gradually disappearing, if it has not altogether disappeared. We may add that not only no prejudice exists against Indian matches at present, but on the other hand, preference is actually given to such matches in certain markets.

Raw Materials.

Wood.

10. In the years 1924 and 1925 we imported wood from Japan and a small quantity from Europe for the manufacture of splints only. The last lot of foreign wood was received in January 1925. Since then, however, as we got concessions from the Local Government to extract wood from Reserve forests, we have entirely stopped importing foreign wood and are now relying wholly upon indigenous wood.

11. We specify below the kinds of wood used by us for the manufacture of splints, veneers and packing cases:—

(*a*) Splints:—

Local Names.	*Botanical Names.*
Sawbya	Tetrameles nudiflora.
Maulettanshe	Sarcocephalus cordatus.
Gwe	Spondias mangifera.
Yemane	Gmelina arborea.
Taung-meok	Alstonia Scholaris.
Setkadon	Trewia Nudiflora.
Odein	Ehretia Lævis.
Kuthan	Hymenodictyon Excelsum.
Mondaing	Cycas Siamensis.
Lelun	Sapium Baccatum Roxb.
Butalet	Aegiceras Majus.
Taung-Kathit	Erythrina Stricta.

(*b*) Veneers:—

Letpan	Bombax Malabaricum.
Didu	Bombax Insigne.
Boneza	Albizzia stipulata.
Sinin-thayet	Mangifera caloneura.
Taung-thayet	Irvingia Oliveri.
Pandama	Melia sp. (possibly M. birmanica).
Lelun	Sapium Baccatum Roxb.
Butlet	Aegiceras Majus.
Taung-Kathit	Erythrina Stricta.
Myetcho	Panicum Crus-galli.
Tayaw	Encoecaria Agallocha.
Pine	.....

(*c*) Packing Cases:—

Sawbya	Tetrameles nudiflora.
Maulettanshe	Sarcocephalus cordatus.
Gwe	Spondias mangifera.
Yemane	Gmelina arborea.
Bonmeza	Albizzia stipulata.
Sinin-thayet	Mangifera caloneura.
Taung-thayet	Irvingia Oliveri.
Kuthan	Hymenodictyon Excelsum.
Setkadon	Trewia Sylvatica.
Taung-meok	Alstonia Scholaris.

12. We have found indigenous wood as satisfactory as imported wood for the manufacture of veneers and packing cases. So far as the manufacture of splints is concerned, we find that the indigenous wood used by us so far is slightly darker and hence the finish is not as perfect and attractive as that on splints made from imported wood. We have, however, every reason to believe that if proper research work is carried on under the direct control of the Government and with an avowed object, it is not impossible to locate a supply of that particular species of wood from which attractive splints can be manufactured.

13. (*a*) Our annual requirement of wood is approximately 11,000 tons—5,000 gross per day.

(*b*) Approximately 13,500 tons.

14. At present about 32 c.ft. of wood is required by us to manufacture one hundred gross of finished matches.

15. The standard size of the packing cases used by us is:—

40″ × 27″ × 24″ for full size.

30″ × 24″ × 24″ for ½ size.

5 c.ft. of wood is required for one full size packing case.

16. Our main supplies are at present drawn from the Mahuya and Paunglin Reserves which were leased to us by the Local Government in 1926 for a period of 15 years. These Reserves are situated about 60 miles by road from Rangoon and about 120 miles by stream. We are also at present purchasing a part of our supplies from contractors who extract from Reserves around Wanetchaung, Pugyi, Okkan,—distances ranging from 20 to 60 miles by rail.

In the past we also draw supplies from contractors at Myitkyina, Mandalay, Northern and Southern Shan States and stations on the main line between Mandalay and Rangoon, Martaban and Rangoon, and between Prome and Rangoon—distances ranging from 25 to 660 miles by rail.

17. The trees in our forest are felled with axes by skilled wood-cutters and dragged by elephants and buffaloes to the banks of floating streams in the vicinity and rafted down right up to our factory.

Supplies from contractors are felled and handled in the same manner but are brought down to our factory by rail or water.

18. We pay royalty to Government at the rate of Rs. 12-8-0 per ton of 50 cubic feet of wood extracted from the Mahuya and Paunglin Reserves. The contractors from whom we purchase a part of our supplies pay royalty at varying rates ranging from Rs. 4 to Rs. 9 per ton of 50 cubic feet.

19. It is not possible to give the cost under separate heads as it differs very widely. But the cost per ton of 50 cubic feet delivered at our factory is between Rs. 35 and Rs. 40.

20. We consider the terms of our concession favourable.

A copy of our license is herewith attached.

21. We have found the supply of wood constant in respect of quality.

22. We have found the supply of wood constant in respect of quantity.

23. In view of our reply to question No. 22 above, this question does not arise.

24. We do consider that our factory is assured of a sufficient supply of suitable wood for a reasonably long period.

25. As the wood extracted from our forest is rafted down the stream right up to our factory, we have not to use any other means of transport and hence the question of concessions in the matter of freight does not arise.

We may state, however, that in the past we got a very small concession from the Burma Railways.

Other raw materials.

26 and 27. Statement marked "A" is filled herewith.

28. (*a*) Statement marked "B" is attached.

(*b*) All the articles mentioned in statement marked "A" are imported by us from foreign countries.

(*c*) *Nil.*

29. We do not consider ourselves competent to express any opinion on the points raised.

Labour.

30. We have experienced absolutely no difficulty in securing sufficient labour for the extraction.

31. We do not consider that the employment of skilled labour imported from abroad is at all necessary except in so far as machinery experts are concerned.

32. Our factory did not employ the two experts referred to in our reply to question No. 32 from the very beginning. They were employed later on in the years 1925 and 1926 respectively.

Indian workmen are being trained in skilled work under the guidance and supervision of the two experts.

34. The factory employs 1,500 Indian workmen out of whom about 800 are males and about 700 females. There are no children employed in our factory. Males daily earn on an average Re. 1-4 and females Re. 1 each.

35. The Indian labour employed in our factory is entirely drawn from the vicinity of the factory.

36. We have found by experience that Indian labour improves with training. We have, however, no record to support our contention but we find their work shows increasing efficiency day by day.

37. We have erected barracks for some of our labourers who were in need of housing accommodation. The rest stay in the vicinity of the factory in their own dwellings.

We also supply free medical aid to our workmen.

Power.

38. The power used in our factory is derived from electricity.

39. Our electric power is obtained from the Rangoon Electric Tramway and Supply Company Limited at the rate of 0·8 anna per unit. We are not aware of rates obtaining elsewhere in India or in other countries.

40. The question does not arise in view of our reply to question No. 38 above.

41. We are using steam for drying and heating splints, veneers, boxes, etc. As, however, we are exclusively using waste wood for the purpose we have kept no account of the quantity used.

The number of units required per output of 100 gross of boxes is approximately Rs. 2-12.

42. The question does not arise with us.

43. We are able to meet the whole of our requirements of wood for fuel purposes from waste wood in our factory.

Market.

44. 14 million gross boxes approximately.

45. Yes. In our opinion, the demand for matches is likely to increase as time goes on. Because the population of India is daily increasing and matches being an article of necessity, their consumption is bound to increase with the growth of population. Moreover, the main consumption of matches is for smoking purposes and the smoking habit is increasing generally, and

the number of smokers is bound to increase with the increase in population. It therefore follows that the demand for matches is bound to increase in future.

46. Our principal markets are situated in Tavoy, Mergui, Akyab, Chittagong, Calcutta, Berhampur, Cocanada, Madras, Cuddalore, Tuticorin, Cochin and Calicut.

We show below the distances which separate the abovementioned places from our factory:—

	Miles.
Tavoy	258
Mergui	459
Akyab	479
Chittagong	635
Calcutta	779
Gopalpore	557
Cocanada	868
Madras	1,000
Cuddalore	1,155
Tuticorin	1,407
Cochin	1,535
Calicut	1,645

Our matches are also being distributed in almost all the parts of Burma by rail as well as to river ports by steamer and their distances from our factory vary a great deal.

47. There are no such markets in India in which owing to their distance from the ports, we can more easily compete against the foreign manufacture.

48. (*a*) As far as Burma is concerned the markets are served by imported *matches* to the *extent of approximately* 45 per cent. while indigenous matches make up the balance of the total requirements.

(*b*) As far as Burma is concerned we have reasons to suppose that there is a certain amount of illicit importation of matches into the country over the Chinese frontiers. Such illicit imported matches are being sold in almost all places in Shan States.

Competition.

49. Competition from Sweden is keenest and Japan also competes to a certain extent, but on account of the existing duty on imported matches we are able to meet the competition in Burma. We also export small quantity to Indian markets.

50. Even with the existing duty, imported matches do compete with Indian matches manufactured from indigenous wood as well as with Indian matches manufactured from imported woods.

51. (1) Government's Customs Department records will show the exact figures of prices at which the imported matches entered the country. For average selling prices of the matches imported by us we attach herewith a statement marked C.

(2) We commenced the manufacture of matches from indigenous wood only since 1925 and are thus only in a position to give you prices for the last two years which were as follows:—

	Rs.
1925	1-13 per gross.
1926	1-11 ,, ,,
Current price full	1-8 ,, ,,
,, ,, half	1-3 ,, ,,

(3) We only manufactured matches from imported wood during the year 1925. The average selling price per gross was Rs. 1-15.

The statement attached marked C gives details of c.i.f. prices in Rupees in so far as import from Japan is concerned. At that time the import from Europe was only on a very small scale.

52. It is obtainable from merchants or importers who import direct from foreign sources.

53. We are not in a position to say definitely whether the prices at which foreign producers sell for export to India are unremunerative, or leave only a small margin of profit or are exported at a price below the lowest price current in the home market. We, however, quote below the prices of imported matches under the different rates of import duty and leave your Board to draw their own conclusions:—

Rate of duty.	Full size selling price per gross.	Half size selling price per gross.
	Rs. A. P.	Rs. A. P.
5 per cent.	0 14 0	0 12 0
Rs. 0 12 0 per gross.	1 10 0	1 8 0
,, 1 8 0 ,, ,,	2 10 0	2 4 0

54. (*a*) **Yes.**

(*b*) Yes.

(*c*) Although ordinary labour is approximately cheaper on the whole it is more costly on account of its inefficiency.

(*d*) Yes.

(*e*) Yes.

(*f*) Yes.

(*g*) Yes. We have also to keep other materials to last for at least six months in stock.

(*h*) Yes.

(*i*) Yes. The industry is comparatively a new one and the continuance of the present protection is not yet assured. Hence capitalists naturally hesitate to go in for this industry under the present uncertain conditions.

55. We consider (*a*) as an initial disadvantage, (*b*), (*c*), (*d*) and (*e*) as temporary while the rest as permanent except (*f*) and (*h*) which might be remedied if the Railways and Steamship Companies can be persuaded to reduce the freight on finished goods and Government to reduce Customs duty on imported raw materials.

In our opinion the temporary disadvantages should not operate for more than ten years at the most.

Equipment.

56. We consider our mill sufficiently large as an economic unit of production to ensure economy.

In our opinion 700 gross boxes per day would be the smallest unit of production which can be operated economically under present day conditions.

57. Approximately 30 per cent. of our total capital outlay invested in our match business has been incurred on plant and machinery.

58. (*a*) A list containing a brief description of our plant and machinery stating the dates on which the various machines were first brought into use is attached herewith. All principal match making machines are made by the well-known match-machine maker, Mr. A. Roller of Berlin, Germany.

(*b*) No special arrangements were made.

59. (*a*) **Yes.**

(*b*) *Nil.*

60. (*a*) We contemplate the replacement of frame filling machines by automatic simplex machines if the experiments we are carrying out at present prove satisfactory and economical.

(*b*) Yes. We have already imported and kept in stock ready for erection a complete suitable set of match-making machinery with a capacity of manufacturing 3,000 gross of boxes per day of 10 hours. But we cannot erect the same until the results of the present enquiry are known.

61. Almost all parts of machinery can be made in India.

Capital Account.

62. The block value of our property as it stood in our books at the end of the last complete year ending on 30th June 1926 is as follows:—

(*a*) *Nil.*

(*b*) Rs. 2,75,241-5-0.

(*c*) Rs. 3,79,555-4-0.

(*d*) Rs. 9,62,709-14-6.

(*e*) Rs. 18,12,243-1-0.

63. The figures given above represent the actual cost of the various assets.

64. The question does not arise.

65. We estimate that the present day cost of buildings for a factory having the same output as our present factory would practically be the same while the cost of machinery would be somewhat less on account of a general reduction in the prices of match-making machinery.

66. A statement showing particulars of the sums spent on the purchase of plant and machinery from the very commencement to date and the rate of exchange at which funds were remitted is herewith attached.

67 to 73 do not arise.

74. We are not at present in a position to say what additional capital would be required to carry out replacements contemplated by us as it depends entirely on the results of our present experiments.

Works cost.

75. The forms duly filled up are attached herewith.

76. During the year 1924 when our factory was working at less than its full capacity the works cost was naturally high on account of inexperience of the workmen. The cost was high under almost all the heads. During 1925 on account of an increase in production and the fact that the workmen were gradually being trained there was an all-round reduction in cost. During 1926 the cost was further reduced.

77. No.

78. No.

OVERHEAD CHARGES.

(I) *Depreciation.*

79. The Income-tax authorities allow 6¼ per cent. on machinery and 2½ per cent. on buildings. The rates allowed for machinery are not suitable. We suggest 12½ per cent. because match-making machinery is particularly too delicate.

80. The sum required annually for depreciation at income-tax rates on our total block account would be Rs. 75,000 if the assets are valued at cost and approximately Rs. 57,000 if the assets are taken at their value after deducting all depreciation written off up to date.

(II) *Working Capital.*

81. The working capital which our match company requires:—

(1) According to its present output approximately Rs. 15 lakhs.

(2) According to the output equivalent to its full capacity Rs. 20 lakhs.

82. Yes. The company is able to provide all the working capital it requires. It is not necessary to borrow any capital for the purpose.

83. This question does not arise.

84. The cost of one month's output at the present rate is approximately Rs. 1,75,000.

85. Approximately Rs. 5 lakhs. A period of about 4 months elapses between production and payment.

86. We find it necessary to hold large stocks of raw materials worth approximately Rs. 3 lakhs.

(III) *Agent's commission and Head Office expenses.*

87. The company has its own office in Rangoon. It is not under the control of a firm of managing agents.

88. The question does not arise.

89. The question does not arise.

90. The question does not arise.

Manufacturer's profits.

91. 12 per cent.

92. 9 per cent. on debentures and 10 per cent. on preference shares.

93. 12 per cent.

Claim for protection.

94. We do claim that all the conditions laid down by the Indian Fiscal Commission are satisfied in the case of the match industry.

(*a*) We do claim that the industry possesses natural advantages, such as an abundant supply of raw materials, cheap power, a sufficient supply of labour and a large home market.

(*b*) We claim that without the help of protection the industry is not likely to develop at all.

(*c*) We claim that the industry will eventually be able to face world competition without protection.

The reasons for our opinion expressed above are fully explained in our letter dated 30th December 1926, to the Tariff Board, a copy of which is attached herewith.

95. (*a*) Yes.

(*b*) Yes.

96. Yes.

97.

98. The amount of the protection which we consider necessary is Rs. 2 per gross; because at the present rate of Re. 1-8 per gross foreign imports still compete with indigenous matches and it is the sole aim of the foreign manufacturers to cripple the Indian industry which is still in its infancy.

99. We recommend the following forms of assistance other than a protective duty:—

(*a*) Efforts should be made by Government to grow suitable species of wood in India and Burma.

(*b*) In Burma, instead of inviting tenders for leasing forests Government should fix the minimum rate of royalty.

(*c*) Railway freights should be reduced for the transport of wood from forests and finished goods into the interior.

(*d*) The freight by sea on matches exported from Burma to India is high at present and should be reduced.

(*e*) The import duty on chemicals, papers, etc., should be reduced.

(*f*) The rates of municipal taxes are too high at present and should be reduced.

(g) A discriminating excise must be levied on the products of those factories which are financed and controlled by foreigners. We submit that the object of any protection that may be granted to an industry in India should be to encourage the development of that particular industry with Indian capital under Indian control. We further submit that it is not in the interests of this country that foreigners are allowed to erect factories in India under the wall of protection. So far as the match industry is concerned, we are afraid that it has been the policy of a foreign trust to start match factories in India and undersell the products of Indian factories—may be even at some sacrifice—with the object of compelling the Indian manufacturers, who are beginners in the line and who have not sufficient financial backing to withstand the competition of the trust with long technical experience and unlimited financial resources, to retire from the field. When and if this object is achieved the trust may buy up the factories belonging to Indians as it has already done in some principal countries of the world and thus make India entirely dependent upon matches manufactured by factories under its control, supplemented by imported foreign matches. Thus the trust will have a practical monopoly of the match trade in India and will consequently be in a position to dictate its own price to the detriment of the consumers.

Statement *" A " showing annual requirements of raw materials, also average requirement per 100 gross of boxes of matches.*

Raw materials other than wood.	Total annual requirement.	Requirement per 100 gross of boxes of matches.
	Lbs.	Lbs.
Amorphous Phosphorus	17,000	1¼
Chlorate of Potash	194,000	15
Antimony Trisulphide	10,300	¾
Manganese Dioxide Black	14,000	1
Bichromate of Potash	6,500	½
Glass Powder	67,700	5½
Sulphur Flower	24,000	2
White Zinc	15,700	1
Glue	28,400	2¼
Iron Oxide	24,400	2
Potato Starch	96,000	8
Paraffin Wax	215,000	17
Printing Inks	3,600	⅓
Printing Papers	30,700	2½
Zinc Sheets	180,000	14
Blue Match Paper	324,000	25
Green Match Paper	132,000	10
Brown Packing Paper	60,000	5

Statement "B" of raw materials imported from abroad, their price, customs duty, etc.

Raw materials.	Country of origin.	C.I.F. Rangoon price.	Per	Tarnsport charges to factory per ton.
				Rs.
Amorphous Phosphorus . .	Great Britain	£195–210	Ton	5
Chlorate of Potash . . .	Germany .	£28–35	Ton	3
Antimony Trisulphide . .	Do. .	£4-10-0	100 kg.	4
Manganese Dioxide . .	Do. .	£22–23	Ton	3
Bichromate of Potash . .	Great Britain	£40–42	Ton	4
Glass Powder	Germany .	£7–8	Ton	3
Sulphur Flower . . .	Do. .	£12–13	Ton	
	Japan . .	Yen 9–10	100 kins	3
White Zinc	Germany .	£38–40	Ton	4
Glue	Do. .	£55–65	Ton	3
Iron Oxide	Japan . .	Yen 7–20	100 catties	3
Potato Starch	Holland .	£16–18	Ton	3
Paraffin Wax	Great Britain	Rs. 21–28	Cwt.	*Nil.*
Printing Inks	Japan . .	Yen 2,500	Ton	4
Printing Papers . . .	Do. . .	,, 450	Ton	3
Zinc Sheets	Belgium .	£43–18	Ton	4
Blue Match Paper . . .	Sweden .	£25–28	Ton	3
Green Match Paper and Packing Paper.	Do. .	£21–23	Ton	3

NOTE.—Customs duty on all the above articles except sulphur and printing inks is charged at the rate of 15 per cent. There is no customs duty on sulphur; customs duty on printing inks is charged at the rate of 5 per cent.

STATEMENT "C."

Years.	C.I.F. price per 50 gross.	Duty.	Landing charges.	Average selling price.
	Rs. A. P.		Rs. A. P.	Rs. A. P.
1918-19 . .	106 0 0	5%	0 6 0	115 0 0
1919-20 . .	88 0 0	5%	0 6 0	100 0 0
1920-21 . .	73 8 0	5%	0 6 0	95 0 0
1921-22 .	75 0 0	As. 12 per gross	0 6 0	135 0 0
1922-23 . .	77 0 0	Re. 1-8 per gross	0 6 0	159 0 0
1923-24 . .	50 0 0	" "	0 6 0	135 0 0

STATEMENT "D."

The 20th January 1926.

Mr. Robertson's estimate.

BONMEZA.

	Rs. A. P.
Planting charges per acre for 7 years . . .	20 0 0
Supervision charges per acre for 8 years . .	16 0 0
TOTAL	36 0 0
Compound interest for 15 years	10 0 0
TOTAL	46 0 0

1 acre would yield 20 tons of timber—

	Rs. A.
Cost of 1 ton of timber	2 8
Government royalty per ton	6 0
Total cost per ton	8 8

Within 13 years the girth of the log will be 6'.

STATEMENT "E."

Description of our plant and machineries.

Nos.	Names of Machines.	Dates on which they were first brought into use.
	Section "A."	
2	Winches	March 1924.
1	Winch	June 1924.
2	Cross Cut Saws	October 1924.
3	Circular Saw Benches	June 1925.
3	Knife Grinding Machines	October 1924.
10	Wood Peeling Machines (6 for Boxes and 4 for Splints)	October 1924.
6	Chopping Machines (4 for Boxes and 2 for Splints)	October 1924.
2	Paste Grinding Cones	October 1924.
	Inner Drawer Machines	October 1924.
20	Inner Drawer Machines	January 1926.
20	Outer Case Machines	October 1924.
20	Labelling Machines	March 1924.
4	Box drying apparatus (for Inner and Outer)	October 1924.
2	Local made veneer chopping apparatus	June 1925.
6	Splints drying apparatus	October 1924.
2	Splints Drying and Polishing Drums	February 1927.
5	Splints Polishing Drums	October 1924.
4	Splints cleaning machines	October 1924.
2	Splints levelling and filling machines	December 1924.
1	Splints levelling apparatus	October 1924.
	List of Machines in Section "B."	
30	Frame filling machines	March 1924.
16	Emptying machines	March 1924.
2	Waste splints selecting machines	March 1924.
3	Splints levelling machines	October 1924.
1	Simplex machine	December 1926.
2	,, machines	February 1927.
16	Box filling machines (8 full size and 8 $\frac{3}{4}$th size)	March 1924.
6	Side painting machines	March 1924.

Nos.	Names of Machines.	Dates on which they were first brought into use.
	List of Machines in Section "B"—contd.	
6	Packetting machines	March 1924.
2	Side paint grinding cones	June 1925.
2	,, ,, ,, drums	March 1924.
2	Japanese splints cleaning machines	February 1927.
	List of Machines in the Workshop.	
1	Lathe	March 1924.
1	Lathe	June 1926.
1	Shaping Machine	June 1926.
2	Drilling Machines	March 1924.
1	Pipe threading machine	March 1924.
1	Hacksaw machine	March 1924.
1	Tool sharpening machine	March 1924.
	In Chemical Department.	
2	Glue boiling apparatus	March 1924.
1	Mixing machine (Japanese)	March 1924.
4	Sifting apparatus	March 1924.
6	Chemicals grinding cones	March 1924.
3	Paraffining apparatus	March 1924.
3	,, ,,	August 1925.
	In Labels Printing Department.	
4	Label printing presses	April 1926.
1	Label cutting machine	April 1926.
1	,, ,, ,,	January 1927.
1	Knife grinding machine	August 1926
	Other Machinery.	
2	Boilers	February 1924
1	Chimney	February 1924.
1	Artesian well	February 1924.
2	Air Compressors	February 1924.
2	Worthington Feed Pumps	February 1924.
6	Boiling tanks	...

STATEMENT "F."

Statement of particulars of sums spent on purchase of plant and machinery from 1922 to 1926.

Date.	Value in Sterling.	Rate of Exchange.	Amount in
	£ s. d.		Rs. A. P.
1922.			
24th October 1922	9,750 0 0	S. 1-3$\frac{3}{8}$	1,49,760 0 0
1923.			
24th February 1923	222 0 0	S. 1-4$\frac{1}{16}$	3,317 0 9
28th June 1923	14,217 6 11	S. 1-4$\frac{3}{32}$	2,12,017 14 0
10th November 1923	15,776 13 4	S. 1-4$\frac{29}{32}$	2,24,795 9 0
15th December 1923	4,809 12 5	S. 1-5$\frac{3}{16}$	67,159 13 3
5th December 1923	1,016 5 6	S. 1-4$\frac{29}{32}$	14,453 11 0
TOTAL	36,041 18 2		5,21,744 0 0
1924.			
13th June 1924	272 0 0	S. 1-4$\frac{25}{32}$	2,459 14 0
15th August 1924	95 0 0	S. 1-4$\frac{29}{32}$	1,348 10 0
24th November 1924	112 10 2	S. 1-6$\frac{1}{32}$	1,512 10 0
12th December 1924	856 4 7	S. 1-5$\frac{15}{16}$	11,456 2 0
29th December 1924	31 0 0	S. 1-6$\frac{5}{32}$	419 13 0
TOTAL	1,366 14 9		17,197 1 0
1925.			
3rd January 1925	500 0 0	S. 1-6$\frac{1}{16}$	6,653 10 0
21st April 1925	124 0 0	S. 1-5$\frac{29}{32}$	1,699 0 6
4th May 1925	300 0 0	S. 1-5$\frac{15}{16}$	4,085 4 0
15th May 1925	379 2 7	S. 1-5$\frac{15}{16}$	5,072 11 0
25th May 1925	481 9 11	S. 1-5$\frac{15}{16}$	6,442 4 0
20th June 1925	455 19 10	S. 1-5$\frac{15}{16}$	6,069 5 0
1st July 1925	18 12 11	S. 1-5$\frac{15}{16}$	262 5 0
3rd September 1925	150 0 0	S. 1-6$\frac{5}{32}$	1,982 13 0
9th October 1925	30 0 0	S. 1-6$\frac{1}{8}$	397 4 0
5th November 1925	1,788 0 0	S. 1-6$\frac{5}{32}$	23,634 13 3
TOTAL	4,227 5 3		56,299 5 9

Date.	Value in Sterling.	Rate of Exchange.	Amount in
1926.	£ s. d.		Rs. A. P.
28th January 1926	56 14 2	S. 1-6$\frac{1}{8}$	750 14 9
23rd March 1926	91 5 1	S. 1-6	1,216 12 0
10th May 1926	1,592 6 11	S. 1-5$\frac{31}{32}$	21,268 3 0
20th June 1926	9 11 6	S. 1-6$\frac{1}{8}$	126 13 0
14th August 1926	1,700 0 0	S. 1-5$\frac{31}{32}$	22,192 0 0
18th August 1926	240 18 2	S. 1-5$\frac{31}{32}$	3,217 12 0
19th August 1926	1,536 0 0	S. 1-6$\frac{1}{32}$	20,303 12 0
,, ,, ,,	141 3 10	S. 1-6$\frac{1}{8}$	1,869 9 9
26th August 1926	78 2 10	S. 1-5$\frac{31}{32}$	1,041 1 0
11th September 1926	518 9 9	S. 1-5$\frac{31}{32}$	6,925 3 0
12th October 1926	562 11 3	S. 1-5$\frac{31}{32}$	7,513 14 0
14th November 1926	125 12 0	S. 1-6$\frac{5}{32}$	1,660 4 0
,, ,, ,,	562 0 2	S. 1-5$\frac{15}{16}$	7,572 5 0
,, ,, ,,	126 8 0	S. 1-6$\frac{6}{32}$	1,670 13 0
TOTAL	7,341 3 8		97,329 4 6

STATEMENT "G."

Statement of machinery purchased locally from 1923 to 1926.

	Rs. A. P.
1923	22,000 0 0
1924	18,248 3 9
1925	11,272 1 9
1926	2,040 11 0
TOTAL	53,561 0 6

Summary.

	Rs. A. P.
1922	1,49,760 0 0
1923	5,21,744 0 0
1924	17,197 1 0
1925	56,299 5 9
1926	97,329 4 6
Local purchase	53,561 0 6
TOTAL	8,95,890 11

STATEMENT "H."

Statement showing total expenditure on the production of matches during the last two years from 1st July 1924 to 30th June 1925 and 1st July 1925 to 30th June 1926.

—	1924-25.	1925-26.
	Rs. A. P.	Rs. A. P.
(1) Wood for making splints, veneers and packing cases	2,48,142 9 3	3,51,875 3 0
(2) Cost of papers	33,228 2 6	68,031 2 0
(3) Cost of chemicals	1,05,385 3 9	1,69,049 7 6
(4) Cost of other raw materials	1,05,455 15 0	1,03,471 0 9
(5) Factory labour	3,09,111 14 3	5,50,261 15 6
(6) Power and fuel	35,944 15 6	51,787 4 9
(7) Ordinary current repairs, etc.	*Nil*	1,12,407 6 6
(8) General services, etc.	*Nil*	*Nil*
(9) Miscellaneous, *e.g.*, rent, Municipal taxes, Insurance, etc.	37,166 0 0	91,480 3 6
(10) Depreciation bad debts, etc.	83,625 6 0	95,000 0 0
TOTAL	9,58,060 2 3	15,93,363 11 6
Total production of matches for the year	517,750 gross	1,087,150 gross

N.B.—The quantities given as manufactured by us in reply to question No. 7 represent the quantities manufactured during those calendar years.

STATEMENT "I."

Statement showing works cost per gross of matches.

—	1924-25.	1925-26.
	Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers	0 7 8	0 5 3
2. Cost of papers for label and wrapper	0 1 0	0 1 0
3. Cost of chemicals	0 3 3	0 2 6
4. Cost of other raw materials	0 3 3	0 1 7
5. Factory labour	0 9 7	0 8 0
6 Power and fuel	0 1 1	0 0 10
7. Ordinary current repairs, etc.	...	0 1 8
8. General services supervision, etc.	...	...
9. Miscellaneous, *e.g.*, rent, Municipal taxes, insurance, etc.	0 1 1	0 1 4
10. Cost of packing cases	*Nil*	*Nil*
NET TOTAL	1 10 11	1 6 2
Total production of matches for the year	517,750 gross	1,087,150 gross

(3) *Letter dated 10th March 1927.*

As desired we have the honour to forward herewith six copies of each of the following letters from Forest Officers of Burma Districts :—

(1) Letter No. 94-X-6307, dated 24th April 1924, from the Deputy Conservator of Forests, Toungoo.

(2) Letter No. 481-Xc-17, dated 7th May 1924, from the Deputy Conservator of Forests, Katha Division.

(3) Letter No. 2149-Nb-24, dated 29th May 1924, from the Deputy Conservator of Forests, Pyinmana Division.

(4) Letter No. 456-Xe-19, dated 9th June 1924, from the Divisional Forest Officer, Kaukkwe Division, Bhamo.

(5) Letter No. 384—2-23, dated 17th June 1924, from the Deputy Conservator of Forests, Myittha Division.

(6) Letter No. 1491-Xe-60, dated 19th July 1924, from the Deputy Conservator of Forests, Mengmit Forest Division, Mogok.

(7) Letter No. 1123-Nb.-11, dated 8th September 1924, from the Divisional Forest Officer, Lower Chindwin Division.

(8) Letter No. 68, dated 30th August 1926, from the Working Plans Officer, Insein Division.

No. 94-X6-307, dated Toungoo, the 24th April 1924.

From—C. G. E. DAWKINS, Esq., Deputy Conservator of Forests, North Toungoo Division, Toungoo,

To—ADAMJEE HAJEE DAWOOD & Co., LD., 91, Mogul Street, Rangoon.

Your letter dated 3rd April asking for information regarding timber for match manufacture.

Of the list of trees you give the following could be obtained from this Division :—

(1) In large quantities :
Didu, Leza.

(2) In fair quantities :
Yon, Letpan, Myaukngo, Chinyok, Nabe, Gwe, Tauksha, Thapan.

The Royalty on these is given below :
Leza Rs. 8 per ton.
Didu, Yon, Letpan, Myaukngo, Mau, Chinyok, Nabe, Bwe, Tauksha, Thapan, Rs. 4 per ton.

All the trees given above are procurable in any part of the Division. Extraction by local traders is in operation but as many of the species you want are not otherwise saleable they are usually left behind unextracted.

(Sd.)

Deputy Conservator of Forests,
North Toungoo Division.

No. 481-Xc.-17, dated Katha, the 7th May 1924.

From—J. M. L. MACKENZIE, Esq., Deputy Conservator of Forests, Katha Division, Katha,

To—M. H. K. MASTER, Esq., C/o Mr. Husain Khan, Azam Khan, Maymyo.

Your letter dated the 2nd April 1924. Certain of the timbers you mention can be obtained in moderate quantities in Katha Division. I am not prepared to commit myself to figures as I have nothing reliable to go by.

With regard to your specific enquiries Nos. 1, 2 and 3 will best be answered by a personal visit of exploration and enquiry among local traders. No. 4 can be ascertained from the Burma Gazette and the Forest Manual. The Conservator of Forests, Utilization Circle, is in a position to supply such information as you ask for the whole province.

I attach a tabular statement giving certain information but emphasize that I do not guarantee it nor am I in a position to define such expressions as " Plentiful " in terms of tons.

(Sd.)

Divisional Forest Officer,
Katha Division, M. B. M.

No.	Species.	Nature of Stock.	Situation.
1	Letkok . . .	Scarce . . .	Whole division.
2	Yon	Do. . . .	Do.
3	Ma-u	Plentiful . . .	Do.
4	Didu . . .	Do. . . .	Near Irrawaddy and Meza Chg.
5	Letpan . . .	Do. . . .	Whole Division.
6	Aukchinza . . .	Scarce . . .	Near Railway.
7	Myaukngo Ma-u Lettanshe.	Plentiful . . .	Near River and Railway.
8	Gyaungbya . .	Unknown . . .	Whole Division.
9	T'aungtamasok Pyinsit Petsut.	Very scarce . .	Do.
10	Kathit . . .	Do. . .	Do.
11	Yayaw Tayaw . .	Do. . .	Do.
12	Chinyok . .	Plentiful . . .	Near River and Railway.
13	Yemane . . .	Do. . . .	Whole Division.
14	Myauksoik . . .	Unknown . . .	Do.

No.	Species.	Nature of Stock.	Situation.
15	Kusan . . .	Scarce . . .	In accessible places.
16	Dwalok Tabo Myetwa.	Unknown . . .	Whole Division.
17	Leza	Scarce . . .	In accessible places.
18	Tawthidin . . .	Plentiful . . .	Whole Division.
19	Nabe	Do. . . .	Do.
20	Tinyu. . . .	Not known . . .	Do.
21	Taungpetwun . .	Scarce . . .	In accessible places.
22	Momaka Yene . .	Do. . . .	Do.
23	Ma-u Letpanshe . .	See 7	.....
24	Gwe	Plentiful . . .	Whole Division.
25	Binga . . .	Do. . . .	Do.
26	Letkok . . .	Scarce . . .	Do.
27	Shawni . . .	Plentiful . . .	Do.
28	Thayetkin Thayetkan.	Unknown . . .	Do.
29	Yehmyok . . .	Do. . . .	Do.
30	Tauksha . . .	Plentiful . . .	Do.
31	Kohe	Is said to be Local name for "Didu" (unknown).	Do.
32	Ywe-bok . . .	Unknown . . .	Do.
33	Thaphan . . .	Plentiful . . .	Do.

No. 2149-Nb.-24, dated Pyinmana, the 29th May 1924.

From—R. W. V. PALMER, Esq., Deputy Conservator of Forests, Pyinmana Division,

To—M. H. K. MASTER, C/o Mr. Husein Khan, Azam Khan, Maymyo.

In reply to your letter of April 3rd, 1924, attached form gives the information you require. Should you require further information, I suggest you visit this Division and judge for yourself as to the suitability or otherwise of the timber and the methods of extraction.

(Sd.)

Divisional Forest Officer,
Pyinmana Division.

Serial No.	Timber to be obtained in this Division.	Timber available in quantity.	Where found.	Royalty and Duty.
1	Lettok Taungmeek . .	2	Chiefly in the Haing Reserve 20 miles North West of Pyinmana.	Royalty on all species except Yamane Rs. 5 per ton. Yamane Rs. 6 per ton.
2	Taungsaga . .	3		
3	You	4		
4	Didu	5		
5	Letpan	6		
6	Auchinza . . .	7		
7	Myaukngo	9		
8	Maulettanshe . .	10		
9	Mau. Maugaungdon . .	11		
10	Taungtamasok . . .	12		
11	Pyinsit Potsut . . .	15		
12	Thitsawbwa . . .	16		
13	Kathit	18		
14	Tayaw Kayaw . . .	19		
15	Chinyok	20		
16	Yamane	21		
17	Myaukseik Pyaukseik .	23		
18	Kushan	30		
19	Dwalok Tabo Myothlwa .	...		
20	Leza	...		
21	Thawthidin . . .	...		
22	Nabe	...		
23	Momaka	...		
24	Taungpetwun . . .	...		
25	Mau Lettanshe . . .	...		
26	Gwe	...		
27	Binga	...		
28	Letkok	...		
29	Thayetkin Thayetsan .	...		
30	Shawne	...		
31	Tauksha	...		
32	Kohe	...		
33	Ywe bok	...		
34	Thapan	...		

No. 456-Xe-19, dated Bhamo, the 9th June 1924.

From—G. M. TURNER, Esq., Divisional Forest Officer, Kaukkwe Division, Bhamo,

To—Messrs. ADAMJEE HAJEE DAWOOD & Co., LD., 91, Mogul Street, Rangoon.

GENTLEMEN,

Reference your letter of the 3rd April 1924 to my address regarding suitable species for match manufacture found in this division practically all the species mentioned in your list with the exception of Pine are found in various parts of the division.

Yon, Letpan, Maulettanshe, Taungpetwun, Thayet, Kohe and Thapan are found in large quantities everywhere.

Yon, Letpan and Thapan may be extracted very cheaply from the Kaukkwe Kyaukkyi and Kangu Ranges. Extraction of other species is not so easy but still not difficult and will be slightly more expensive.

The royalty on Yamane is Rs. 6 per ton, all the other species are classed as other unreserved and the rate of royalty is Rs. 2 per ton.

I have the honour to be,

Gentlemen,

Your most obedient servant,

(Sd.)

Divisional Forest Officer,
Kaukkwe Division.

सत्यमेव जयते

No. 384—2-23, dated Mawlaik, the 17th June 1924.

From—W. J. G. COOPER, Esq., Extra Deputy Conservator of Forests, Myittha Division, Mawlaik,

To—Mr. M. H. K. MASTER, C/o Mr. Husain Khan, Azam Khan, Maymyo.

SIR,

Reference your letter dated 2nd April 1924, making inquiries about timber for match making please see attached list of kinds of woods and area in which available. Most of the species you require are of the unreserved kind the duty on which is only Re. 1 per ton. The list shows which kinds are mostly available. You may either get local traders to work for you and deliver it at Alon (Monywa) railway siding or you may register a hammer mark and work it out with your own men.

(Sd.)

Divisional Forest Officer,
Myittha Division.

List of timber for Match wood.

Mahamyaing or Massein.	Kale or Kalewa.	Mingin.	Maukkadaw.	Indin or Kalemyo.
Lettok.	Letpan.	Pyaukseik.	Lettok.	Aukchinza.
Taungsagó	Momaka.	Mau.	Yon.	Lettok.
Yon.		Yon.	Mau.	Mau.
Letpan.		Nabe.	Didu.	Kathit.
Aukchinza.		Kusau.	Letpan.	Shawni.
Maulettanshe.		Maulettanshe.	Aukchinza.	Binga.
Petsut.		Thapan.	Maulettanshe.	Yemane.
Kathit.		Letpan.	Petsut.	Kusau.
Chinyok.		Aukchinza	Kathit.	Maulettanshe.
Yemane.		Chinyok.	Chinyok.	Chinyok.
Pyaukseik.		Yemane.	Yemane.	Gwe.
Kusau.		Yathabye.	Pyaukseik.	Momaka.
Tawthidin.		Gwe.	Kusau.	Pyaukseik.
Nabe.		Binga.	Tawthidin.	Thaphan.
Momaka Yethabye.		Htinshu.	Nabe.	Yon.
Gwe.			Momaka Yethabye.	Nabe.
Binga.			Binga.	Htinshu.
Shawni.			Shawni.	Letpan.
Thayet.			Thaphan.	
Thaphau.			Ywebok.	
Myaukngo.				

Range officers report that the following kinds of timber can be found in their Ranges as noted below.

Letpan Didu Mau Maugaungdon	Can be found in small quantity in Kunchaung Range on the Shweli River.
Letpan	Can be found in largest quantity in Wainglon Range on Shweli River.
Letpan	Can be found in largest quantity in Upper Shweli Range on Shweli River.
Yon Mau Letpan Aukchinza Myaukngo Taungtama Pyaukseik Kusan Nabe Taungpetwun Tauksha Thaphan	Can be found in small quantity in Name-Unreserved Forests Name Range on the Shweli River.
Mau Maugaungdon Myaukngo Maulettanshe Nabe Binga Tauksha Thaphan	Can be found in fair quantities in Name Range on the Shweli River.
Letpan	Can be found in fair quantities in Momeik Range on the Shweli River.
Letpan Mau Nabe Binga Tauksha Thaphan Kohe	Can be found in small quantity in Nga O Range on the Shweli River.

The other species are scarce in this Division.

No. 1123-Nb.-11, dated Monywa, the 8th September 1924.

From—J. L. HEFFERMAN, Esq., Deputy Conservator of Forests, Lower Chindwin Division, Monywa,

To—Mr. M. H. K. MASTER, C/o Mr. Husain Khan, Azam Khan, Maymyo.

MEMO.

Reference your letter No. *nil*, dated 3rd April 1924.

The following kinds of timber are available in my division :—

Letpan obtainable from Kani Kabaing and Pagyi Ranges.

Yon, Didu, Aukchinza, Petsut, Tayaw, Kuzan, Nabe, Shawni and Thaphan obtainable from Kani Range.

The royalty payable under licenses to extract timber from public forest land shall be levied at the rate of Rs. 2 per ton.

The cost of extraction of any of the above woods from this part of Burma to Rangoon will I am afraid make their use prohibitive.

(Sd.)

Divisional Forest Officer,

Lower Chindwin Division.

Letter No. 68, dated 30th August 1926.

From—C. W. SCOTT, Esq., Working Plans Officer, Insein Division,

To—Messrs. ADAMJEE HAJEE DAWOOD & Co., LD., 91, Mogul Street, Rangoon.

SIR,

I have the honour to say that the Conservator of Forests, Working Plans Circle, Maymyo, has authorized me to supply you with the accompanying data and information on the strict understanding that they are not official or necessarily final.

2. Table I shows for 5 important matchwood species the numbers of trees of 5′ or over at the point of felling which are estimated to exist at the present time in the whole Mahuya Reserve and about one-third of the Paunglin Reserve.

3. Table II shows similar date but down to 8″ diameter the smallest size counted in the enumerations of last season.

4. To be on the safe side I think it advisable to regard the probable outturn from such species as *mondaing, odein, setkadon, myaukngo* and *yemane* assuming that you find these suitable and extract them as only compensating for the defective or inaccessible trees of the five species included in my tables and not therefore as likely to increase the available matchwood supplies.

5. Further more I consider it a conservative guess to put the available supplies in the remaining two-thirds of the Paunglin Reserve, *i.e.*, the portion of your lease area in which no matchwood countings have been done at the same figure as the counted portion of the Paunglin Reserve (8,000 trees). It is true that the un-counted area is about double the size of the counted area but it includes remote areas probably too expensive to work and a Karen taungya area which is not likely to yield much matchwood.

6. In view of the above I estimate that your whole lease area contains at the present moment about 31,000 matchwood trees above 5′ in girth at point of felling and reasonably sound and accessible for extraction.

7. These trees are growing and it is thought that growth will bring at least another 7,500 trees above the girth limit during the period of your 15-year lease in coupes not already worked over.

8. I estimate the possible outturn of your whole lease area therefore at about 2,500 trees per annum for the 15-years of your lease. It is obvious that this figure is very liable to require correction according to the new species you may find it possible to use the areas you may find it impossible to work the proportion of trees you may wish to reject on account of fluting crookedness, etc.

9. I gather that the felling cycle for your lease area is likely to be fixed provisionally at 15 years, *i.e.*, that you will be allowed to fell and extract from each coupe or compartment only once in the 15 years of your lease. Thereafter if your lease is extended you will be able to return to the compartments already worked and extract from them again. Experiments are contemplated to measure the rate of growth of matchwoods in various types of jungle and the felling cycle will be subject to revision after 7 years in accordance with the results of these experiments. It is possible that it might be found necessary to lengthen it. I think it very improbable that it will be shortened.

I have the honour to be,

Sir,

Your most obedient servant,

(Sd.)

MATCHWOODS IN INSEIN DIVISION.

TABLE I.

Based on enumerations made in 1926.

Estimated numbers of matchwood trees of 4′ 6″ breast height girth and over (5′ at point of felling).

—	Species.	16*—20″.	20—24″.	24—28″.	28—32″.	Diameter Classes. 32″ and over.	Total.	—
Mahnya Reserve (Whole area)	Sawbya . .	4,003	2,977	961	163	50	8,154	* Figures in this column are only half the total enumerated and shown in Table II as half the trees in this diameter class are estimated to be below 4′ 6″ girth at breast height (5′ point of felling).
	Gwe . .	1,701	895	269	99	69	3,033	
	Man . .	484	812	539	306	408	2,549	
	Didu . .	270	263	224	114	206	1,077	
	Letpan . .	3	12	6	10	4	35	
					GRAND TOTAL .		14,848	
Paunglin Reserve (29 compartments) only out of a total for the whole reserve of 100 compartments averaging 1 square mile in area.	Sawbya . .	1,280	1,017	302	75	39	2,713	
	Gwe . .	957	835	331	67	93	2,283	
	Man . .	164	438	235	137	179	1,153	
	Didu . .	337	446	228	181	419	1,611	
	Letpan . .	2	...	5	3	11	21	
					GRAND TOTAL .		7,781	

The 30th August 1926.

C. W. SCOTT,
W. P. O. Insein.

MATCHWOODS IN INSEIN DIVISION.

TABLE II.

Based on enumerations made in 1926.

Estimated numbers of matchwood trees of 8″ diameter and over.

——	Species.	8—12″.	12—16″.	16—20″.	20—24″.	24—28″.	28—32″	32″ and over.	Total.	——
Mahuya Reserve (Whole area).	Sawbya .	17,990	15,353	8,006	2,977	961	163	50	45,500	The minimum girth prescribed in the Dawood lease (5′ at point of felling 4′ 6″ at breast height) is considered to fall about the middle of this diameter class.
	Gwe .	8,305	7,312	3,402	895	269	99	69	20,351	
	Mau .	853	933	969	812	589	306	408	4,820	
	Didu .	1,213	848	541	263	224	114	206	3,409	
	Letpan .	42	21	7	12	6	10	4	102	
		28,403	24,467	12,925	4,959	1,999	692	737	74,182	
Paunglin Reserve 29 compartments only out of a total for the whole a reserve of 160 compartments averaging 1 square mile in area.	Sawbya .	2,074	3,134	2,560	1,017	302	75	39	9,201	
	Gwe .	2,474	2,594	1,915	835	331	67	93	8,309	
	Mau	288	332	329	438	235	137	179	1,938	
	Didu .	1,139	763	674	446	228	181	419	3,859	
	Letpan .	...	3	5	...	5	3	11	27	
		5,975	6,826	5,483	2,736	1,101	463	741	23,325	

The 30th August 1926.

C. W. SCOTT,
W. P. O., Insein.

(4) *Supplementary Statements submitted by Messrs. Adamjee, Hajee Dawood & Co., Ltd.*

SUPPLEMENTARY STATEMENT No. 1.

Prospectus of the Swedish Match Company.

A LIMITED LIABILITY COMPANY INCORPORATED UNDER THE LAWS OF SWEDEN.

Share Capital.

Issued 900,000 " A " shares of 100 Swedish Crowns each, carrying one vote per share.

Being issued 900,000 " B " shares of 100 Swedish Crowns each, carrying 1/1,000th vote per share.

(At exchange 16·66 Crowns to £1, 100 Swedish Crowns = £6.)

Offer for sale of 271,500 " B " shares of 100 Swedish Crowns each at the price of £7 4s. 0d. per share.

Under Swedish Law not more than one-fifth of the voting power of the Company may be held by the foreign interest. In view, however, of the international nature of the business of the Company it has been thought desirable that such foreign interests should be allowed to hold a larger proportion than one-fifth of the Company's share capital and the creation of the " B " shares carrying a reduced voting power is being effected for this purpose. The total shares at present issued which are available for unrestricted transfer to foreign interests are the 178,500 " A " shares quoted in London. The whole of the 900,000 " B " shares, however, will carry such unrestricted transfer rights.

The " B " shares will, as from 1st January 1925, rank *pari passu* with the existing " A " shares of the Company in all respects other than voting. They will not, however, participate in dividends declared in respect of the year 1924, but in lieu thereof holders will receive 4·50 Swedish Crowns per share, which at exchange 16·66 Crowns to £1, represents approximately interest at 7 per cent. per annum to 31st December 1924, calculated as regards £3 13*s*. 6*d*. per share as from 14th May 1924, and as regards £3 10*s*. 6*d*. per share as from 1st July 1924. This interest will be sent by the Company to registered holders of the shares on 5th January 1925, and in the case of shares registered in the name of the Royal Exchange Assurance as mentioned later, the interest will be paid on presentation of the definitive certificates to Messrs. Higginson & Co., for marking on and after 5th January 1925. In the past the Company has paid dividends annually in April or May, but it is the intention in future to pay interim dividends.

The Company has outstanding the following funded debts :—

(1) 20,000,000 Swedish Crowns 7 per cent. Mortgage debentures, repayable in whole or in part at the Company's option, between 1932 and 1946.

(2) 12,800,000 Swedish Crowns (balance of 15,000,000 issued) 7½ per cent. Mortgage debentures, repayable by annual instalments by 1931.

The Company also guarantees jointly and severally with two of its subsidiaries the principal and interest in respect of 15,000,000 6½ per cent. Bonds of the International Match Corporation of America.

The following information is based upon the letter of the Managing Director of the Swedish Match Company, set out within, to which applicants are referred for full particulars:—

(1) The Company controls 20 Match factories in Sweden, 42 match factories outside Sweden, and holds other important interests in the match industry.

(2) The production of the Swedish factories alone represents over one-fifth of the total world production. Of the Swedish production 96 per cent. is exported and of this 80 per cent. is shipped or financed through London.

(3) The proceeds of the shares now being offered here and in Sweden will be used for the erection of factories in India and for the extension of existing, and the acquisition of additional interests in Europe and other countries.

(4) The expenditure on the Indian factories alone is conservatively estimated to result in a saving of 8,600,000 rupees per annum, which is equal at present exchange to more than 10½ per cent. on the new 900,000 shares.

(5) Dividends which are paid without deduction on account of Swedish taxes, have averaged over 12 per cent. since 1918 and it is anticipated that this rate of dividend will be maintained on the increased capital.

(6) On the basis of a 12 per cent. dividend with exchange 16·66 Crowns to £1, the yield on the issue price of £7 4*s*. 0*d*. is 10 per cent.

The purchase price is payable as follows:—

	Per share. £	*s*.	*d*.
On application	1	0	0
On 14th May 1924	2	13	6
On 1st July 1924	3	10	6
	7	4	0

Application should be made on the accompanying form and sent to Messrs. Higginson & Co., 80, Lombard Street, London, E. C. 3, or Barclays Bank Limited, 54, Lombard Street, London, E. C. 3, or any of their branches together with a remittance for the amount payable on application.

If any application be accepted for less than the amount applied for the balance of the application money will be appropriated towards the amount payable on 14th May 1924, and any surplus then remaining will be returned, and where any application is not accepted the application money will be returned in full. Failure to pay any instalment when due will render the previous payment liable to forfeiture and the acceptance liable to cancellation.

Interest at the rate of 8 per cent. per annum will be charged on instalments in arrear.

Scrip Certificates to bearer will be issued by Messrs. Higginson & Co. in exchange for letters of acceptance on which the amount payable on 14th May 1924 has been paid. Definitive Certificates will be delivered as soon

as ready in exchange for fully paid Scrip. The Definitive Certificates stamped in accordance with English law will be registered in the name of the Royal Exchange Assurance and will be endorsed by them in blank, thus making the shares transferable on the market by delivery without payment of further stamp duty. The holders of these certificates will be able, if they so desire, to be registered as holders of the shares in the books of the Company in Sweden.

The 900,000 " B " shares, of which the 271,500 shares now being offered for sale form part, have been offered to " A " shareholders for subscription in Sweden, share for share at £7-1-0 or alternatively 125 Swedish Crowns per share. For the convenience of the holders of 178,500 " A " shares, Nos. 720,501 to 899,000 quoted in London, Messrs. Higginson & Co. have agreed to purchase 178,500 " B " shares, from Mr. Ivar Kreuger, a shareholder, and Managing Director of the Company at £7 1*s.* less 6*s.* 6*d.* per share, and by arrangement with the Company have agreed to offer by advertisement to the holders of the above-mentioned 178,500 " A " shares the right to purchase from them at £7 1*s.* per share one " B " share for each share held in lieu of their right to subscribe for shares in Sweden. Out of this commission of 6*s.* 6*d.* per share Messrs. Higginson & Co. are paying a guaranteeing commission, brokerage, and all the expenses connected with their offer to shareholders, together estimated to amount to about 3*s.* 6*d.* per share.

The 271,500 " B " shares now offered for sale are also being purchased from Mr. Kreuger the price being £7 4*s.* less 9*s.* per share. Messrs. Higginson & Co. are paying 3*s.* per share underwriting commission, 9*d.* per share overriding commission, brokerage of 1*s.* 3*d.* per share and all the expenses of this offer, including advertising.

The usual practice in Sweden in making an issue is for the Directors to offer the new shares to shareholders subject to the approval of the shareholders at an Extraordinary General Meeting to be held not less than one week later. This practice has been adopted in the present case, and the Directors' offer of 900,000 " B " shares to the shareholders and the present offer are subject to the approval of the shareholders at a meeting to be held on 5th May 1924. Messrs. Higginson & Co. have satisfied themselves that such approval will be forthcoming.

Application will be made to the Committee of the London Stock Exchange for permission to deal in the 271,500 " B " shares now offered for sale, and in the 178,500 " B " shares being offered to shareholders as mentioned above, and an official quotation will be applied for in due course.

Copies of the certificate of incorporation and of the bye-laws of the Company, and a copy of the agreement under which Messrs. Higginson & Co. are acquiring the shares from Mr. Ivar Kreuger, the original letter from the British Auditors and the original Consolidated Balance Sheet, copy of which accompanies this prospectus, can be seen at the offices of Messrs. Linklaters & Paines, 2, Bond Court, Walbrook, London, at any time during business hours while the list remains open.

A brokerage of 1*s.* 3*d.* per share will be paid in respect of accepted applications from the public, bearing the stamp of any broker, banker or other approved agent.

Copies of these particulars and forms of application may be obtained from Messrs. Higginson & Co., from the Head Office and Branches of Barclays Bank Ld., and from the Brokers for this offer.

Dated 1st May 1924.

17, VASTRA TRADGARDSGATAN,
Stockholm, 28th April 1924.

MESSRS. HIGGINSON & Co.,
LONDON.

DEAR SIRS,

In connection with the new issue of shares in the Swedish Match Company I take pleasure in giving you the following information.

History and present position.

The Swedish Match Company was incorporated in 1917, with a capital of 45,000,000 Crowns, to effect an amalgamation of interests in the Swedish Match industry, and is a direct continuation of the Jonkoping Match Manufacturing Company, whose business was established in 1845. It owns the ordinary share capital of the Jonkoping and Vulcan Match Manufacturing Company and the ordinary and preference share capital of the United Swedish Match Factories Company. Through these two subsidiaries it owns 20 match factories in Sweden, valuable timber lands of a total area of about 120,000 acres well situated in relation to the different factories, a sulphite and paper mill, three important engineering works specialising in the production of match manufacturing machinery, three chemical plants, three lithographic printing works and a number of other undertakings auxiliary to the match industry. The production of the paper mill, chemical plants and engineering works is largely in excess of the requirements of the Company's Swedish factories, and the excess production is disposed of under contract to foreign competitors. The production of matches of the Swedish factories alone represents over one-fifth of the total world production. Of the Swedish production of matches about 96 per cent. is being exported and of this the percentage shipped or financed through London is steadily increasing and is now about 80 per cent.

During 1922 the share capital of the Swedish Match Company was increased to 90,000,000 Crowns by issuing 450,000 new shares of which about two-fifths were placed on the British market. Out of the proceeds of that issue the Company acquired the control of a number of important foreign match concerns previously competing with the Company, thereby increasing its revenue to a considerable extent, and strengthening its position in the match market.

The Company also controls through stock ownership The International Match Corporation, a company incorporated in America last year to take over from the Swedish Match Company and other important competitive groups interested in the match industry, the greater part of or the entire share capitals of companies owning 42 match factories in various European and other countries. The value of the interests thus acquired by the International Match Corporation in exchange for shares was approximately $28,000,000, of which approximately $15,000,000 represented the value of the interests transferred by the Swedish Match Company. In order to procure working capital for the International Match Corporation an issue of $15,000,000 6½ per cent. bonds was placed on the American market in November last carrying the guarantee of the Swedish Match Company, and its two main subsidiaries. The proceeds of this bond issue are being used for the acquisition of investments in north and south America and in the Far East. Among the assets taken over was the entire share capital of a company owning a large match manufacturing plant in Canada, and this factory is now being developed and supplied with machinery of Swedish type.

In the Far East the International Match Corporation has already secured the control of some very important match factories, and negotiations for an extended influence in the match business in that part of the world are progressing in a satisfactory manner.

In addition to the above-mentioned holdings the Swedish Match Company has other extensive investments abroad and maintains friendly relations with all important competitors.

Past profits and dividends.

Share capital, profits, dividends and sales during the period 1910-23 will be seen from the table below :—

	Ordinary share Capital.	Net profit.	Profit in per cent. earned on ordinary share Capital.	Dividends in per cent. paid on ordinary share Capital.	Sales of Matches.*
	Crowns.	Crowns.			Crowns.
1910 . .	3,000,000	1,169,478	38·98	6	13,402,918
1911 . .	3,000,000	898,929	29·96	8	13,446,212
1912 . .	3,000,000	888,313	29·61	8	17,426,536
1913 . .	3,000,000	863,453	28·78	9	18,208,256
1914 . .	3,000,000	1,282,430	42·75	10	21,201,304
1915 . .	3,000,000	4,674,385	155·81	10	38,864,925
1916 . .	3,000,000	5,441,586	181·39	12	55,902,927
1917 . .	6,000,000	3,298,784	54·98	12	53,319,644
1918 . .	45,000,000	7,776,026	17·28	12	66,509,291
1919 . .	45,000,000	11,831,170	26·29	14	89,296,155
1920 .	45,000,000	11,436,010	25·41	14	137,646,274
1921 . .	45,000,0 0	8,680,342	19·29	12	111,375,683
1922 . .	45,000,000	9,249,317	20·53	12	125,368,663
1923 . .	90,000,000	17,477,834	19·42	12	132,618,720

Prior to 1918, the above statement represents the position of the Jonkoping and Vulcan Match Manufacturing Company only. Commencing with 1918 the capital is that of the Parent Company and the profits given are those of the Parent Company and its two main subsidiaries after deducting interest on all bonds and debts, amortisation of plants, income and war taxes actually paid during the year, bonus to Directors and employees, and other charges of similar nature and dividends on the Preference shares of the Jonkoping and Vulcan Match Manufacturing Company, not owned by the Swedish Match Company.

* This represents sales of matches by the Company's Swedish factories and the Company's proportion of match sales by controlled foreign factories.

In accordance with Swedish Law the taxes in respect of the profits of the Company are paid before dividends are declared. Accordingly no deduction in respect of Swedish taxes is made in the dividends paid to the shareholders.

Assets and Liabilities.

The following is a copy of a letter received from Messrs. Whinney, Murray & Co., the British Auditors of the Company:—

14, PLACE DE MEIR, ANVERS,
23rd April 1924.

To the Directors of the Swedish Match Company and to Messrs. Higginson & Co., London.

GENTLEMEN,

In accordance with your instructions, we have examined the Books and Accounts of the Swedish Match Company and the Balance Sheets and Schedules relative thereto of the Jonkoping and Vulcan Match Manufacturing Company, the United Swedish Match Factories Company and 20 other Swedish Subsidiary Companies as at 31st December 1917 and 1923, and have prepared therefrom the annexed consolidated Balance Sheet as at 31st December 1923.

We have verified the Cash and Securities of the Swedish Match Company by actual inspection or by certificates from the depositories.

We have also had produced to us Balance Sheets at 31st December 1923 or other confirmatory information to substantiate the value at which the "Shares in and advances to Foreign Subsidiaries and Associated Companies and other Miscellaneous Investments" stand in the Books.

We are of the opinion that the annexed consolidated Balance Sheet presents a correct view of the aggregate state of affairs of the 23 combined companies as at 31st December 1923, according to the best of our information and the explanations given to us and as shown by the Books and Accounts of the Swedish Match Company and the Balance Sheets at that date of the other 22 Swedish companies combined in the annexed Balance Sheet.

Yours faithfully,
WHINNEY, MURRAY & COMPANY,
Chartered Accountants.

I have no hesitation in stating that the assets as appearing in the consolidated balance sheet prepared by Messrs. Whinney, Murray & Co., are conservatively valued.

Purpose of issue.

The proceeds of the issue of 900,000 "B" shares will be used for the extension of existing interests and the acquisition of additional interests abroad. As a considerable part of the proceeds will be expended on strengthening the Company's position in India, some details of the conditions of the match trade in that country may be interesting.

Before the War the Indian Match market was, and even now is, almost entirely held by Swedish and Japanese interests, the local production of matches being practically negligible. During the War on account of lack of freight facilities the Swedish proportion, which had previously been about 30 per cent. of the total trade, was lost entirely to Japan. During recent years, however, the Swedish interests have made great progress and have more than regained their position, their proportion of the trade being now 40 per cent.

For some years heavy duties have been imposed on the import of matches into India, and the question of establishing local factories there on a large scale has been under consideration. After careful investigation it has been

decided to embark upon this policy and match factories are now being erected at Bombay, Calcutta, Madras and Karachi all of which will commence operation during 1924, and it is expected that commencing with 1925 a highly satisfactory return will be obtained. On the basis of the quantity of matches shipped from Sweden to India during the second half of 1923, it is conservatively estimated that when these factories are in full operation the yearly saving in import duty by manufacturing in India will be 86,00,000 rupees which alone, at present exchange, is equivalent to over 10½ per cent. on the present increase in capital. In addition the existing sales organisation in India will be largely extended.

In other parts of the world opportunities of an extraordinary nature are presenting themselves for the profitable investment of capital; recently acquired manufacturing interests in Poland are to be extended, and it is contemplated that a substantial sum will be invested in the French Match Industry which up to now has been a Government monopoly. The Company has been approached by and is at present negotiating with several foreign governments with a view to taking over the match industry in their respective countries as private monopolies. The experience and technical resources of the Company, as well as its connections in all parts of the world, put it in a very favourable position for negotiations of this kind, and it may therefore be assumed that any business transacted on these lines will be on terms which are satisfactory to the Company and which will bring an ample return on the capital invested.

Prospects and future dividends.

In view of the above-mentioned developments and the favourable opportunities now offering for investment in the match industry, the writer is strongly of opinion that the expenditure of the proceeds of the new share capital will at least sufficiently increase the Company's profits as to enable it to maintain the present dividend of 12 per cent. on the increased capital.

Yours faithfully,
IVAR KREUGER,
Managing Director.

SWEDISH MATCH COMPANY.

CONSOLIDATED BALANCE SHEET AS AT 31ST DECEMBER 1923.

(Combining Swedish Match Company and twenty-two Swedish subsidiary Companies.)

Capital and Liabilities.

	S. Kr.	S. Kr.
To Capital—		
Authorised and issued—		
900,000 shares of S. Kr. 100 each, fully paid		90,000,000·00
To Share Capital and proportion of surplus in combined companies not owned by Swedish Match Company, Jonkoping and Vulcan Match Manufacturing Company, 16,387·6 per cent. Preference shares of S. Kr. 1,000 each, fully paid with accrued dividend	17,370,220·00	
Other subsidiary companies	48,333·70	
		17,418,553·7

	S. Kr.	S. Kr.	S. Kr.
To Mortgage Debentures :—			
Swedish Match Company—			
7 per cent. "A" series Debentures	20,000,000·00		
7½ per cent. "B" series Debentures	12,800,000·00		
		32,800,000·00	
Jonkoping and Vulcan Match Manufacturing Company—			
5 per cent. Debentures		963,000·00	
Alby New Chlorate Company—			
5 per cent. Debentures		570,000·00	
Katrinefors Company—			
5 per cent. Debentures	1,411,000·00		
5½ „ „	3,864,000·00		
		5,275,000·00	
			39,608,000·00
To Mortgage loans and Bank and Other guaranteed or secured advances			28,290,724·54
„ Employees' Saving Bank and other deposits or funds			464,250·39
„ Sundry creditors and credit balances			29,422,713·85
„ Reserve Funds			80,000,000·00
„ Profit and Loss Account			22,757,114·65
Subject to taxation (estimated at S. Kr. 2,320,000) on profits for year 1923			307,961,357·13

	S. Kr.
Contingent Liabilities—	
1. Guarantee for the International Match Corporation Debentures	15,000,000·00
2. Discounted Trade Bills and other contingent liabilities	26,966,023·17

Assets.

	S. Kr.
By Freehold land, forests, buildings, Plant and machinery, Railway sidings, steamboats, barges, motor craft, rolling stock, live stock, etc., owned by the 23 combined companies, at cost to Swedish Match Company, *less* Depreciation	125,767,945·39
„ Patents, Trade marks and Experimental Costs	1·00
„ Office furniture	1·00
„ Shares in and advance to foreign subsidiary and Associated companies and other Miscellaneous Trade Investments	77,745,558·94

(NOTE.—There is a contingent liability of Swiss Francs 2,200,000 in respect of uncalled Capital on certain shares included above.)

	S. Kr.	S. Kr.
By Stock in trade as certified by Officials of the Company at cost or under :—		
1. Stock of matches	10,147,260·00	
2. Stocks of raw materials, etc. . . .	17,573,951·86	
		27,721,211·86
„ Sundry debtors and debit balances		61,829,825·61
„ Swedish and foreign Government bonds		2,296,463·15
„ Cash at Bankers and in hand		12,600,350·18
		307,961,357·13

Consolidated Balance Sheet referred to in our letter of the 23rd April 1924.

WHINNEY, MURRAY & CO.,
Chartered Accountants.

ANTWERP,
23rd April 1924.

SUPPLEMENTARY STATEMENT No. 2.

SVENSKA TANDSTICKS AKTIEBOLAGET.

(The Swedish Match Company.)

Directors' Report for the year 1924.

The Board of Directors of the Svenska Tandsticks Aktiebolaget have pleasure in submitting their Report for the year 1924.

Considerable progress has been made in international business relations during the past year. The rise in sterling together with the stabilisation of the exchange in Germany and Poland and other countries have brought about a material improvement in the conditions of the general export trade. The match industry has also been beneficially influenced by the above-mentioned conditions and the majority of markets can now be considered to have regained to a large extent their stability. The sales of matches from the company's factories in Sweden have during the past year somewhat exceeded the sales of 1923.

The working days have during the whole of the year comprised 4½ days per week which is the same number of working days as during the three last quarters of 1923. During the first quarter of 1923 the factories were running only three days per week.

The selling prices which have been obtained have been comparatively satisfactory.

Compared with pre-war conditions the sales of matches manufactured in Sweden during the year under review measured by weight have fallen below the total sales of 1913 by about 4 per cent. With a view to strengthening the power of competition the Swedish Match Company has for certain markets gone over to the manufacture of smaller and lighter types of matches which in comparison with their weight represent a larger number of matches and boxes. The Swedish Match industry can now therefore be considered to have fully regained the sales total prevailing during 1913. As however on account of taxation and increased tariff protection in a large number of markets the world's match export trade in 1924 was less than two-thirds of the 1913 figure it will be seen that the sales of matches of Swedish manufacture now represent a much higher percentage of the world's match export made than before the war.

The company's investments in foreign match concerns have increased considerably and the construction of new match factories in various countries has proceeded in a satisfactory manner. In this regard the company's new match factories in India may especially be mentioned. Those in Bombay and Calcutta started operating during the past year and the matches produced at these factories have already gained an important trade on the Indian market.

With a view to enable the company to issue such shares as may without restrictions be held by foreign subjects the company has during the past year made alterations in its Articles of Association and accordingly a new type of shares called " B " shares carrying 1/1,000th vote only has been created.

In conjunction with Messrs. Higginson & Company, Bankers of London, a new issue has been made during the past year of 900,000 shares of the " B " category. The majority of these shares which are quoted on the London Stock Exchange have been absorbed by the English market.

The Company's American subsidiary the International Match Corporation has during the past year given notice of the redemption of their $15,000,000 Bond Issue. To obtain funds for the redemption of these Bonds preference shares have simultaneously been issued for a corresponding amount. The Swedish Match Company's guarantee of this Bond Issue has consequently been cancelled.

It is the policy of the Swedish Match Company to let profits made by subsidiaries remain with these to a large extent and only transfer to the parent company so much profit as is required to comfortably pay the dividend of the parent company. In this way considerable saving in taxes is effected and reserves are created in the books of the subsidiary companies. From the Profit and Loss Account remaining from 1923 has been paid 4 per cent. interim dividend for 1924, as well as certain taxes and expenses in connection with the new Share Issue.

The Profit and Loss Account and the Balance Sheet per 31st December 1924 are given below :—

Profit and Loss Account, 1924.

INCOME.

	Kr.
Balance of profit from previous year	2,808,381·51
Sundry accounts	20,789,541·30
TOTAL	23,597,922·81

EXPENDITURE.

	Kr.	Kr.
General expenses		1,657,477·72
Profit transferred from 1923	2,808,381·51	
Net profit 1924	19,132,063·58	
Balance per 31st December 1924		21,940,445·09
TOTAL		23,597,922·81

Balance sheet per 31st December 1924.

Assets.

	Kr.
Cash in hand and at Bank	52,341,650·16
Bonds	4,164,743·13
Sundry debtors	51,690,509·50
Stock matches	7,231,350·00
Foreign investments and constructions	35,158,461·66

Shares.

	Kr.	Kr.
5,994 ordinary shares in Jonkopings och Vulcans Tendsticksfabriksaktiebolag	34,964,976·10	
2 preference shares in Jonkopings och Vulcans Tandsticksfabriksaktiebolag	2,000·00	
152,496 ordinary shares in Aktiebolaget Forenade Svenska Tandsticksfabriker	48,493,728·00	
27,500 preference shares in Aktiebolaget Forenade Svenska Tandsticksfabriker	8,745,000·00	
568,000 shares in International Match Corporation	6,407,622·04	
34,996 shares in Trummer & Co. Successors Ld.	630,000·00	
484,550 shares in J. John Masters & Co., Ld.	9,070,932·00	
996 shares in The Swedish Chinese Export and Import Co., Aktiebolag	100,000·00	
845 shares in Katrinefors Aktiebolag	5,915,000·00	
18,496 shares in Aktiebolaget Ofverums Bruk	4,600,000·00	
5,996 shares in Aktiebolaget Skogsegondomar	600,000·00	
1,846 shares in Alby Nya Kloratfabriks Aktiebolag	1,850,000·00	
1,996 shares in Elektrolytiska Aktiebolaget Trollhattan	200,000·00	
3,996 shares in Aktiebolaget Siefvert and Fornander	400,000·00	
96 shares in Aktiebolaget Lowenadler & Co.	50,000·00	
1,196 shares in Svenska Tandsticksbolagets Forsaljningsaktiebolag	120,000·00	
		179,317,858·14
Office furniture		1·00
Total		329,904,578·59

LIABILITIES.

	Kr.
Share capital	180,000,000·00
Reserve Fund	81,541,081·42
Debenture Loan	31,575,000·00
Sundry creditors	14,848,047·08
Profit and Loss Account	21,940,445·09
Discounted trade bills and other contingent liabilities Kr. 25,194,180·04.	
	329,904,573·59

The profit at the disposal of the Annual General Meeting amounts to Kr. 21,940,445·09 and the Directors propose that same should be distributed as follows:—

	Kr.
a dividend of 12 per cent. on the "A" shares less 4 per cent. interim dividend paid in October 1924 to be paid to the share-holders	7,200,000·00
and the balance to be carried forward to the 1925 profit and loss account. The Board of Directors ask authorization of the General Meeting to pay during the latter part of the year out of profit and loss account an interim dividend of 4 per cent.	14,740,445·09

Stockholm, the 21st of March 1925.

BERNDT HAY.
O. EYDBECK.
OSCAR ROEMPKE.
RAGNAR LILJENROTH.
J. O. ROOS AT HJELMSATER.
BERNDT HASSELROT.
G. AKERS DOUGLAS.
K. DAHLBERG.
ARTHUS E. ZACHAN.
GUNNAR MELLGREN.
TORSTEN JUNG.
IVAR KREUGER.
J. W. HILLS.
H. LAURITZEN.
C. A. LOWENADLER.
L. WESTBERG.
KRISTER LITTORIN.

SUPPLEMENTARY STATEMENT No. 3.

SVENSKA TANDSTICKS AKTIEBOLAGET.

17, VESTRA TRADGARDEGATAN,

STOCKHOLM.

Stockholm, April 16th, 1925.

P. O. Box 414.

Adamjee Hajee Dawood, Esq.,
Mogul Street,
Rangoon.

DEAR MR. DAWOOD,

Having safely returned to Stockholm from my flying trip to India and Burmah I want to write you a few lines thanking for the pleasant though fruitless negotiations we carried on during my stay in Rangoon and also for your kind hospitality.

Being yourself a match manufacturer it might be of some interest to you to see the results of our company's activity during last year. Therefore I enclose our Director's Report for that year.

By now I suppose you have learnt about the course we took when it proved impossible to bring your and our interests under one and the same hat. To be quite candid I should have preferred to send our technical staff to your factory instead whereby we should have been able to take care of the Burmah market in a more efficient way from the very beginning. I repeat what I told you verbally that we have let go an opportunity which in all probability never will offer itself to the same advantage as just now. The future will show whether this my conception is right or wrong.

Best regards.

Yours sincerely,

KRISTER LITTORIN.

SUPPLEMENTARY STATEMENT No. 4.

Y. Nakamura & Co.,
Yamaguchi Bank Building,
No. 50, 2, Chome Sakayemachi,
Kobe (Japan).
Kobe, 1st March 1927.

Messrs. Adamjee Hajee Dawood & Co., Ld.,
Rangoon.

DEAR SIRS,

We are in receipt of your letter dated 26th January . The contents have been noted with thanks.

We have this pleasure to hand you our Invoice No. 162 for the shipment of balance of your order on Cow Head labels, and beg to say that as the credit through the Chartered Bank's balance was short by Yen 357·93, against the total amount of our invoice, we have drawn this value by 30 days sight bill separately through this same Bank, on the same shipping documents, which please note, and will thank you to kindly protect our signature when presented.

We have received to-day a cable from our Bombay friends stating that the new duty question is finally decided to-day and remains unchanged. This will mean the match factories in India will have the identical year as that of last year, regard the duty question.

We understand that the Swedish Match Company (Wimco), people are dumping the matches into your market, at a ridiculously cheap rate, which of course, is intended to stamp out the manufacturing of matches in your market. These people are very independent and they try to ruin the market of every place in India. They have factories in Calcutta and Bombay, and they are competing desperately in these markets also.

We hear that they intend to have a factory in Rangoon and Madras, and it may be perhaps, they are now trying to dump the goods in your market with the intention to aim for a purchase of some factory at your district, who may become tired of making further matches.

This kind of motive they always use when they aim for their want. They have come to Japan, and have amalgamated in ½ shares with three large people of match makers, and to-day our Japanese people are losing more money than what they were doing alone. They probably wish to govern the whole world in match field. Our Japanese people are now worried why

they have not sold everything to the Swedish concern, instead of reserving half share in business. This is for your information.

We remain,
Dear Sirs,
Yours faithfully,
Y. NAKAMURA & CO.

SUPPLEMENTARY STATEMENTS Nos. 5 TO 7.

Letter from Messrs. Adamjee Haji Dawood and Company, Limited, Rangoon, to the Secretary, Tariff Board, Rangoon, dated the 28th March 1927.

We have the honour to forward herewith three statements as required by the Board during the first two days of our oral evidence.

(1) Statement of comparison of prices between Aspen wood imported from Japan and Aspen wood imported from Europe. (Copies of latest quotation from Japan are also sent herewith.)

(2) Statement showing the c.i.f. prices of matches imported from Japan also average selling price in Rangoon.

(3) Statement showing proportion of wastage of wood.

We have stated in our replies to the questionnaire that 156 gross boxes of matches could be manufactured from one ton of wood and the Board had asked us what proportion of this one ton was required for making splints and what proportion for making veneers. We may inform you that out of the one ton of 50 cubic feet are required for splints and 28 cubic feet for veneers.

SUPPLEMENTARY STATEMENT No. 5.

Aspen wood from Europe.

Invoice No. 7932.

	£	s.	d.
57 logs of Aspen wood = 15·293 cubic metres at £5-11-0 per cubic metre	84	17	6
Interest	0	14	6
	85	12	0

	Rs.	A.	P.
Exchange 1-6$\frac{1}{32}$*d.*	1,139	6	0
Duty	169	11	0
Chellan	23	4	0
Railway freight	12	15	0
Unloading charges	14	4	0
TOTAL	1,359	8	0

	Ton.	c.	ft.
Cubic metres 15·293	8	26	0

	Rs.	A.	P.
i.e., 8 tons 25 c. ft.	1,359	8	0
1 c. ft.	3	3	0

Timber imported from Japan.

Invoice No.	Cubic feet.	Yens.
106	1122·8994	2,189·65
107	11199·7599	21,447·54
110	8800·1615	16,720·31
116	4999·5230	8,639·02
118	2231·6645	3,791·71
126	4624·5332	7,527·73
127	2094·6991	3,402·06
131	3973·3526	6,262·38
132	3760·2508	6,089·69
134	4451·3934	7,441·74
143	3912·0725	6,618·56
	51172·2399	90,130·39

i.e., Yen 1·76 per cubic foot c.i.f. Rangoon=Rs. 2-4-6 per cubic foot c.i.f. Rangoon.

Copy of telegram from Messrs. Y. Nakamura & Company, Limited, Kobe, dated 12th February 1927.

NATIC—We offer firm c.i.f. shipment within 2 months.
YEHKY—150 tons.
WUCSA—Aspen wood.
LEAKD—Yen 2.

Telegram from Messrs. Y. Nakamura & Company, Limited, Kobe, dated 17th March 1927.

NATIC—We offer firm c.i.f. shipment within 2 months.
YEHUJ—250 tons Aspen wood.
UHHUL—Telegraph if you will.
GOSTO—Fresh.
ONOBZ—Best quality.
LIPYT—180.
RAFAZ—Sens.
GABEK—Cubic feet.
ACLOM—Recommend accepting.

SUPPLEMENTARY STATEMENT No. 6.

Statement showing the c.i.f. prices of matches imported from Japan also average selling prices in Rangoon.

Year.	C.i.f. price in Rupees per 50 gross.	Duty *ad valorem.*	Landing charges.	Average selling price per 50 gross.
	Rs. A.		Rs. A. P.	Rs.
1912	23 4	5 %	0 6 0	25
1913	23 12	,,	,,	25
1914	23 8	,,	,,	26

SUPPLEMENTARY STATEMENT No. 7.

Statement showing proportion of wastage.

For the purpose of explaining the wastage and loss in logs of large and small girths, we give below the cunical measurements of 5 logs of various sizes.

Diameter.	Circumference.	Girth.	Length.	Cubic Contents.
2′	$\frac{44'}{7}$	6′-3″	2′	4′-9″—0
1′—10″	$\frac{121}{21}$	5′-9″	2′	4′-1″—0
9″	$\frac{33}{14}$	2′-4″	2′	0′-7″—0
7″	$\frac{11}{6}$	1′-10″	2′	0′-4″—0
3½″	$\frac{11}{12}$	0′-11″	2′	0′-1″—0

When a log of 2 feet in diameter or 6′ 3″ in circumference is handled, about the first two inches is practically shaved away until a clean and round circumference is obtained, so as to ensure regular veneering. This log is veneered right down to the core and about 3½ inches is left which is too soft or of no use so that actual veneer obtained is 24 inches, less 2″ *plus* 3½″ or a net of 18½ inches.

In the case of a log 9″ in diameter or 2′ 4″ in girth, the same loss of about 2″ for shaving occurs and the core of no use is about the same as that of a large log, *viz.*, 3½″, so that the actual veneer obtained is 9″ less 2″ *plus* 3½″ or a net 3½″.

SUPPLEMENTARY STATEMENT No. 8.

Aspen wood.

1 ton of 50 c. ft. Fresh Aspen wood including bark weighs about lbs. 3,187, about 15 per cent. of this has to be rejected for being dried on the way to India, *i.e.*, from 1 ton of Aspen wood, we actually get about 2,710 lbs. of good wood.

2710=356¼	lbs.	Bark.
142¼	,,	Ends.
237	,,	Central portion at 3½″ Girth.*
365¼	,,	Veneers.
338¾	,,	Wastage in chopping.
555½	,,	Wastage in drying.
47¼	,,	Wastage in cleaning.
33¾	,,	Shortage.
2,076⅔	lbs.	
633⅓	,,	Splints.
2,710	lbs.	

that means that we get 633⅓ lbs. of splints from 1 ton of Aspen wood.

1 lb.=7,820 splints (size 1·75 mm.×1·75 mm.×50 mm.)

633⅓ lbs.=4,953,970 splints from 1 ton of Aspen wood,

about 10 per cent. of these splints are wasted in the following processes :—

(1) Levelling, (2) Frame filling, (3) Paraffining, (4) Dipping, (5) Emptying, (6) Hand filling.

Actually we get about 4,458,573 splints from 1 ton of Aspen wood.

1 box contains 85 splints on an average.

About 52,454 boxes contain 4,458,573 splints.

About 364 gross of boxes can be manufactured from 1 ton of Aspen wood.

156 gross of boxes can be manufactured from 21½ c. ft. of Aspen wood.

---

* This is for German machines. In Japanese Peeling machines, only 1½ Central Portion is wasted.

N.B.—If this Aspen wood is worked in Japan, about 20 per cent. more output can be obtained.

SUPPLEMENTARY STATEMENT No. 9.

Letter, dated 18th April 1927.

With reference to your letter No. 289, dated the 9th instant, we have the honour to forward herewith a statement (with six spare copies) showing freight, insurance, landing, loading and unloading charges incurred per 50 gross of matches when exported to the ports mentioned in the said statement.

We also enclose a copy of the speech* of Mr. Ivar Kreuger, Managing Director of the Swedish Match Company, as promised.

Port.	Distance from Rangoon. Miles.	Freight from Rangoon per 50 gross.	Landing, loading and unloading charges per 50 gross.	Insurance charges per 50 gross.
		Rs. A. P.	Rs.	Rs. A. P.
Tavoy	258	3 8 0	2	0 6 0
Mergui	409	4 8 0	2	0 6 0
Akyab	479	3 8 0	2	0 6 0
Chittagong	635	3 8 0	2	0 6 0
Tuticorin	1,407	5 8 0	2	0 8 0
Madras	1,000	4 0 0	2	0 8 0
Gopalpore	557	5 8 0	2	0 8 0
Cocanada	867	5 8 0	2	0 8 0
Cuddalore	1,155	7 0 0	2	0 8 0
Calcutta	779	3 8 0	2	0 6 0
Cochin	1,585	5 8 0	2	0 8 0
Bombay	2,117	5 8 0	2	0 8 0
Calicut	1,645	6 0 0	2	0 8 0
Karachi	2,650	11 8 0	2	0 8 0
Nagapatam	1,280	5 8 0	2	0 8 0
Vezagapatam	833	5 8 0	2	0 8 0
Kobe	3,802	3 0 0	...	...

* Printed separately.

Article.	Date of Receipt.	From Where.	Quantity Received.	Invoice Amount.	Exchange Rate.	Amount.	Customs duty.	Landing Charges.	Agents Commission.	Total Amount.	Cost per lb.
			lbs.			Rs. A. P.	Rs. A. P.	Rs. A. P.	Rs. A. P.	Rs. A. P.	Rs. A. P.
Amorphos Phosphorus	28th December 1923	Great Britain	2,200	£ 244 2 3	1-5 5/32	3,448 9 0	517 5 0	5 0 0	86 3 0	4,057 1 0	1 13 6
,, ,,	17th January 1927	,, ,,	4,400	,, 392 5 0	1-6	5,230 0 0	776 15 0	10 0 0	170 2 0	6,187 1 0	1 6 6
Chlorate of Potash	31st January 1924	Germany	34,160	,, 431 0 11	1-5 5/16	6,018 15 0	902 14 0	45 0 0	150 7 0	7,117 4 0	0 3 4
,, ,, ,,	8th February 1927	Great Britain	22,400	,, 293 4 6	1-6	3,909 11 0	578 14 0	30 0 0	115 0 0	4,633 9 0	0 3 3
Antimony Trisulphide	28th December 1923	Japan	3,332	Yens 472·20	150	708 7 0	106 5 0	7 0 0	17 10 0	839 6 0	0 4 0
,, ,,	7th January 1927	Germany	6,600	£ 138 0 0	1-6	1,200 11 0	275 11 0	15 0 0	14 13 0	1,506 3 0	0 3 8
Manganese Dioxide	28th December 1923	Japan	9,330	Yens 752·65	150	1,147 14 0	172 3 0	4 8 0	28 10 0	1,353 3 0	0 2 3
,, ,,	8th February 1927	Germany	8,828	£ 63 15 8	1-6	850 7 0	126 3 0	5 0 0	26 4 0	1,007 14 0	0 1 9
Bichromate of Potash	18th December 1923	Great Britain	2,448	,, 55 2 0	1-4 17/32	814 7 0	122 3 0	3 8 0	19 8 0	959 10 0	0 6 3
,, ,, ,,	25th September 1926	,, ,,	3,260	,, 61 15 9	1-5 23/32	828 2 0	131 0 0	4 0 0	22 9 0	985 11 0	0 4 10
Glass Powder	28th December 1923	Japan	4,565	Yens 180·00	150	270 0 0	40 8 0	5 0 0	6 12 0	322 4 0	0 1 2
,, ,,	31st January 1927	Germany	22,000	£ 90 0 0	1-6 1/32	1,197 15 0	179 12 0	24 0 0	14 8 0	1,416 3 0	0 1 0
Sulphur Flower	28th December 1923	Japan	665	Yens 530 50	150	804 11 0	...	8 0 0	20 2 0	832 13 0	0 2 0
,, ,,	16th February 1927	Germany	4,480	£ 22 12 4	1-5 31/32	302 1 0	*nil*	11 0 0	*nil*	313 1 0	0 1 1
White Zinc	28th March 1924	Japan	448	Yens 99·35	140½	141 8 0	21 4 0	1 0 0	3 8 0	167 4 0	0 6 0
,, ,,	27th August 1926	Germany	13,230	£ 218 8 11	1-5 15/16	2,922 12 0	620 3 0	13 8 0	102 1 0	3,658 8 0	0 4 9
Glue	28th December 1923	Great Britain	13,440	,, 373 0 0	1-5 3/16	5,202 0 0	780 5 0	15 0 0	130 0 0	6,127 5 0	0 7 3
,,	16th June 1926	Germany	2,240	,, 60 6 2	1-5 15/16	806 15 0	121 6 0	1 12 0	25 11 0	955 12 0	0 6 10
Iron Oxide	30th April 1924	Japan	9,331	Yens 619·87	132⅛	828 0 0	124 3 0	9 0 0	20 6 0	981 9 0	0 1 8
Potato Starch	5th May 1924	Great Britain	2,207	£ 26 19 10	1-4 11/32	388 15 0	58 6 0	4 0 0	9 11 0	461 0 0	0 3 4
,, ,,	3rd February 1927	Holland	19,890	,, 177 16 9	1-6 1/32	2,367 1 0	351 8 0	27 0 0	72 6 0	2,817 15 0	0 2 3
Paraffin Wax	2nd February 1924	Rangoon	2,240	...	...	490 0 0	...	...	...	490 0 0	0 3 6
,, ,,	28th February 1927	,,	8,854	...	...	2,075 3 0	...	...	...	2,075 3 0	0 3 9
Printing Inks	26th November 1925	Japan	2,440	Yens 2547·27	111¼	2,833 13 0	79 8 0	20 0 0	60 13 0	2,994 2 0	1 3 7
,, ,,	7th February 1927	,,	4,460	,, 4082·68	135	5,511 10 0	273 14 0	41 0 0	*nil*	5,826 8 0	1 4 10
Printing Papers	26th November 1925	Japan	4,338	,, 671·42	111¼	746 15	119 2 0	5 0 0	18 10 0	889 11 0	0 3 3
,, ,,	14th December 1925	,,	24,765	,, 5034·46	111½	5,600 13 6	891 0 6	27 0 0	140 0 0	6,658 13 0	0 3 7
Zinc Sheets	28th December 1923	Belgium	90,000	£ 1,026 14 0	1-5 3/16	14,337 0 0	2,150 9 0	140 0 0	358 4 0	16,985 13 0	0 3 0
,, ,,	25th February 1927	,,	2,595	,, 55 6 3	1-5 23/32	741 6 0	111 3 0	4 0 0	17 9 0	874 2 0	0 5 4
Glass Match Papers	31st January 1924	Sweden	121,648	9,841 11 6	1-5 3	29,602 14 0	4,004 0 0	280 0 0	817 7 0	38,898 14 0	0 5 5

SUPPLEMENTARY STATEMENT No. 11.

There are three places from where the wood are being cut and are brought over to Vlavivostock and they are :—

1. All along the boundaries of the railway line from Harbin in Manchuria to Vladivostock the distance of about 3 to 400 miles and the wood from this district is called here " Toshin " because of it being brought by the Toshin Railway Company.

2. All along the railway line from Khabarovsk in Siberia to Vladivostock distance of about 4 to 500 miles and the wood from this district is called here the " Ussuri " because of the wood obtained from the Ussuri Railway line of the Siberian Railway running toward Amur and to Europe.

3. Are those brought over from Northern Corea and from the South of Vladivostock. But these are rather poor quality and no one will try to buy them unless the wood from the other two districts are short supplied.

Vladivostock is the shipping port and the timbers are brought here for shipment and the above 1st and 2nd mentioned lot are the principal lots that are shipped in large quantities.

The Aspen tree that are growing in Manchuria are more or less thinner and these are preferred to the thick one because the latter have more waste through the rot and the redish spot in the centre of the timber, etc. In Manchuria the climate changes from about 100 degree Fahr. in summer to zero in winter and through many storm and heavy blow with rain, etc., the tree generally get heavily beaten and older it grows more rot they get through this unpleasant beating of the climate and spoils the wood by breaking of the branches therefrom the timbers of say about foot in diameter usually arrive with large reddish spot in the centre at the pith and it is a habit of this wood to get spoiled from the centre and this is found most in the Toshin wood.

The timber wood will have less of this dark spot in the pith but still we calculate that by using this Toshin wood we could get but much less quantity of 1st class splints than from the Ussuri wood because of the dark spot in the pith of the Roshin wood is comparatively larger than the Ussuri. It often happens that in large wood which has a large dark pith the peeling work is rather difficult and the centre circle come right off and loses the catch of revolving when placed on the peeling machine. It is therefore recommendable not to buy thick ones of Toshin but from 6″ to 1 foot in diameter at the most. But it will be not economical to import these thin wood alone to India because the freight rate on these thin ones will cost much more in comparison to the thick ones because the freight is charged on the waste of wood covering the Bark, etc.

The wood that are growing in Siberia along the line of Ussuri are far better in quality because all along the Eastern coast of Siberia in the Province of Primorskaya there are Mountains and no plains like that in Manchuria which protects the Tree growing in this district from storm and wind and have more regular climate all through the year.

The tree growing along this district are all very straight and has a healthy appearance having small spot in the Pith and more of the white parts. This will give more 1st quality white splints.

The timbers are mostly cut during the winter when snow is abundant and sledged to the railway station and transported to Vladivostock by rail and stored there till summer months. A very few are cut in summer because it is difficult to transport from the mountains to the station.

Knowing these facts we are trying always for the Ussuri wood and we intimately in touch with one who has the branch in Siberia.

The wood are bought on contract from the Russian Government Monopoly and the price there is nominal all round fixed by the Russian Gold Roubles which exchange rate fluctuates very fast at time which at present is about Yen 188· to 100 Roubles. Although the price is fixed in Gold Roubles there

is practically no Gold therefore the Government exchanges documents and takes security at the time of binding the contract either transverted in U. S. Gold or Japanese currency.

We have tried to entertain business with the Russian merchants direct and ship the Timbers direct from Vladivostock to Bombay but after going into details we find that it is very risky to treat business with the Russian people. Very many said experiences have been learnt by our people that no one will treat the business unless with the Government Monopoly direct and for so doing it is important to have some one in Siberia to check the measurement, the quality, etc., etc.

SUPPLEMENTARY STATEMENT No. 12.

Statement showing species of wood used by Messrs. Adamjee Hajee Dawood and Company.

No.	Burmese Name.	Botanical name.
1.	Sawbya	Sterculia Campanulata.
2.	Bomeza	Albizzia stipulata.
3.	Didu	Bombax insigne.
4.	Gwe	Spondias mangifera.
5.	Letpan	Bombax malabaricum.
6.	Maulettanshe	Sarcocephalus cordatus.
7.	Taung Meok	Alstonia scholaris.
8.	Setkadon	Trewia nudiflora.
9.	Pine	
10.	Yamne	Gmelina arborea.

SUPPLEMENTARY STATEMENT No. 13.

The List will be closed on or before Wednesday, the 7th day of May 1924.

SVENSKA TÄNDSTICKS AKTIEBOLAGET. (THE SWEDISH MATCH COMPANY).

A Limited Liability Company incorporated under the Laws of Sweden.

SHARE CAPITAL.

900,000 issued. "A" Shares of 100 Swedish Crowns each, carrying one vote per Share.

900,000 being issued. "B" Shares of 100 Swedish Crowns each, carrying 1/1,000th vote per Share.

(At exchange 16·66 Crowns to £1, 100 Swedish Crowns = £6.)

Offer for sale of 271,500 "B" shares of 100 Swedish Crowns each.

(Numbered 1,078,501 to 1,350,000.)

At the price of *£7 4s. 0d.* per share.

Under Swedish Law not more than one-fifth of the voting power of the Company may be held by foreign interests. In view, however, of the inter-

national nature of the business of the Company it has been thought desirable that such foreign interests should be allowed to hold a larger proportion than one-fifth of the Company's share capital and the creation of the "B" Shares carrying a reduced voting power is being effected for this purpose. The total Shares at present issued which are available for unrestricted transfer to foreign interests are the 178,500 "A" Shares quoted in London. The whole of the 900,000 "B" Shares, however, will carry such unrestricted transfer rights.

The "B" Shares will, as from 1st January 1925, rank *pari passu* with the existing "A" Shares of the Company in all respects other than voting. They will not, however, participate in dividends declared in respect of the year 1924, but in lieu thereof holders will receive 4·50 Swedish Crowns per share, which at exchange 16·66 Crowns to £1, represents approximately interest at 7 per cent. per annum to 31st December 1924, calculated as regards £3-13-6 per Share as from 14th May 1924, and as regards £3-10-6 per Share as from 1st July 1924. This interest will be sent by the Company to registered holders of the shares on 5th January 1925, and in the case of shares registered in the name of the Royal Exchange Assurance as mentioned later, the interest will be paid on presentation of the definitive certificates to Messrs. HIGGINSON & Co., for marking on and after 5th January 1925.

In the past the Company has paid dividends annually in April or May, but it is the intention in future to pay *interim* dividends.

The Company has outstanding the following funded debt:—

(1) 20,000,000 Swedish Crowns 7 per cent. Mortgage Debentures, repayable in whole or in part at the Company's option, between 1932 and 1946.

(2) 12,800,000 Swedish Crowns (balance of 15,000,000 issued) 7½ per cent. Mortgage Debentures, repayable by annual instalments by 1931.

The Company also guarantees jointly and severally with two of its subsidiaries the principal and interest in respect of $15,000,000 6½ per cent. Bonds of the International Match Corporation of America.

The following information is based upon the letter of the Managing Director of the Swedish Match Company, set out within, to which applicants are referred for full particulars:—

(1) The Company controls 20 match factories in Sweden, 42 match factories outside Sweden, and holds other important interests in the match industry.

(2) The production of the Swedish factories alone represents over one-fifth of the total world production. Of the Swedish production 96 per cent. is exported, and of this 80 per cent. is shipped or financed through London.

(3) The proceeds of the shares now being offered here and in Sweden will be used for the erection of factories in India and for the extension of existing, and the acquisition of additional, interests in Europe and other countries.

(4) The expenditure on the Indian factories alone is conservatively estimated to result in a saving of 8,600,000 Rupees per annum, which is equal at present exchange to more than 10½ per cent. on the new 900,000 shares.

(5) Dividends which are paid without deduction on account of Swedish taxes, have averaged over 12 per cent. since 1918, and it is anticipated that this rate of Dividend will be maintained on the increased Capital.

On the basis of a 12 per cent. Dividend with exchange 16·66 Crowns to £1, the yield on the issue price of £7-4-0 is 10 per cent.

Messrs. Higginson & Co., 80, Lombard Street, London, E. C. 3, will receive applications for the purchase from them of the above 271,500 "B" Shares either direct or through Barclays Bank Limited, 54, Lombard Street, London, E. C. 3, and Branches, at the price of £7 4*s*. 0*d*. per Share.

The purchase price is payable as follows:—

	Per share £ s. d.
On Application	1 0 0
On 14th May 1924	2 13 6
On 1st July 1924	3 10 6
	7 4 0

Application should be made on the accompanying form and sent to Messrs. Higginson & Co., 80, Lombard Street, London, E. C. 3, or Barclays Bank Limited, 54, Lombard Street, London, E. C. 3, or any of their Branches, together with a remittance for the amount payable on application.

If any application be accepted for less than the amount applied for the balance of the application money will be appropriated towards the amount payable on 14th May 1924, and any surplus then remaining will be returned, and where any application is not accepted the application money will be returned in full. Failure to pay any instalment when due will render the previous payment liable to forfeiture and the acceptance liable to cancellation.

Interest at the rate of 8 per cent. per annum will be charged on instalments in arrear.

Scrip Certificates to bearer will be issued by Messrs. Higginson & Co. in exchange for letters of acceptance on which the amount payable on 14th May 1924, has been paid. Definitive Certificates will be delivered as soon as ready in exchange for fully paid Scrip. The Definitive Certificates stamped in accordance with English law will be registered in the name of the Royal Exchange Assurance, and will be endorsed by them in blank, thus making the shares transferable on the market by delivery without payment of further Stamp Duty. The holders of these Certificates will be able, if they so desire, to be registered as holders of the shares in the books of the Company in Sweden.

The 900,000 " B " shares, of which the 271,500 shares now being offered for sale form part, have been offered to " A " shareholders for subscription in Sweden, share for share, at £7 1*s.* or alternatively 125 Swedish Crowns per share. For the convenience of the holders of 178,500 " A " shares, Nos. 720,501 to 899,000 quoted in London, Messrs. Higginson & Co. have agreed to purchase 178,500 " B " shares from Mr. Ivar Kreuger, a shareholder and Managing Director of the Company at £7 1*s.* less 6*s.* 6*d.* per share, and by arrangement with the Company have agreed to offer by advertisement to the holders of the above-mentioned 178,500 " A " shares the right to purchase from them at £7 1*s.* per share one " B " share for each share held in lieu of their right to subscribe for shares in Sweden. Out of this commission of 6*s.* 6*d.* per share Messrs. Higginson & Co. are paying a guaranteeing commission, brokerage, and all the expenses connected with their offer to Shareholders, together estimated to amount to about 3*s.* 6*d.* per share.

The 271,500 " B " shares now offered for sale are also being purchased from Mr. Kreuger the price being £7 4*s.* less 9*s.* per share. Messrs. Higginson & Co. are paying 3*s.* per share underwriting commission, 9*d.* per share overriding commission, brokerage of 1*s.* 3*d.* per share and all the expenses of this offer, including advertising.

The usual practice in Sweden in making an issue is for the Directors to offer the new shares to shareholders subject to the approval of the shareholders at an Extraordinary General Meeting to be held not less than one week later. This practice has been adopted in the present case, and the Directors' offer of 900,000 " B " shares to the shareholders and the present offer are subject to the approval of the shareholders at a Meeting to be held on 5th May 1924. Messrs. Higginson & Co. have satisfied themselves that such approval will be forthcoming.

Application will be made to the Committee of the London Stock Exchange for permission to deal in the 271,500 " B " shares now offered for sale, and

in the 178,500 " B " shares being offered to shareholders as mentioned above, and an official quotation will be applied for in due course.

Copies of the Certificate of Incorporation and of the bye-laws of the Company, and a copy of the agreement under which Messrs. Higginson & Co. are acquiring the shares from Mr. Ivar Kreuger, the original letter from the British Auditors and the original Consolidated Balance Sheet, copy of which accompanies this prospectus, can be seen at the offices of Messrs. Linklaters & Paines, 2, Bond Court, Walbrook, London, E. C. 4, at any time during business hours while the List remains open.

A brokerage of 1*s.* 3*d.* per share will be paid in respect of accepted applications from the public, bearing the stamp of any Broker, Banker or other approved agent.

Copies of these particulars and forms of application may be obtained from Messrs. Higginson & Co., from the Head Office and Branches of Barclays Bank Limited, and from the Brokers for this offer.

Dated, 1st May 1924.

MESSRS. HIGGINSON & Co.,

80, Lombard Street, London, E. C.

17, Västra Trädgardsgatan, Stockholm.

28th April 1924.

DEAR SIRS,

In connection with the new issue of shares in Svenska Tändsticks Aktiebolaget (The Swedish Match Company) I take pleasure in giving you the following information.

History and present position.

The Swedish Match Company was incorporated in 1917, with a capital of 45,000,000 Crowns, to effect an amalgamation of interests in the Swedish match industry, and is a direct continuation of the Jönköping Match Manufacturing Company whose business was established in 1845. It owns the ordinary share capital of the Jönköping & Vulcan Match Manufacturing Company and the ordinary and preference share capital of the United Swedish Match Factories Company. Through these two subsidiaries it owns 20 match factories in Sweden, valuable timber lands of a total area of about 120,000 acres well situated in relation to the different factories, a sulphite and paper mill, three important engineering works specialising in the production of match manufacturing machinery, three chemical plants, three lithographic printing works and a number of other undertakings auxiliary to the match industry. The production of the paper mill, chemical plants and engineering works is largely in excess of the requirements of the Company's Swedish factories, and the excess production is disposed of under contract to foreign competitors. The production of matches of the Swedish factories alone represents over one-fifth of the total world production. Of the Swedish production of matches about 96 per cent. is being exported and of this the percentage shipped or financed through London is steadily increasing, and is now about 80 per cent.

During 1922 the share capital of the Swedish Match Company was increased to 90,000,000 Crowns by issuing 450,000 new shares, of which about two-fifths were placed on the British market. Out of the proceeds of that issue the Company acquired the control of a number of important foreign match concerns previously competing with the Company, thereby increasing its revenue to a considerable extent, and strengthening its position in the match market.

The Company also controls through stock ownership The International Match Corporation, a company incorporated in America last year to take over from the Swedish Match Company and other important competitive groups interested in the match industry, the greater part of or the entire share capitals of companies owning 42 match factories in various European and other countries. The value of the interests thus acquired by the International

Match Corporation in exchange for shares was approximately $28,000,000, of which approximately $15,000,000 represented the value of the interests transferred by the Swedish Match Company. In order to procure working capital for the International Match Corporation an issue of $15,000,000 6½ per cent. bonds was placed on the American market in November last carrying the guarantee of the Swedish Match Company, and its two main subsidiaries. The proceeds of this bond issue are being used for the acquisition of investments in North and South America and in the Far East. Among the assets taken over was the entire share capital of a company owning a large match manufacturing plant in Canada, and this factory is now being developed and supplied with machinery of Swedish type.

In the Far East the International Match Corporation has already secured the control of some very important match factories, and negotiations for an extended influence in the match business in that part of the world are progressing in a satisfactory manner.

In addition to the above-mentioned holdings the Swedish Match Company has other extensive investments abroad and maintains friendly relations with all important competitors.

Past Profits and Dividends.

Share capital, profits, dividends and sales during the period 1910-1923 will be seen from the table below:—

—	Ordinary Share Capital.	Net Profit.	Profit in per cent. earned on Ordinary Share Capital.	Dividends in per cent. paid on Ordinary Share Capital.	Sales of Matches.*
	Crowns.	Crowns.			Crowns.
1910 . .	3,000,000	1,169,478	38·98	6	13,402 018
1911 . .	3,000,000	898,929	29·96	8	13,446,212
1912 . .	3,000,000	888,313	29·61	8	17,426,536
1913 . .	3,000,000	863,453	28·78	9	18,208,256
1914 . .	3,000,000	1,282,430	42·75	10	21,201,304
1915 . .	3,000,000	4,674,385	155·81	10	38,864,925
1916 . .	3,000,000	5,441,586	181·39	12	55,902,927
1917 . .	6,000,000	3,298,784	54·98	12	53,319,644
1918 . .	45,000,000	7,776,026	17·28	12	66,509,291
1919 . .	45,000,000	11,831,170	26·29	14	89,296,155
1920 . .	45,000,000	11,436,010	25·41	14	137,646,274
1921 . .	45,000,000	8,680,342	19·29	12	111,375,683
1922 . .	45,000,000	9,240,317	20·53	12	125,368,663
1923 . .	90,000,000	17,477,834	19·42	12	132,618,720
1924 . .	...	...	...	...	...
1925 . .	...	...	...	...	...
1926 . .	...	...	...	...	...

* This represents sales of matches by the Company's Swedish factories and the Company's proportion of match sales by controlled foreign factories.

Prior to 1918, the above statement represents the position of the Jönköping and Vulcan Match Manufacturing Company only. Commencing with 1918 the capital is that of the Parent Company and the profits given are those of the Parent Company and its two main subsidiaries after deducting interest on all Bonds and debts, amortisation of plants, income and war taxes actually paid during the year, bonus to Directors and employees, and other charges of similar nature, and dividends on the Preference shares of the Jönköping and Vulcan Match Manufacturing Co., not owned by the Swedish Match Company.

In accordance with Swedish Law the taxes in respect of the profits of the Company are paid before dividends are declared. Accordingly no deduction in respect of Swedish taxes is made in the dividends paid to the shareholders.

Assets and Liabilities.

The following is a copy of a letter received from Messrs. Whinney, Murray & Co., the British Auditors of the Company:—

14, Place de Meir,
Anvers,
23rd April 1924.

To the Directors of Svenska Tändsticks Aktiebolaget, 17, Västra Trädgardsgatan, Stockholm. (The Swedish Match Company), and to Messrs. Higginson & Co., 80, Lombard Street, London, E C. 3, British Fiscal Agents of the Swedish Match Company.

GENTLEMEN,

In accordance with your instructions, we have examined the Books and Accounts of the Swedish Match Company and the Balance Sheets and Schedules relative thereto of the Jönköping and Vulcan Match Manufacturing Company, the United Swedish Match Factories Company and twenty other Swedish Subsidiary Companies as at 31st December 1917 and 1923, and have prepared therefrom the annexed Consolidated Balance Sheet as at 31st December 1923.

We have verified the Cash and Securities of the Swedish Match Company by actual inspection or by certificates from the depositories.

We have also had produced to us Balance Sheets, at 31st December 1923, or other confirmatory information to substantiate the value at which the "Shares in and advances to Foreign Subsidiaries and Associated Companies and other Miscellaneous Investments" stand in the Books.

We are of the opinion that the annexed Consolidated Balance Sheet presents a correct view of the aggregate state of affairs of the twenty-three combined Companies as at 31st December 1923, according to the best of our information and the explanations given to us and as shown by the Books and Accounts of the Swedish Match Company and the Balance Sheets at that date of the other twenty-two Swedish Companies combined in the annexed Balance Sheet.

Yours faithfully,
WHINNEY, MURRAY & CO.,
Chartered Accountants.

I have no hesitation in stating that the assets as appearing in the Consolidated Balance Sheet prepared by Messrs. Whinney, Murray & Co., are conservatively valued.

Purpose of Issue.

The proceeds of the issue of 900,000 "B" shares will be used for the extension of existing interests and the acquisition of additional interests abroad. As a considerable part of the proceeds will be expended on strengthening the Company's position in India, some details of the conditions of the match trade in that country may be interesting.

Before the War the Indian match market was, and even now is, almost entirely held by Swedish and Japanese interests, the local production of matches being practically negligible. During the War on account of lack of freight facilities the Swedish proportion, which had previously been about 30 per cent. of the total trade, was lost entirely to Japan. During recent years, however, the Swedish interests have made great progress and have more than regained their position, their proportion of the trade being now 40 per cent.

For some years heavy duties have been imposed on the import of matches into India, and the question of establishing local factories there on a large scale has been under consideration. After careful investigation it has been decided to embark upon this policy and match factories are now being erected at Bombay, Calcutta, Madras and Karachi, all of which will commence operation during 1924, and it is expected that commencing with 1925 a highly satisfactory return will be obtained. On the basis of the quantity of matches shipped from Sweden to India during the second half of 1923, it is conservatively estimated that when these factories are in full operation the yearly saving in import duty by manufacturing in India will be 8,600,000 rupees which alone, at present exchange, is equivalent to over 10½ per cent. on the present increase in capital. In addition the existing sales organisation in India will be largely extended.

In other parts of the world opportunities of an extraordinary nature are presenting themselves for the profitable investment of capital; recently acquired manufacturing interests in Poland are to be extended, and it is contemplated that a substantial sum will be invested in the French match industry which up to now has been a Government monopoly. The Company has been approached by and is at present negotiating with several foreign governments with a view to taking over the match industry in their respective countries as private monopolies. The experience and technical resources of the Company, as well as its connections in all parts of the world, put it in a very favourable position for negotiations of this kind, and it may therefore be assumed that any business transacted on these lines will be on terms which are satisfactory to the Company, and which will bring an ample return on the capital invested.

Prospects and Future Dividends.

In view of the above-mentioned developments and the favourable opportunities now offering for investment in the match industry, the writer is strongly of opinion that the expenditure of the proceeds of the new share capital will at least sufficiently increase the Company's profits as to enable it to maintain the present dividend of 12 per cent. on the increased capital.

Yours faithfully,

IVAR KREUGER,
Managing Director.

सत्यमेव जयते

DIRECTORS:

Mr. BERNDT HASSELROT, President of Court of Appeals, *Chairman.*
Mr. BERNDTHAY, Chamberlain of the King of Sweden.
Mr. OSCAR RYDBECK, Managing Director of Skandinaviska Kreditaktiebolaget.
Mr. KNUT DAHLBERG, Managing Director of Aktiebolaget Svenska Handelsbanken.
Mr. HOLGER LAURITZEN, Joint Managing Director of Skandinaviska Kreditaktiebolaget.
Mr. OSCAR ROEMPKE.
Mr. ARTHUR E. ZACHAU.
Mr. C. A. LOWENADLER, Managing Director of Messrs. Trummer & Co., Succrs., Ltd.
Mr. RAGNAR LILJENROTH.
Mr. GUNNAR MELLGREN.
Mr. LINUS WESTBERG.
Mr. J. O. ROOS AF HJELMSATER.
Mr. TORSTEN JUNG.

MR. IVAR KREUGER, *Managing Director.*
MR. KRISTER LITTORIN, *Assist. Managing Director.*

BANKERS:

SKANDINAVISKA KREDITAKTIEBOLAGET, Gustaf Adolfs Torg 22 and 24, Stockholm.
AKTIEBOLAGET SVENSKA HANDELSBANKEN, Kungstradgardsgatan 2 B, Stockholm.

AUDITORS:

MR. NILS SIMONSSON, Director, Djursholm.

MR. ISAAC O. CASSEL, Managing Director of Smalands Enskilda Bank, Jönköping.

BRITISH AUDITORS:

WHINNEY, MURRAY & Co., Chartered Accountants,

(Whinney, Smith & Whinney, London. | Brown, Fleming & Murray, London & Glasgow.)

14, Place de Meir, Antwerp, and in Paris.

SOLICITORS FOR THIS OFFER:

LINKLATERS & PAINES, 2, Bond Court, Walbrooke, London, E. C.

BROKERS FOR THIS OFFER:

ROWE & PITMAN, Pinners Hall, Austin Friars, and

LAING & CRUICKSHANK, 6, Austin Friars, London, E. C.

SECRETARY AND SOLICITOR:

MR. IVAR ENGELLAU, Barrister, Member of the Swedish Law Society.

REGISTERED OFFICE:

17, Västra Trädgardsgatan, Stockholm.

Copy of Consolidated Balance Sheet referred to in Mr. Kreuger's letter, dated 28th April 1924.

SVENSKA TÄNDSTICKS AKTIEBOLAGET (SWEDISH MATCH COMPANY).

CONSOLIDATED BALANCE SHEET AS AT 31ST DECEMBER, 1923.

(Combining Swedish Match Company and Twenty-two Swedish Subsidiary Companies.)

CAPITAL AND LIABILITIES.

	S.Kr.	S.Kr.
To CAPITAL—		
AUTHORISED AND ISSUED—		
900,000 Shares of S.Kr. 100 each, fully paid		90.000.000:00
„ SHARE CAPITAL and proportion of surplus in Combined Companies not owned by Swedish Match Company:		
JÖNKÖPING & VULCAN MATCH MANUFACTURING COMPANY—		
16,387 6 per cent. Preference Shares of S.Kr. 1,000 each, fully paid with accrued dividend	17.370.220:00	
Other Subsidiary Companies	48.333:70	
		17.418.553:70

	S.Kr.	S.Kr.	S.Kr.
To MORTGAGE DEBENTURES—			
SWEDISH MATCH COMPANY—			
7 per cent. "A" Series Debentures . . .	20.000.000 : 00		
7½ per cent. "B" Series Debentures . . .	12.800.000 : 00		
		32.800.000 : 00	
JÖNKÖPING & VULCAN MATCH MANUFACTURING COMPANY—			
5 per cent. Debentures . . .		963.000 : 00	
ALBY NEW CHLORATE COMPANY—			
5 per cent. Debentures . . .		570.000 : 00	
	S.Kr.		
KATRINEFORS COMPANY—			
5 per cent. Debentures	1.411.000 : 00		
5½ per cent. Debentures	3.864.000 : 00		
		5.275.000 : 00	
			39.608.000 : 00
,, MORTGAGE LOANS and Bank and other guaranteed or secured advances			28.290.724 : 54
,, EMPLOYEES SAVING BANKS and other deposits or Funds			464.250 : 39
,, SUNDRY CREDITORS AND CREDIT BALANCES .			29.422.713 : 85
,, RESERVE FUNDS			80.000.000 : 00
,, PROFIT AND LOSS ACCOUNT			22.757.114 : 65
Subject to Taxation (estimated at S.Kr. 2.320.000) on profits for year 1923			307.961.357 : 13

CONTINGENT LIABILITIES—

1. Guarantee for the International Match Corporation Debentures .	$15,000,000 : 00	
2. Discounted Trade Bills and other contingent Liabilities . .	S.Kr. 26.966.023 : 17	

ASSETS.

	S.Kr.
By FREEHOLD LAND, Forests, Buildings, Plant and Machinery, Railway Sidings, Steamboats, Barges, Motor Craft, Rolling Stock, Live Stock, etc., owned by the 23 Combined Companies, at cost to Swedish Match Company, *less* Depreciation	125.767.945 : 39
,, PATENTS, Trade Marks, and Experimental Costs .	1 : 00
,, OFFICE FURNITURE	1 : 00
,, SHARES IN AND ADVANCES TO FOREIGN SUBSIDIARY AND ASSOCIATED COMPANIES and other Miscellaneous Trade Investments	77.745.558 : 94

(NOTE—There is a contingent liability of Swiss Francs 2.200.000 in respect of uncalled Capital on certain Shares included above.)

,, STOCK-IN-TRADE as certified by Officials of the Company at Cost or under :—

	S.Kr.	
1. Stock of Matches . . .	10.147.260 : 00	
2. Stock of Raw Material, etc. .	17.573.951 : 86	
		27.721.211 : 86

	S.Kr.
By SUNDRY DEBTORS AND DEBIT BALANCES . .	61.829.825:61
,, SWEDISH AND FOREIGN GOVERNMENT BONDS .	2.296.463:15
,, CASH AT BANKERS AND IN HAND	12.600.350:18
	307.961.350:18

Consolidated Balance Sheet referred to in our letter of the 23rd April 1924.

ANTWERP,
The 23rd April 1924.

WHINNEY, MURRAY & CO.,
Chartered Accountants.

SVENSKA TÄNDSTICKS AKTIEBOLAGET (THE SWEDISH MATCH CO.)

Directors' Report for the year, 1923.

The Board of Directors of the Svenska Tändsticksaktiebolaget have pleasure in submitting their Report for the year, 1923.

The past year has not brought with it the improvement in international trade conditions which was anticipated at its commencement. The principal obstacle in the way of recovery has undoubtedly been the unsatisfactory trend of the exchanges of several countries.

The decline in sterling and the sharp fall in the French and Belgian exchanges have reacted with exceptional severity upon the Swedish export industry. During this period of decline in the exchange the costs of production, measured by international standards of payment, have been much more unfavourable to Sweden and other countries similarly situated in regard to their exchanges than for countries with depreciated currencies. The restoration to normal trading conditions is further retarded by the fact that falling exchange values have a decided tendency towards bringing about increases in customs duties, import prohibition and other such measures for the protection of the home industry.

From a purely economic point of view the Company has not been greatly affected by the above-mentioned conditions, as several of the factories in which it is interested are situated in countries whose currencies have been falling during the year and these factories have consequently had the benefit of low cost of production. On the other hand these conditions hamper the Company's efforts to return to full working hours at its own factories in Sweden.

The Company has, during the past year, extended its interests in match factories abroad, and has endeavoured to obtain the greatest possible measure of control over the distribution of its products in the various markets. The most important development on these lines has been the building up of a selling organisation under the Company's direction in British India. As a result of this arrangement the Company, in spite of the difficulties alluded to above, has steadily increased its sales of matches and other products to such a degree that it has been able to extend the working hours at its Swedish factories. Thus, from the 1st April, 1923, the working days have been increased to four and a half days per week instead of three days only for the year 1922 and the first quarter of 1923. Simultaneously the stock of matches has been somewhat reduced during the year.

The high import duty levied on matches imported into British India has necessitated the erection of local factories, and the Company has at present under construction match factories in Bombay, Calcutta, Karachi and Madras, besides a factory already working in Ceylon.

In conjunction with the American bankers, Messrs. Lee, Higginson & Co., the International Match Corporation, an American company, has been founded by the Swedish Match Company during the past year. This new company has taken over an important section of the foreign interests of the Swedish Match Co., payment for which has been made in shares of the International Match Corporation. This latter Company has a share capital of $28.200.000, of which more than half is held by the Swedish Match Co. At the formation of the American company a $15.000.000 6½ per cent. debenture loan was issued. The proceeds of this loan will, in the first place, be utilised for investment in North and South America and also in the Far East.

Kronor 1.000.000 have been written off during the year on the Company's holding in Aktiebolaget Öfverums Bruk.

The Profit and Loss Account and the Balance Sheet per 31st December, 1923 are given below:

PROFIT AND LOSS ACCOUNT, 1923.

		Kr.
Income.		
Balance from the previous year		4.193.581:96
Sundry accounts		19.072.735:82
	TOTAL	23.266.317:78
Expenditure.		
General expenses		1.734.412:99
Amount written off shares		1.000.000:—
	Kr.	
Profit transferred from 1922	4.193.581:96	
Net Profit 1923	16.338.322:83	
Balance per 31st December, 1923		20.531.904:79
	TOTAL	23.266.317:78

BALANCE SHEET PER 31ST DECEMBER, 1923.

		Kr.
Assets.		
Cash in hand and at Bank		5.564.907:24
Bonds		4.394.205:22
Sundry debtors		38.548.169:28
Stock of matches		10.147.260:—
Foreign investments		7,571.617:44
Shares:		
	Kr.	
5.994 ordinary shares in *Jönköpings och Vulcans Tändsticksfabriksaktiebolag*	34,964·976: 10	
2 preference shares in do.	2·000:—	
152.496 ordinary shares in *Aktiebolaget Förenade Svenska Tändsticksfabriker*	48·493·728:—	
27·500 preference shares in do.	8·745·000:—	
500.390 shares in *International Match Corporation*	56·014·243:26	
34.996 shares in *Trummer & Co. Successors, Ltd.*	630·000:—	
484.750 shares in *J. John Masters & Co., Ltd.*	9.074.350:—	

	Kr.	Kr.
996 shares in *The Swedish-Chinese Export & Import Co., Aktiebolag* . . .	100.000:—	
845 shares in *Katrinefors Aktiebolag* .	5.915.000:—	
18.496 shares in *Aktiebolaget Öfverums Bruk*	4.600.000:—	
5.996 shares in *Aktiebolaget Skogsegendomar*	600.000:—	
1.346 shares in *Alby Nya Kloratfabriks Aktiebolag*	1.350.000:—	
1.996 shares in *Elektrolytiska Aktiebolaget Trollhättan*	200.000:—	
3.996 shares in *Aktiebolaget Siefvert & Fornander*	400.000:—	
96 shares in *Aktiebolaget Löwenadler & Co.*	50.000:—	
1.196 shares in *Svenska Tändsticksbolagets Försäljningsaktiebolag*	120.000:—	17.259.297:36
		1:—
	TOTAL .	237.485.457:49

Liabilities.

Share Capital	90.000.000:—
Reserve Fund	72.000.000:—
Debenture Loan	32.800.000:—
Acceptances	10.427.608:99
Sundry Creditors	11.725.943:71
Profit and Loss Account	20.531.904:79
(Guarantee for the International Match Corporation Debenture Loan . $15.000.000:—)	
Discounted trade bills and other contingent liabilities . . . . Kr. 26.707.712:70	
TOTAL .	237.485.457:49

The profit at the disposal of the Annual General Meeting amounts to Kr. 20.531.904:79, and the Directors propose that same should be distributed as follows:—

	Kr.
a dividend of 12 per cent. on the share capital (Kr. 90.000.000:—) to be paid to the Shareholders .	10.800.000:—

and the balance Kr. 9.731.904:79 to be carried forward to the 1924, Profit and Loss Account.

STOCKHOLM,
The 22nd March 1924.

Berndt Hasselrot.

Berndt Hay. *O. Rydbeck.* *K. Dahlberg.*
Emric Thunberg. *Oscar Roempke.* *Arthur E. Zachau.*
C. A. Löwenadler. *Ragnar Liljenroth.* *Gunnar Mellgren.*
L. Westberg. *J. O. Roos af Hjelmsäter.* *Torsten Jung.*
Krister Littorin *Ivar Kreuger.*

SVENSKA TÄNDSTICKS AKTIEBOLAGET (THE SWEDISH MATCH CO.)

Directors' Report for the year, 1924.

The Board of Directors of the Svenska Tändsticks Aktiebolaget have pleasure in submitting their Report for the year, 1924.

Considerable progress has been made in international business relations during the past year. The rise in sterling together with the stabilisation of the exchange in Germany and Poland and other countries have brought about a material improvement in the conditions of the general export trade. The match industry has also been beneficially influenced by the above mentioned conditions and the majority of markets can now be considered to have regained to a large extent their stability. The sales of matches from the Company's factories in Sweden have, during the past year, somewhat exceeded the sales of 1923.

The working days have, during the whole of the year, comprised 4½ days per week, which is the same number of working days as during the three last quarters of 1923. During the first quarter of 1923, the factories were running only three days per week.

The selling prices which have been obtained have been comparatively satisfactory.

Compared with pre-war conditions the sales of matches manufactured in Sweden during the year under review, measured by weight, have fallen below the total sales of 1913 by about 4 per cent. With a view to strengthening the power of competition the Swedish Match Company has for certain markets gone over to the manufacture of smaller and lighter types of matches, which in comparison with their weight represent a larger number of matches and boxes. The Swedish Match industry can now therefore be considered to have fully regained the sales total prevailing during 1913. As, however, on account of taxation and increased tariff protection in a large number of markets, the world's match export trade in 1924 was less than two-thirds of the 1913 figure, it will be seen that the sales of matches of Swedish manufacture now represent a much higher percentage of the world's match export trade than before the war.

The Company's investments in foreign match concerns, have increased considerably and the construction of new match factories in various countries, has proceeded in a satisfactory manner. In this regard the Company's new match factories in India may especially be mentioned. Those in Bombay and Calcutta started operating during the past year and the matches produced at these factories have already gained an important trade on the Indian market.

With a view to enable the Company to issue such shares as may without restrictions be held by foreign subjects, the Company has during the past year made alterations in its Articles of Association and accordingly a new type of shares, called "B" shares, carrying 1/1000th vote only, has been created.

In conjunction with Messrs. Higginson & Co., Bankers, of London, a new issue has been made during the past year of 900,000 shares of the "B" category. The majority of these shares, which are quoted on the London Stock Exchange, have been absorbed by the English market.

The Company's American subsidiary, the International Match Corporation, has during the past year given notice of the redemption of their $15,000,000 Bond Issue. To obtain funds for the redemption of these Bonds, Preference Shares have simultaneously been issued for a corresponding amount. The Swedish Match Company's guarantee of this Bond Issue has consequently been cancelled.

It is the policy of the Swedish Match Company to let profits made by subsidiaries remain with these to a large extent and only transfer to the parent company so much profit as is required to comfortably pay the dividend of the parent company. In this way considerable saving in taxes is affected and reserves are created in the books of the subsidiary companies. From the Profit and Loss Account, remaining from 1923, has been paid 4 per cent. interim dividend for 1924, as well as certain taxes and expenses in connection with the new Share Issue.

The Profit and Loss Account and the Balance Sheet per 31st December, 1924, are given below:

PROFIT AND LOSS ACCOUNT, 1924.

		Kr.
Income.		
Balance of Profit from previous year		2.808.381:51
Sundry accounts		20.789.541:30
TOTAL		23.597.922:81
Expenditure.		
General expenses		1.657.477:72
	Kr.	
Profit transferred from 1923	2.808.381:51	
Net Profit 1924	19.132.063:58	
Balance per 31st December, 1924		21.940.445:09
TOTAL		23.597.922:81

BALANCE SHEET PER 31ST DECEMBER, 1924.

Assets.		
Cash in hand and at Bank		52.341.650:16
Bonds		4.164.743:13
Sundry debtors		51.690.509:50
Stock of matches		7.231.350:—
Foreign investments and constructions		35.158.461:66
Shares:	Kr.	
5.994 ordinary shares in *Jönköpings och Vulcans Tändsticksfabriksaktiebolag*	34.964.976:10	
2 preference shares in do	2.000:—	
152.496 ordinary shares in *Aktiebolaget Förenade Svenska Tändsticksfabriker*	48.493.728:—	
27.500 preference shares in do	8.745.000:—	
568.000 shares in *International Match Corporation*	64.076.222:04	
34.996 shares in *Trummer & Co. Successors, Ltd.*	630.000:—	
484.550 shares in *J. John Masters & Co., Ltd.*	9.070.932:—	
996 shares in *The Swedish-Chinese Export & Import Co., Aktiebolag*	100.000:—	

	Kr.	
845 shares in *Katrinefors Aktiebolag* . .	5.915.000:—	
18.496 shares in *Aktiebolaget Öfverums Bruk*	4·600·000:—	
5.996 shares in *Aktiebolaget Skogsegendomar*	600.000:—	
1.346 shares in *Alby Nya Kloratfabriks Aktiebolag*	1.350.000:—	
1.996 shares in *Elektrolytiska Aktiebolaget Trollhättan*	200.000:—	
3.996 shares in *Aktiebolaget Siefvert & Fornander*	400.000:—	
96 shares in *Aktiebolaget Löwenadler & Co.* .	50.000:—	
1.196 shares in *Svenska Tändsticksbolagets Försäljningsaktiebolag*	120.000:—	179.317.858:14
Office Furniture	. . . .	1:—
	TOTAL .	329.904.573:59

Liabilities.

	Kr.	Kr.
Share Capital		180.000.000:—
Reserved Fund		81.541.081:42
Debenture Loan		31.575.000:—
Sundry Creditors		14.848.047:08
Profit and Loss Account		21.940.445:09
Discounted trade bills and other contingent liabilities	25.194.130:04	
	TOTAL .	329.904.573:59

The profit at the disposal of the Annual General Meeting amounts to Kr. 21.940.445:09, and the Directors propose that same should be distributed as follows:—

a dividend of 12 per cent. on the "A" shares, less 4 per cent. interim dividend paid in October, 1924, to be paid to the share holders Kr. 7.200.000:—and the balance Kr. 14.740.445:09 to be carried forward to the 1925, Profit and Loss Account.

The Board of Directors ask authorization of the General Meeting to pay during the latter part of the year out of profits remaining on Profit and Loss Account an interim dividend of 4 per cent.

STOCKHOLM,
The 21st March, 1925.

Berndt Hasselrot.

Berndt Hay.	*G. Akers-Douglas.*	*J. W. Hills.*
O. Rydbeck.	*K. Dahlberg.*	*H. Lauritzen.*
Oscar Roempke.	*Arthur E. Zachau.*	*C. A. Löwenadler.*
Ragnar Liljenroth.	*Gunnar Mellgren.*	*L. Westberg.*
J. O. Roos af Hjelmsäter.	*Torsten Jung.*	*Krister Littorin.*
	Ivar Kreuger.	

SVENSKA TÄNDSTICKS AKTIEBOLAGET (THE SWEDISH MATCH CO.)

Directors' Report for the year, 1925.

The Board of Directors of the Svenska Tändsticks Aktiebolaget have pleasure in submitting their annual report for 1925.

The progress made by the Company during the past year has been fully satisfactory. From the Swedish Board of Trade's official report it will be seen that the exports from the Company's Swedish factories, calculated by weight, were 10 per cent. higher than in 1924. The actual number of boxes delivered, however, was increased by 16 per cent. and the difference between the official statistics and the actual sales testifies to the constant endeavours of the Company to reduce the weight of both the product and packing for distant markets. In view of the fact that during last year there was a 20 per cent. increase in the orders received, the Company considers itself justified in anticipating a continued upward tendency of the exports during 1926.

As a consequence of the increased demand for the Company's manufactures, the stock of matches has been substantially reduced. It has also been possible for the Company to extend the working hours at all the Swedish factories, which are at present working on full time.

During the past year, the activities of the Company's factories abroad have developed to a remarkable degree, due not only to the extension of the plants already owned by the Company, but also to the establishment of new plants and the acquisition of a number of new match concerns. The Company has thereby pursued its original plans of extension and further strengthened its position in the various markets.

Among the most noteworthy of these developments may be mentioned the following transactions, completed in co-operation with the Company's American subsidiary, the International Match Corporation, *viz.*, the agreements entered into with the Republics of Poland and Peru by which the Company acquired the match monopolies in these countries.

By making extensions, erecting new buildings and plants and working in double shifts, the Company's factories in India have during 1925 been able to increase their manufacturing capacity fourfold. The Indian selling organisation having been extended simultaneously, these developments have in no way served to hinder the exportation from Sweden to the British Indian markets, which has been maintained and even somewhat augmented.

With regard to the Company's activities in Japan and China, there is also evidence of satisfactory development.

From the profit carried forward from 1924 has been taken the necessary amount for payment of interim dividend 1925 and taxes.

The Profit and Loss Account and the Balance Sheet per 31st December, 1925, are given below:

PROFIT AND LOSS ACCOUNT, 1925.

	Kr.
Income.	
Balance of Profit from previous year	4.712.676:67
Sundry accounts	30.330.633:25
TOTAL .	35.043.309:92

Expenditure.

General expenses		1.853.859 : 10
	Kr.	
Profit transferred from 1924	4.712.676 : 67	
Net Profit 1925	28.476.774 : 15	
Balance per 31st December, 1925		33.189.450 : 82
TOTAL .		35.043.309 : 92

BALANCE SHEET PER 31ST DECEMBER, 1925.

Assets.

Cash in hand and at Bank		11.994.321 : 16
Bonds		18.424.366 : 66
Sundry debtors		47.182.479 : 50
Stock of matches		3.616.830 : —
Foreign investments and constructions		86.387.552 : 54
Shares:	Kr.	
5.994 ordinary shares in *Jönköpings och Vulcans Tändsticksfabriksaktiebolag*	34.964.976 : 10	
2 preference shares in do	2.000 : —	
152.496 ordinary shares in *Aktiebolaget Förenade Svenska Tändstickfabriker*	48.493.728 : —	
27.500 preference shares in do	8.745.000 : —	
568.000 shares in *International Match Corporation*	64.076.222 : 04	
34.996 shares in *Trummer & Co. Successors, Ltd.*	630.000 : —	
484.550 shares in *J. John Masters & Co., Ltd.*	9.070.932 : —	
996 shares in *The Swedish-Chinese Export & Import Co., Aktiebolag* .	100.000 : —	
845 shares in *Katrinefors Aktiebolag* .	5.915.000 : —	
18.496 shares in *Aktiebolaget Öfverums Bruk*	4.600.666 : —	
5.996 shares in *Aktiebolaget Skogsegendomar*	600.000 : —	
1.346 shares in *Alby Nya Kloratfabriks Aktiebolag*	1.350.000 : —	
1.996 shares in *Elektrolytiska Aktiebolaget Trollhättan*	200.000 : —	
3.996 shares in *Aktiebolaget Siefvert & Fornander*	400.000 : —	

	Kr.	Kr
96 shares in *Aktiebolaget Löwenadler & Co.*	50.000:—	
1.196 shares in *Svenska Tändsticksbolagets Försäljningsaktiebolag* . .	120.000:—	
		179.317.858:1±
Office Furniture		1:—
	TOTAL .	346.923.409:—

	Kr.	
Liabilities.		
Share Capital—		
A shares	90.000.000:—	
B shares	90.000.000:—	
		180.000.000:—
Reserve Fund		81.541.081:42
Debenture Loan		30.258.000:—
Sundry creditors		21.934.876:76
Profit and Loss Account		33.189.450:82
Discounted trade bills and other contingent liabilities	26.049.838:73	
	TOTAL .	346.923.409:—

The profit at the disposal of the Annual General Meeting amounts to Kr. 33.189.450:82, and the Directors propose that same should be distributed as follows:—

a dividend of 8 per cent. on the "A" and "B" shares to be paid to the shareholders Kr. 14.400.000:—which dividend together with the previously paid interim dividend of 4 per cent. equals 12 per cent. of the share capital to be transferred to the Reserve Fund Kr. 458.918:58, and the balance Kr. 18.330.532:24 to be carried forward to the 1926 Profit and Loss Account.

The Board of Directors ask authorization of the Annual General Meeting to pay to the shareholders during the latter part of the year, out of profits remaining on Profit and Loss Account, an interim dividend for the year 1926 of 5 per cent. on the present share capital of Kr. 180.000.000:—.

STOCKHOLM,

The 29th March, 1926.

Berndt Hasselrot.

Berndt Hay.	*G. Akers-Douglas.*	*J. W. Hills.*
O. Rydbeck.	*K. Dahlberg.*	*H. Lauritzen.*
Oscar Roempke.	*Arthur E. Zachau.*	*Ragnar Liljenroth*
Gunnar Mellgren.	*L. Westberg.*	*J. O. Roos of Hjelmsäter*
Torsten Jung.	*Krister Littorin.*	*Ivar Kreuger.*

Reprinted from "The Times," 1925.

SWEDISH MATCH COMPANY.

Review of the Industry—Expansion Policy.

By invitation of Messrs. Higginson & Company, a large number of share holders and others interested in the Swedish Match Company attended a meeting in Cannon Street Hotel on Friday, May 15th.

Sir Guy Granet, G.B.E., presided, and introduced Mr. Ivar Kreuger, managing director of the company.

In addressing the meeting, Mr. Kreuger said:

"As this is the first time I have the opportunity of meeting the British shareholders of our company. I may perhaps be excused if I, before referring to the last year's business, give a short sketch of the history of the Swedish Match Company.

The art of making matches may be said to have originated in England, where Mr. John Walker, a chemist from Stockton-on-Tees, in 1827, invented a friction light, which can be considered a forerunner of the present-day matches. Mr. Walker called his matches "Congreves," after Sir William Congreve, the inventor of the Life Saving Rocket. From England the art of making matches spread to France, Belgium, Austria, and even reached Sweden, where in 1836 Mr. O. S. Bagge started manufacturing matches, which were marketted under the name of "Congreves." The production of this article was, however, carried on on a very moderate scale, and it was not until the two brothers, John Edvard and Karl Frans Lundström, became interested in the match production that the modern match industry can be said to have been established in Sweden.

In the year 1845 the two brothers erected a match factory in Jönköping, and they soon succeeded in establishing a growing and paying business for their matches. Already in 1848 a new factory had to be built in Jönköping, which factory is still in existence and forms the nucleus to the Swedish Match Company. The Jönköpings factory very soon became known for the excellence of its products, but it was first through the invention of the safety match, made by one of the brothers and patented in 1855, that the factory came to establish its world's reputation.

In the early days matches were made with the poisonous and highly inflammable yellow phosphorus. They were, therefore, frequently the cause of accidental cases of poisoning, and also of numerous fires. Further, the employees of the factories were attacked by a serious and incurable disease, called "phossy-jaw," to such an extent as to cause special legislation in many countries, prohibiting the manufacture of these matches. The match, patented by Lundström, contained no phosphorus, and could ignite only by rubbing it against a part of the box, specially prepared with friction surfaces, made of amorphous phosphorus, which is not poisonous and entirely free from danger in handling.

The Jönköping safety match soon became very popular, and it became recognised as the leading brand in Sweden and abroad. I believe it would be difficult to find another instance when an industrial product has so rapidly obtained a world-wide distribution. It was not only to the civilised countries that the Jönköping match was sold, but it reached the most distant parts of the world. At any rate, I am quite certain that no product has ever succeeded in making the Swedish name as well known as the Jönköping safety match. Even to-day in many countries of the Continent of Europe, Germany, France and others, the safety matches used are called "Swedish matches," even if they are not manufactured in Sweden. Their remarkable success was attained, not mainly through the merit of the invention, but rather through the unusual ability with which the Jönköping factory was conducted. The two brothers Lundström, the owners of the factory, constituted a rare combination of technical skill and organising ability. At a period when the development of mechanical machinery in many other branches was still in its infancy, there was introduced into the Jönköping factory a number of mechanical improve-

ments, which enabled the Jönköping factory to turn out a product far superior to that of any other match factory in the world and at a remarkably low cost.

In 1857 the Jönköping factory was turned into a limited company, with a share capital of Kr. 400,000. As the managing director of this company was appointed Mr. Bernard Hay, who remained at the head of the same for 35 years, and under his able management the company carried on a very profitable and growing business.

Another person who had a great deal of merit in the progress of the Jönköping company was Mr. Alexander Lagerman, who was attached to the company as a mechanical inventor. To my mind Mr. Lagerman is the greatest inventive genius that Sweden has ever produced. Lagerman solved many of the technical problems of the match industry in such a definite manner, that there has been practically no possibility of later effecting any important improvements of his machines. As an instance of Lagerman's remarkable ability, I may mention that he constructed a machine with which practically the whole process of the match-making and the packing of the matches in the boxes was accomplished. We have still running in our factory in Jönköping a machine built by Lagerman in 1872, which has been in constant use since that time. It was not until 40 years later that the Continental machine makers succeeded in making a machine of the same type, which was at all serviceable, and even to-day the Lagerman machine is far superior to any machine that can be bought in the open market, both as to the quality of the product and as to the cost of production. I do not know of any similar case in any branch of manufacturing where an important machine has been able to retain its competitive power for an equally long period. Another instance of how thoroughly Mr. Lagerman treated his technical problems is this, that the box of matches produced by Lagerman has remained identically the same during all these years. You could not notice any difference between a box manufactured 60 years ago or to-day, except perhaps for a slight colouring of the wood. All the make-up, the dimensions of the box, and every detail has remained the same. This same box, which was manufactured by Lagerman, has since become the standard box all over the world, wherever safety matches are used. If you take Germany, France, the United States, China and Austria, the size of the box is exactly the same as what Lagerman manufactured 60 years ago. Only when it has been necessary to meet special conditions, as, for instance, here in England, where the number of sticks is governed by the existence of Excise tax, has there been a diversion from the dimensions laid down by Lagerman, and even here the type of the box and the make-up remains exactly the same as for the box introduced by Lagerman."

Proceeding, Mr. Kreuger said: "It is natural that the success of the Jönköping company encouraged others to start match factories, and particularly in Sweden a tremendous number of match factories were started, and at one period practically every town in Southern Sweden had one or more factories making safety matches. Only a few of those factories survived, however, but gradually the improvements made at the Jönköping factory spread to those other factories, and finally they succeeded in making a product which, if not equal to the Jönköping brand, was good enough to satisfy the public, and the demand for the Jönköping matches was so great that it was impossible to fill it. Thereby the other factories got a chance, and within a few years the many Swedish match factories succeeded in getting a market in the export trade.

Even in other countries than Sweden factories for the production of safety matches were established. In most cases the factories were really started for the home market, protected by high tariffs, but some of the countries succeeded in being very prominent match manufacturers and in establishing an export trade. The most important of those countries in Europe were Austria-Hungary, the present Czechoslovakia, Belgium, and Norway. In the last few years Finland has also come to the front as a match-exporting country. Sweden, however, managed to keep ahead, technically as well as in the quantity of its exports, and Sweden has always had a much larger export in matches than all the other European countries combined.

Japanese Export Trade.

The greatest danger, however, arose in Asia from Japan. The match industry was introduced into Japan round about 1870, and soon became a very important industry there, and also succeeded in getting a large and growing export market. The main reason why the match industry became a success in Japan was the extremely low cost of labour and the fact that Japan was located close to the large export markets of China, India and others, such as the Dutch East Indies and the South Sea Islands. India and China used to be the largest and still are the largest market in the East for matches. In quality the Japanese article never succeeded in coming anywhere near the Swedish product, but the low cost of production, nevertheless, caused their export trade to develop at a very rapid rate. As a matter of fact, it was the pressure from Japan which in 1903 caused the seven largest Swedish match factories to amalgamate into one company, the Jönköping and Vulcan Match Company. This amalgamation proved to be very effective. Up to that time the Japanese industry had developed at a much more rapid rate than the Swedish industry, but after 1903 the conditions were reversed. During the ten years immediately preceding the war the Japanese export trade in matches increased by 10 per cent., whilst the Swedish export trade increased by more than 100 per cent.

Consolidation of Swedish Industry.

A further step towards the consolidation of the Swedish match industry was taken ten years later, in 1913, when the remaining eleven Swedish factories were joined into one company, "United Swedish Match Factories."

The war that came immediately after this amalgamation caused the Swedish match industry a great deal of difficulty, partly from the lack of raw materials, and partly in regard to the sale of matches. Sweden up to that time largely depended on Russian aspen wood, and also was dependent on chemicals obtained from America, England and Germany. These supplies were not available during the war. At the same time the large markets were cut off, owing to the lack of freight facilities, thus giving practically the whole of Asia and many other important markets to the Japanese match industry. Largely through these difficulties the two Swedish companies were brought together into one, thus consolidating the whole of the Swedish match industry into one company. For technical reasons, reasons of taxation and others, this was effected by a holding company, the Swedish Match Company, with a capital of 45,000,000 crowns, this holding company owning all the shares in the Swedish Match Company and all the ordinary shares in the Jönköping and Vulcan Match Company. In 1922 the Swedish Match Company increased its capital to 90,000,000 crowns, and in 1924 to 180,000 crowns. This company has now been in existence seven years, a sufficiently long period to test its usefulness. In my own opinion the advantages gained by the formation of the Swedish Match Company have fully answered to the expectations, and it has made it possible for the Swedish match industry to cope with the special difficulties connected with the after-war period in a way that otherwise would not have been possible had not all Swedish match factories been able to operate at one unit.

Post-War Difficulties.

The difficulties for the Swedish match industry after the war were very much the same as for other export industries in countries with a high exchange. They were perhaps aggravated by the fact that Sweden went in for a policy of deflation more severe than that of any other country, but the fact that all the Swedish factories were one interest made it possible to use the sales organisation in a much more efficient manner than otherwise would have been possible. These difficulties caused by the exchange conditions were, however, difficulties of more or less a temporary nature. I believe at the present time those difficulties have been entirely overcome, and the Swedish match industry has now regained all the markets which were lost during the war. (Cheers.) There were, however, difficulties of a more permanent nature, and these consisted mainly of the efforts made in all different countries to restrict

the international trade in matches through taxation and excessive protective tariffs. It is characteristic of the match industry that where protection is given at all the duty very often is so high as to make it absolutely a prohibitive tariff. Many countries which in other respects are rather moderate in their tariff policy use absolutely prohibitive tariffs for matches. Germany, practically the whole of South America, Canada, Spain, Italy, are all closed for the import of matches. In Australia, where at present the duty corresponds to more than 200 per cent. of the pre-war value of matches, there is a movement to get this tariff doubled. Even at the present tariff the Swedish match industry has been able to compete successfully with the local manufacturers in Australia, and we have 90 per cent. of the import of matches to Australia. (Hear, hear.) But the doubling of the tariff, however, would be prohibitive.

Conditions in India.

The last important country to go in for a policy of protective tariffs has been India, and even here a system has been adopted giving the local industry a protection out of all proportion to the market value of the article. The present Indian tariff on matches is fully 200 per cent. of the value of the imported matches, and as the local production is not large enough to meet the needs of the country the consequence is that the price level will be decided by the price of the imported matches. The inevitable consequence is that during a certain period the local manufacturers will obtain extravagant profits. This, on the other hand, has already caused the starting of a tremendous number of factories by people who lack the technical knowledge and have not the business experience necessary to conduct undertakings of this kind in the right way. The same tendency which we see in India is seen in many other countries, and how far the movement is advanced can be understood by the fact that international trade in matches to-day is less than two-thirds of what it was before the war. Under these circumstances I think it is quite gratifying that the Swedish match industry has succeeded in regaining its pre-war volume in the export trade, while the most important competitor, Japan which is much more important than all the other competitors together, has been gradually decreasing its export, and to-day Japan's export trade is less than one-half of what it was before the war. (Cheers.) It is easy to understand, however, that if the Swedish industry should retain its leading position it cannot rely only on the Swedish factories, and for this reason the Swedish Match Company a few years ago decided to go in for a programme of taking an interest in match factories, abroad on a very large scale. We have now in operation two newly-built factories in India, one in Bombay and one in Calcutta, and are building two new ones, one in Karachi and one in Madras, and we have acquired two established match factories in Colombo and Rangoon. It is not our intention to try to monopolise the Indian match trade, and we have decided to seek the co-operation of prominent Indians in our Indian undertakings. We would prefer, however, to wait a little, so that the situation in the Indian match industry may be established, in order to get a sounder basis for co-operation, and thus prevent disappointments. We are quite, confident, however, that our Indian factories will prove of great benefit to the company. Even in other parts of the world we are building new factories and taking an interest in existing match concerns, and I hope before long there will not exist any country in the world where we have not either a regular import trade or a local match factory. (Cheers). At the same time I wish to state that it is not our intention to try to extinguish competition in the match trade, and when match factories are started with the intention of selling to us, as has been the case to a large extent in Belgium, I think the promoters are in for a disappointing experience.

Company's Strong Position.

Naturally the policy of expansion followed by the Swedish Match Company requires a great deal of capital, and that has been the reason why in recent years we have made two new issues. In my opinion, however, the investments which have been made possible through these issues have been of such great

benefit to the company and have so much strengthened its position that I consider even those shareholders who have not been able to take part in the new issues have not lost anything through their taking place. I do believe at present that very rarely has a company been in such an unassailable position both from the manufacturing point of view and from the commercial point of view as the Swedish Match Company. (Cheers.) While our Swedish factories have been able to maintain their pre-war position, we have also developed our manufacturing business abroad to such an extent that it is to-day by far more important than our Swedish business, at least as far as the quantity produced is concerned. For this reason I feel that we are rather independent of such disturbances as strikes, lock-outs, or fires, and I do not think that anything of that kind can cause us very serious trouble. At the same time our markets are so widely spread that, with the exception of a few countries which are closed to us by prohibitive tariff, and where I hope before long we shall have factories of our own, there does not exist any country, however small, where we have not a regular trade in matches. (Cheers.) There is not one competitor who has enough influence on the different markets to cause us any really serious damage. And no market in itself is sufficiently important to be of a vital concern to us. With equal strength it may be said that the distribution of our product within the different countries is of the widest possible nature, and I do not think that anyone would reasonably dispute our claim to reach more consumers than any other company in the world. I think, as a matter of fact, the company coming next to us would have only a fraction of the number of consumers that we have. It is easy to understand that this constitutes an element of stability to the business which is of very great importance.

Consolidated Balance-sheet.

I will now refer a little to last year's balance-sheet. The fact that the Swedish Match Company is a holding company makes it difficult for shareholders to get the true position of the company from the official balance-sheet. Messrs. Higginson and ourselves have together asked the firm of auditors, Messrs. Whinney, Murray & Co., to make a consolidated balance-sheet, consolidating all our Swedish assets under one head. This was also done for the year 1923, and I will now call attention to the most important changes from the figures of last year's balance-sheet. If we take the assets first you will notice that "Freehold land, forests, buildings, etc.," which constitutes largely the plants of our Swedish factories, whether in match production or those of the associated industries—we have, as you know, paper mills and a chemical industry and machine factories, forests, and so on—this item of freehold land, etc., has decreased from S. Kr. 125,700,000 to S. Kr. 122,300,000, a decrease of S. Kr. 3,400,000. It means that amortisation and reservations for depreciation have exceeded the fresh investments in Sweden by S. Kr. 3,400,000. This is quite natural in view of the policy we are carrying on at present. We have at present a larger productive capacity in Sweden than we can use fully, and naturally we are not making any fresh investments of importance as long as this is the case. The two next items "Patents, etc.," and "Office furniture," are exactly the same as before. "Shares in and Advances to Foreign Subsidiary and Associated Companies."—This item has increased from S. Kr. 77,000,000 to S. Kr. 115,000,000. It would be very difficult for me to give a detailed account as to how this increase has originated. I may say that one very important item in the increase is our holding in the International Match Corporation, which has increased from S. Kr. 56,000,000 to S. Kr. 64,000,000. The other important investments are those in India, in Japan, and China, but we are constantly making investments all over the world, and this item is apt to increase as years go on, and will increase for some years to come.

In regard to the next item—"Stock in Trade," the stock of matches has decreased from S. Kr. 10,000,000 to S. Kr. 7,200,000, a decrease of approximately S. Kr. 3,000,000. This is accounted for to some extent by the stock going down in quantity, but also by the inventory being taken at somewhat lower values for 1924 than for 1923. The prices used for 1924 were 23 per

cent. lower than for 1923. The stock of raw materials has decreased from S. Kr. 17,500,000 to S. Kr. 15,800,000, and that also is largely explained by our having used slightly lower values in taking the stock. "Sundry debtors and debit balances" have increased from S. Kr. 61,800,000 to S. Kr. 77,100,000. This is a natural increase, considering our increased business activities. "Swedish and Foreign Government Bonds" are approximately the same as last year. "Cash at Bankers and in Hand" have increased from S. Kr. 12,600,000 to S. Kr. 56,500,000. This also is quite natural, considering the large issue which was made in 1924. Part of this money has already been invested abroad, and the rest will either be invested shortly or kept as a reserve.

The "B" Shares.

The nature of our business makes it necessary to be in a rather liquid position. If you look at the liabilities you will see that the share capital has increased from S. Kr. 90,000,000 to S. Kr. 180,000,000 by the issue of 900,000 "B" shares. You all know the reason why these "B" shares were created. They were created to make it possible for foreign shareholders to have a large number of Swedish shares. According to the Swedish law, only 20 per cent. of the voting power of certain companies which have a large holding of land can be owned by foreigners, and the Swedish Company has about 120,000 or 125,000 acres of forest land in Sweden. The next item is practically the same, but there has been a slight decrease through a few outstanding shares in subsidiary companies having been bought by the Swedish Match Company.

Regarding "Mortgage Debentures," these have decreased somewhat in accordance with the Schedule of Amortization. "Mortgage Loans and Bank and other Guaranteed or Secured Advances": this item largely consists of mortgage loans on forests, agricultural property, and similar assets. They generally are of a permanent nature and often at a low rate of interest, such as 4½ per cent., and for those reasons it is not customary to pay off those loans even when you have funds sufficient to do so. They have increased to the extent of S. Kr. 1,000,000. "Employees' Savings Bank" has also increased slightly. "Sundry Creditors and Credit Balances" have decreased from S. Kr. 29,700,000 to S. Kr. 17,900,000. This is explained by the fact that we have paid off such debts as we have found it convenient to pay, when making the last issue. "Reserve Funds" have increased S. Kr. 10,000,000 out of the premiums of the last issue.

Profits and Dividend Policy.

Regarding the Profit and Loss Account, this has increased from S. Kr. 22,700,000 to S. Kr. 24,300,000. Many shareholders may perhaps consider this is an insufficient increase considering the increase in our capital, but we have not had the chance yet to derive any considerable profit from that increase in capital, and, moreover, we have taken into the Swedish Company only a very small part of the profits made on our Foreign Investments. Taxes in these days, as you know, are so heavy that the company cannot afford to take in more profits than it needs for dividend purposes. Naturally, therefore, the way of making the balance-sheet in this way will be more or less arbitrary, and it may be difficult for shareholders really to compare the result of one year to another. I think I may say, however, that, everything considered, the year 1924 has been quite a satisfactory year, and in reality there is a distinct improvement on the results of 1923. (Applause.) I would like, however, to impress upon shareholders that our policy as to dividend must be conservative. We are still in a period of rather rapid expansion, and when you are building up new business it will always take a considerable time before you can distribute any profits from it. As the company will not be able to show its full earning capacity for quite some years, I think it would be a serious mistake under those conditions to burden it with too heavy increased dividend payments. I hope this statement will not cause too great disappointment; for the company I think it is the only right policy. (Applause.)

Well, I am afraid I have nothing further to say to-day, but I shall be very glad to answer any questions which may be put to me." (Loud Cheers.)

THE SWEDISH MATCH COMPANY.

We hereby certify that, in the Books of our Company, we have 1,061,411 shares registered in the name of English shareholders. The total number of shares are 1,850,000.

SVENSKA TÄNDSTICKS AKTIEBOLAGET.

STOCKHOLM,
December 14th, 1926.

SVENSKA TÄNDSTICKS AKTIEBOLAGET.

Stockholm, 2nd February 1927.

DEAR SIR (OR MADAM),

We enclose translation of official notice offering to shareholders for subscription 450,000 "B" shares. As you will see from the notice, you are entitled to subscribe for one new share in respect of each four old shares held by you. For the convenience of shareholders who desire to avail themselves of their subscription rights, we have appointed Higginson & Co., 80, Lombard Street, London, E. C. 3, as our Agents to issue subscription rights certificates in respect of old shares and on your presenting your share certificates to them for marking, they will issue to you a certificate entitling you to subscribe on or before March 2nd, 1927 at the office of our fiscal Agents for the new shares on the terms of the Official Notice. By special arrangement with Higginson & Co. subscriptions made in London may be paid in English sterling, whereby the equivalent of the subscription price of Kr. 230—has been fixed at £12-13-4, payable with 6 per cent. interest on this amount on or before May 31st 1927.

Yours faithfully,

for SVENSKA TÄNDSTICKS AKTIEBOLAGET,
IVAR KREUGER.

Stockholm, 2nd February 1927.

The Board of Directors of the Swedish Match Company, subject to ratification at a general extraordinary meeting of shareholders to be held on February 9th, 1927, has decided to increase its share capital from 180,000,000 kronor to 270,000,000 kronor by issuing 900,000 new "B" shares of the par value of 100 kronor each on the following terms:—

(1) The new shares are to be issued at a price of 230 kronor each.

(2) Administratieve Maatschappy voor Algemeene Nyverheids Waarden, Amsterdam, shall have the right to subscribe to 450,000 new shares against delivery of 432,000 shares of common stock of International Match Corporation and 36,000 shares of Compañia Chilena de Fósforos.

(3) Old shareholders have preferential rights to subscribe to the 450,000 remaining new shares at the ratio of one new share for four old ones. In the event of the issue being over-subscribed, the allotment will be according to the direction of the Board, this however, without prejudicing the preference rights of the existing shareholders to acquire one new share for every four old ones.

(4) From January 1st, 1928 the new shares will have equal rights to the old shares in the profit; the new shares will be accompanied by No. 15 and subsequent coupons.

(5) Payment for those new shares which are subscribed according to $ 3 shall be effected not later than May 31st, 1927 and for shares subscribed according to $ 2, not later than December 31st, 1927.

(6) Six per cent. accrued interest on 230 kronor from January 1st, 1927 to the day of payment is to be added to the subscription.

price of each new share, but new shareholders shall be entitled to receive 13, 80 kronor interest per share on January 5th, 1928.

(7) The stamp expenses of the new issue will be borne by the company.

(8) The subscription list will remain open up to and including March 2nd, 1927 at the company's office, 17, Västra Trädgårdsgatan, Stockholm. Shareholders should produce, when subscribing, their existing share certificates to be stamped.

SVENSKA TÄNDSTICKS AKTIEBOLAGET,
IVAR KREUGER.

To holders of International Match Corporation.

6½ per cent. Convertible Sinking Fund Gold Debentures.

Called for redemption at 105 and interest on January 19, 1925.

450,000 Shares.

INTERNATIONAL MATCH CORPORATION.

PARTICIPATING PREFERENCE STOCK.

Non-Callable.

Par Value $35 a Share.

Preferred over Common Stock as to assets up to $40 a share and accrued dividends, thereafter participating equally with Common in any distribution of assets after Common has received $40 a share; preferred as to cumulative dividends at rate of $2·60 a share per annum, and participating at least equally with Common Stock in any dividends after Common has received $2·60 a share in any year; non-voting.

Cumulative preferred dividends payable quarterly, January 15, April 15, July 15 and October 15.

First quarterly dividend payable April 15, 1925.

Transfer Agents:

THE NATIONAL CITY BANK OF NEW YORK.

Old Colony Trust Company, Boston.

Registrars:

GUARANTY TRUST COMPANY OF NEW YORK.

Atlantic National Bank, Boston.

Capitalization

(upon completion of present financing).

	Authorised shares.	Outstanding shares.
Capital Stock:		
Participating Preference Stock, par value $35 a share, non-voting	900,000	450,000
Common Stock, no par value, voting	1,450,000	1,000,000

Neither International Match Corporation, nor any subsidiary, will have any outstanding mortgage or funded debt upon completion of the present financing (other than $45,024 real estate mortgage of one subsidiary).

Holders of Debenture have the right to convert their Debentures into Common Stock at the rate of 30 shares for each $1,000 of Debentures. If any Debentures should be converted, the number of outstanding shares of Common

Stock would be correspondingly increased and of Participating Preference Stock decreased.

From his accompanying letter, Ivar Kreuger, Esq., President, further summarizes as follows:—

Business.—International Match Corporation, incorporated in Delaware, controls companies owning 42 match manufacturing plants in various European and other countries outside of Sweden, and Vulcan Match Company, Inc., the sales company in the United States for Swedish Match Company and its subsidiaries. It is controlled by the Swedish Match Company through ownership of a majority of its common stock.

Assets.—Consolidated net assets of International Match Corporation and constituent companies, after deducting all liabilities, amount to $48,268,564, or $107·26 per share of Participating Preference Stock. Net current assets of $13,935,049 alone equal $30·95 per share of Participating Preference Stock. Total current assets of $16,145,024 more than 7 times total current liabilities of $2,209,975.

Earnings.—Consolidated sales of International Match Corporation and constituent companies for the year 1924, two months partly estimated, were $20,680,000.

Net profits available for dividends for last 4 years, two months partly estimated, averaged $4,012,442 or more than 3·4 times, and for 1924, on same basis, were $4,800,000 or more than 4 times the $1,170,000 preferred dividend requirement for this Stock.

Net profits for 1924 equal more than $10 a share on Participating Preference Stock, and equal $3·31 a share on all Stock, both Participating Preference and Common, now to be outstanding.

Swedish Match Company, which owns a majority of common stock of International Match Corporation, also controls companies owning 20 match manufacturing plants in Sweden (business of the oldest founded in 1845) as well as match manufacturing companies in other countries. Capital stock of Swedish Match Company, $48,240,000, now quoted about 160 per cent. of par. Dividends of Swedish Match Company since incorporation in 1917 have never been less than the present rate of 12 per cent. per annum. Net profits of Swedish Match Company and two principal predecessors during last 21 years have averaged 25·17 per cent. on common stock from time to time outstanding, and have not during last 17 years been less than 17 per cent. in any year.

International Match Corporation and Swedish Match Company and subsidiaries have 25,000 employees, produce more than one-third of all matches used and probably reach more consumers than any other group of manufacturing companies in the world.

Provisions relating to the right of the Corporation to create mortgage or funded debt, preferred stock, or additional Participating Preference Stock and stating the restrictions upon any such issue, and the rights and preferences of Participating Preference Stock, are described in the accompanying letter.

We recommend exchanging Debentures for this Participating Preference Stock.

This Participating Preference Stock is offered to holders of 6½ per cent. Convertible Sinking Fund Gold Debentures of International Match Corporation (called for redemption at 105 and interest on January 19, 1925, convertible up to 5 days before redemption into 30 shares of Common Stock for each $1,000 face amount of Debentures) on delivery of Debentures to us on or prior to January 14, 1925, at the rate of 30 shares of Participating Preference Stock, $1,050 par value, for each $1,000 face amount of Debentures, with adjustment of accrued interest and dividend as of the date Debentures are presented for exchange.

Based on the redemption price of 105 and accrued interest this exchange is equivalent to a price for the Participating Preference Stock of $35 a share and accrued dividend.

Yielding, at the cumulative preferred dividend rate of $2·60 a share per annum, over 7·40 per cent. on the investment.

Participating Preference Stock offered when, as and if issued and received by us. Legal matters will be passed upon by Messrs. Larkin, Rathbone and Perry, of New York. Books and accounts of Corporation have been audited by Messrs. Ernst and Ernst. It is expected that temporary stock certificates or interim receipts will be ready for delivery on or about January 19, 1925.

LEE, HIGGINSON & CO.

GUARANTY COMPANY OF NEW YORK, BROWN BROTHERS & CO.

THE NATIONAL CITY COMPANY, DILLON, READ & CO.

CLARK, DODGE & CO.

The statements contained in this circular, while not guaranteed, are based upon information and advice which we believe accurate and reliable.

Figures expressed in dollars relating to Swedish Match Company and its subsidiaries have been converted from kronor at par of exchange 1 krona = $·268. At present the krona is quoted at a slight premium.

December, 1924.

INTERNATIONAL MATCH CORPORATION.

New York, December 17, 1924.

Messrs. Lee, Higginson & Co.,

DEAR SIRS,

In connection with the new issue of 450,000 shares of Participating Preference Stock of International Match Corporation, I take pleasure in submitting the following information:

Properties and business.

International Match Corporation, incorporated in Delaware in 1923, acquired, shortly after its organization, from Swedish Match Company and others the greater part of or the entire capital stocks of companies owning 42 match manufacturing plants in various European and other countries outside of Sweden. It also owns the entire capital stock of Vulcan Match Company, Inc., the sales company in the United States for products of the Swedish Match Company and its subsidiaries. It also owns the entire capital stock of a company owning a large match manufacturing plant in Canada. The International Match Corporation is controlled by the Swedish Match Company through the ownership of a majority of its common stock.

In addition to the properties control of which was originally acquired by the International Match Corporation, the proceeds of $15,000,000 of its Debentures issued in November, 1923 now called for redemption, have been and are being used for the acquisition of investments in the Far East and in North and South America. In the Far East the International Match Corporation has already secured control of a number of important match manufacturing companies, and extension of its influence in the match business in that part of the world is showing still further progress.

CAPITALIZATION OF INTERNATIONAL MATCH CORPORATION
(upon completion of present financing).

	Authorised shares.	Outstanding shares.
Capital Stock:		
Participating Preference Stock, par value $35 a share, non-voting	900,000	450,000
Common Stock, no par value, voting	1,450,000	1,000,000

Neither International Match Corporation, nor any subsidiary, will have any outstanding mortgage or funded debt upon completion of the present financing (other than $45,024 real estate mortgage of one subsidiary).

Holders of Debentures have the right to convert their Debentures into Common Stock at the rate of 30 shares for each $1,000 of Debentures. If any Debentures should be converted, the number of outstanding shares of Common Stock would be correspondingly increased and of Participating Preference Stock decreased.

Purpose of Issue.

The Participating Preference Stock of International Match Corporation is being issued to provide for retirement of the $15,000,000 6½ per cent. Convertible Sinking Fund Gold Debentures called for redemption at 105 and interest on January 19, 1925.

Financial Condition.

Statement of assets and liabilities, prepared by Messrs. Ernst & Ernst, based on October 31, 1924, consolidated balance sheet of International Match Corporation and constituent companies, but showing issue of 450,000 shares of Participating Preference Stock against retirement of $15,000,000 6½ per cent. Convertible Sinking Fund Gold Debentures:

Assets:		
		$
Land, Buildings, Machinery and Equipment, . .		34,378,539
Current Assets:		
	$	
Cash	1,547,572	
Accounts Receivable	8,231,181	
Inventories	6,366,271	16,145,024
		50,523,563
Liabilities:		
Current Liabilities:		
Accounts Payable, etc. . . .	2,209,975	2,209,975
Real Estate Mortgage (office building of one subsidiary company)		45,024
		2,254,999
Balance available for Capital Stock shown above . . .		48,268,564

Consolidated net assets exclusive of good will, patents, trademarks and deferred charges, after deducting all liabilities other than capital stock, amount to $48,268,564, or $107·26 per share of Participating Preference Stock. Net current assets alone of $13,935,049 equal $30·95 per share of Participating Preference Stock. Total current assets of $16,145,024 are more than 7 times total current liabilities of $2,209,975.

Earnings.

Consolidated sales and consolidated net profits of International Match Corporation and constituent companies, available for dividends, after depreciation and income taxes, for the 4 years ended December 31, 1924, two months partly estimated, were:

Years ended December, 31st.	Sales.	Net Profits available for Dividends.
	$	$
1921	14,207,200	3,662,486
1922	15,702,400	3,651,869
1923	16,605,136	3,935,415
1924	20,680,000	4,800,000

Average net profits available for dividends for the 4 years ended December 31, 1924, two months partly estimated, were $4,012,442, or more than 3·4 times the $1,170,000 annual preferred dividend requirement for Participating Preference Stock.

Consolidated sales for the year 1924, two months partly estimated, were $20,680,000; and consolidated net profits, available for dividends, were $4,800,000, or more than 4 times the $1,170,000 annual preferred dividend requirement for this Participating Preference Stock. Net profits for 1924 equal more than $10 a share on the Participating Preference Stock, and equal $3·31 a share on all Stock, both Participating Preference and Common, now to be outstanding.

Participating Preference Stock Provisions.

Among the provisions relating to the Participating Preference Stock to be included in the Certificate of Incorporation of International Match Corporation, are the following, in brief:

Authorized Issue.—900,000 shares now authorized by the Corporation's voting stockholders. Additional shares may be issued when authorized by the necessary votes of the Common (voting) stockholders and of the board of directors, provided that, after 30 days' notice, holders of 25 per cent. or more, of the total Participating Preference Stock then outstanding do not dissent.

Preferred as to Assets.—Participating Preference Stock entitled in dissolution or liquidation, whether voluntary or involuntary, to $40 a share and accrued dividends before any distribution may be made on the Common Stock, and participates equally with the Common in any distribution of assets after the Common Stock has received $40 a share.

Preferred as to Cumulative Dividends over Common Stock at the rate of $2·60 a share per annum, payable quarterly, January 15, April 15, July 15 and October 15. First quarterly dividend payable April 15, 1925.

Participation.—After dividends of $2·60 a share have been paid on the Participating Preference Stock in any year, the directors of the Corporation may, at their discretion, declare further dividends on the Participating Preference Stock regardless of what dividends, if any, have been declared on the Common Stock, but in any case the Participating Preference Stock participates at least equally with the Common Stock, share for share, after the Common Stock has received $2·60 a share in any year. Participating Preference Stock also participates equally share for share with the Common Stock in dividends paid in stock or any other form. If Participating Preference Stock receives dividends of more than $2·60 in any year, the excess shall not be applied to reduce the $2·60 cumulative preferred dividends in any subsequent year.

Non-Voting.—Except as expressly provided, Participating Preference Stock shall have no voting power.

Equal Subscription Rights shall be given Participating Preference Stockholders when given to Common Stockholders but any stock or securities may be issued without giving either class of stock any subscription rights.

Mortgage Debt, Funded Debt or Preferred Stocks having priority over or equal rights with the Participating Preference Stock, or additional Participating Preference Stock (other than the 450,000 additional shares now authorized) may be issued by the Corporation, but only if, after 30 days' notice, holders of 25 per cent. or more, of the total Participating Preference Stock then outstanding do not dissent.

Annual Audit is to be made by independent public accountants approved by Lee, Higginson & Co.

Changes in the Above Provisions may be made only with the consent of holders of two-thirds of the total Participating Preference Stock outstanding. The preferred dividend rate, participating rights, and the amount payable on dissolution, shall not in any event be reduced.

Swedish Match Company.

As the Swedish Match Company owns a majority of the Common (voting) Stock of International Match Corporation, the following information regarding that Company is of interest.

The Swedish Match Company has $48,240,000 par value of capital stock outstanding, now quoted at about 100 per cent. of par. For the last 21 years the Swedish Match Company since its incorporation in Sweden in 1917, and prior to that date the predecessor companies, Jonkopings and Vulcan Match Manufacturing Company, have earned a net profit in every year and have paid dividends in every year of that period on common capital stock from time to time outstanding.

Share capital, profits, dividends and sales during 1910-1923, for Swedish Match Company and its two main subsidiaries since 1918, and for Jonkopings and Vulcan Match Manufacturing Company prior to that year, were:

	Ordinary Share Capital.	Net Profit.	Profit in per cent. earned on Ordinary Share Capital.	Dividends in per cent. paid on Ordinary Share Capital.	Sales of Matches.*
	KRONOR.	KRONOR.			KRONOR.
1910 . .	3,000,000	1,169,478	38·98	6	13 402,018
1911 . .	3,000,000	898,929	29·96	8	13,446,212
1912 . .	3,000,000	888,313	29·61	8	17,426,536
1913 . .	3,000,000	863,453	28·78	9	18,208,256
1914 .	3,000,000	1,282,430	42·75	10	21,201,304
1915 .	3,000,000	4,674,385	155·81	10	38,864 925
1916 . .	3,000,000	5,441,586	181·39	12	55,902 927
1917 . .	6.000,000	3,298,784	54·98	12	53,319,644
1918 . .	45,000,000	7,776,026	17·28	12	66,509 291
1919 . .	45,000,000	11,831,170	26·29	14	89,296,155
1920 . .	45,0 0,000	11,436,010	25·41	14	137,646,274
1921 . .	45,000,000	8,680,342	19·29	12	111,375,683
1922 . .	45,000,000	9,240,317	20·53	12	125,368,663
1923 . .	90,000,000	17,477,834	19·42	12	132,618,730

*This represents sales of matches by the Swedish Match Company and subsidiaries, and its proportion of match sales by controlled foreign factories.

The average net profit earned by the Swedish Match Company and Jonkopings and Vulcan Match Manufacturing Company during the last 21 years has been 25·17 per cent. on common stock from time to time outstanding and in none of the last 17 years have net profits been less than 17 per cent. on then outstanding common stock. The average dividend rate paid during the last 21 years on common stock from time to time outstanding has been over 9 per cent. per annum and during the last 11 years has been 11·7 per cent. per annum.

During none of the last 7 years has the dividend on then outstanding common stock of the Swedish Match Company been at a rate of less than 12 per cent. per annum, the rate now being paid on its $48,240,000 present outstanding common capital stock.

The Swedish Match Company, through its subsidiary companies, owns 20 match manufacturing plants in Sweden (the business of the oldest founded in 1845) a sulphite pulp and paper mill with an annual production of 13,000 tons of paper chiefly used in the match industry, and three important plants engaged in the production of match manufacturing machinery. They also own three plants manufacturing chemicals for the match industry, three lithographic printing establishments and a number of enterprises auxiliary to the match industry, including sawmills and transportation companies. The companies own valuable timber lands in Sweden well situated in relation to the different match manufacturing plants, covering a total of 120,000 acres and also own valuable long term timber rights. In addition to these interests in Sweden the Swedish Match Company has important investments in match manufacturing companies in different countries throughout the world.

International Match Corporation and the Swedish Match Company, with their subsidiaries, together have more than 25,000 employees and produce more than one-third of all matches used in the world. The constituent companies manufacture 10 billion boxes or 600 billion matches per annum. This corresponds approximately to one match per day for every individual in the world. Probably no other group of manufacturing companies reach with their products as many consumers as do the constituent companies of the Swedish Match Company and the International Match Corporation.

Covenant of Swedish Match Company.

Swedish Match Company has agreed with International Match Company and its stockholders that the Swedish Company will not reduce its ownership of Common shares of International Match Corporation below a majority, without first publishing notice of its intention so to do, and offering and agreeing to purchase all Participating Preference Stock of International Match Corporation which may be offered to it, within three months after the first publication, at a price not less than 120 per cent. of the par value thereof *plus* accrued dividends.

Management.

Management of Swedish Match Company and International Match Corporation and subsidiary companies is in hands of men of long experience in the industry, and the chief administrative officers have been with Swedish Match Company since its organization and have successfully conducted and developed its business since that time.

Officers of International Match Corporation are: Ivar Kreuger, President; Krister Littorin, Vice-President; C. G. Bergman, Vice-President; F. Atterberg, Vice-President; B. Tomlinson, Treasurer; E. A. Hoffman, Secretary. Directors will include: Ivar Kreuger, President, Managing Directors, Swedish Match Company; Krister Littorin, Vice-President; C. G. Bergman, Vice-President; Frederic W. Allen, of Lee, Higginson & Co.; Henry O. Havemeyer, President, Brooklyn Eastern District Terminal Company; F. L. Higginson, Jr., of Lee, Higginson & Co.; Adrian H. Larkin, of Larkin, Rathbone & Perry; John McHugh, President, Mechanics & Metals National Bank, New York; Henry V. Poor; P. A. Rockefeller; and Samuel F. Pryor, Chairmans, Executive Committee Remington Arms Company, Inc.

Very truly yours,

IVAR KREUGER,

President.

PROSPECTUS.

A copy of this Prospectus has been filed with the Registrar of Joint Stock Companies, Bengal, as required under Section 92 (2) of Act VII of 1913.

The Subscription List will open at 10 A.M. on the 28th October 1925, and remain open until 3 P.M. on the 27th November 1925.

THE ASSAM MATCH COMPANY, LIMITED.

(INCORPORATED UNDER THE INDIAN COMPANIES ACT VII OF 1913.)

Authorised Capital Rs. 7,00,000.

Divided into 70,000 Ordinary Shares of Rs. 10 each, of which it is proposed to issue 50,000 Ordinary Shares of Rs. 10 each at par.

Subscriptions are invited to the above issue payable as follows:—

Rs. 2-8-0 on application.
Rs. 2-8-0 on allotment.
Rs. 2-8-0 when called, but not before the 1st January 1926.
Rs. 2-8-0 when called, but not before the 1st March 1926.

Rs. 10-0-0

DIRECTORS:

The Hon'ble SAMUEL BEST, M.L.C., Chairman,
14, Old Court House Street, Calcutta.

Rai Sir ONKARMULL JATIA BAHADUR,
KT., O.B.E., Merchant,
8, Clive Row, Calcutta.

Hon'ble Maulvi ABDUL HAMID, President,
Assam Legislative Council, Pathantola, Sylhet.

Raja PRABHAT CHANDRA BARUA, Raja of Gauripur, Assam.

Mr. R. THORBURN, Manager,
Messrs. Forbes Forbes Campbell & Co., Ltd.,
8, Royal Exchange Place, Calcutta.

Mr. M. BIERMAN,
Representative in India for the Swedish Match Co.,
Vulcan House, Nicol Road, Ballard Estate, Bombay.

Mr. S. SCHÉLE (Managing Director),
Representative in India for the Swedish Match Co.,
8, Royal Exchange Place, Calcutta.

BANKERS:

CHARTERED BANK OF INDIA, AUSTRALIA AND CHINA, Calcutta.
CENTRAL BANK OF INDIA, LTD., Calcutta.

SOLICITORS:

Messrs. MORGAN & Co.,
1, Hastings Street, Calcutta.

AUDITORS:

Messrs. PRICE, WATERHOUSE, PEAT & Co.,
B4, Clive Buildings, Calcutta.

REGISTERED OFFICE:

8, Royal Exchange Place, Calcutta.

PROSPECTUS.

This Company, which is promoted by the Swedish Match Company in collaboration with the Directors, has been formed with the object of erecting and working a Match factory in India and dealing in its products and with the further objects set out in its Memorandum of Association.

Being satisfied as a result of experiments during the last two years that the manufacture of good matches in India is a practical and sound commercial proposition, the Swedish Match Company is following the principle in the case of this Company which has all along been a feature of its business overseas, namely, to invite the co-operation of local capital, immediately the experimental stages of the industry have been satisfactorily concluded.

Of the total annual consumption of matches in India, which is estimated at thirteen million gross of boxes approximately, seven million gross at the present time are the products of the Swedish Match Company.

The Company has obtained from the Government of Assam concessions embracing a total area of approximately 600 square miles of forest land in the Goalpara Division from which a practical unlimited supply of timber, particularly suitable for match manufacture, will be available.

After careful investigation the Company has also acquired from the Raja of Gauripur a lease for a term of 60 years of a suitable factory site of about 20 Biggahs at a salami of only Rs. 20 per Biggah (*plus* compensation to tenants at the rate of Rs. 37-8 per Biggah) and otherwise on advantageous terms including an option to take up a lease on similar terms of so much more land in the neighbourhood as may be found necessary for the Company.

The factory site is at Dhubri on the River Brahmaputra, to which timber from the Company's concession can be floated down the river to a point only half a mile distant from the factory; this is an advantage which cannot be overemphasized, since it ensures delivery of the principal item of raw material at the Company's factory with the minimum cost in labour and freight and ensuring a very low cost of production, which will enable the Company successfully to compete with all match enterprises at present serving the areas to which the Company's selling activities will be directed, namely, Assam and Northern Bengal.

The factory site is only about a mile from Dhubri Station on the Assam Bengal Railway and the Dhubri Steamer Ghat whence all places within the above area can be easily reached by rail and river.

After careful enquiry it has been computed that in Assam and Northern Bengal alone the present demand and consumption is not less than 1,200 cases or 60,000 gross of boxes per month and the factory will be equipped for an output of not less than 625 cases or 31,250 gross per month.

Having regard to the factors present in this case making for low cost of production, which is estimated at a maximum of Re. 1-5-6 per gross, and on the basis of selling rates now prevailing, three annas per gross can safely be regarded as a minimum anticipated profit, which on an output of 625 cases per month, means a profit of about Rs. 70,000 per annum or 14 per cent. on the Capital now offered for subscription.

The Company has made arrangements whereby Messrs. Forbes Forbes Campbell & Co., Ld., Calcutta, who have for some time past successfully handled the sale of imported and Indian made matches will also undertake the exclusive selling agency for the Company upon advantageous terms which will ensure for the Company a selling organisation in full working order by the time the Company's first productions are ready for the market.

A considerable amount of time, labour and money has been devoted by the promoters to the preliminary investigations and experiments but nothing is being paid to the promoters by the Company for this and it will therefore commence operations without the burden of capital expenditure on account of promotion money or goodwill.

For the purpose of securing the best expert advice and help available the Company has entered into a contract with the Swedish Match Company under which the latter undertake to give technical guidance in the manufacturing of matches and place expert staff from the Swedish or affiliated factories at the Company's disposal.

Advice will further be given as to the purchase and supply of machinery, tools and materials and all these facilities will be rendered for a period of ten years with the Company's option of renewal thereafter.

For their services to the Company under this contract an annual fee of Rs. 3,600 will be payable to the Swedish Match Company.

The proceeds of the present issue will be exclusively devoted to the construction and the equipment of the factory, staff's quarters, purchase of machinery and tools and the provision of a sum of Rs. 1,76,500 as working capital.

It is estimated that the Company will be in a position to commence manufacture in February, 1926.

Allocation of capital expenditure will be as follows:—

	Rs.
Land	2,000
Buildings, compound and enclosure	90,500
Staff's Quarters	20,000
Machinery	1,31,000
Tools, loose parts, etc.	7,000
Freights, Duty, Erection	24,000
Power Station	34,000
Caseboards Factory	6,000
TOTAL	3,14,500
Working Capital	1,76,500
GRAND TOTAL	4,91,000

Preliminary expenses are estimated to amount to Rs. 9,000.

The Swedish Match Company undertake to subscribe in cash for such number of shares as with the amount subscribed by the General Public will provide sufficient capital for the above purposes.

In effect therefore the whole of the present issue has been underwritten by the Swedish Match Company free of cost to the Company and it is submitted that this is a fair token of the confidence reposed in the project by this concern who have behind them 75 years' experience of the industry both at home and abroad.

The following contracts have been or will be entered into:—

(1) Contract dated the 10th October, 1925, between the Company and Forbes Forbes Campbell & Co., Ld., providing for the selling agency above referred to.

(2) Contract dated the 17th July 1925, between the Company and Martin & Co., Calcutta, for the steel construction work of the main factory.

(3) Contract dated the 7th September 1925, between the Company and Jas. Alexander & Co., Ld. for the steel construction in respect of the remaining buildings.

(4) Contract dated the 10th October 1925, between the Company and the Swedish Match Company of Stockholm.

These contracts together with the Government concession, the lease of the factory site and The Swedish Match Company's undertaking may be inspected at the offices of Messrs. Morgan & Co., Solicitors, at any time during the usual business hours whilst the list remains open.

The Articles provide for the qualification of a Director being his holding shares in the Company of the nominal value of Rs. 500.

The provisions in the Articles of Association regarding remuneration of Directors are that each Director shall receive from the funds of the Company the sum of Rs. 500 per year with an additional consideration for the Chairman of Rs. 500.

Arrangements have been made whereby the services of Mr. S. Schéle of the Swedish Match Company, who has a wide experience of the trade and has for many years been engaged in that concern's activities in this and other countries, will be available as Managing Director of this Company at a cost to the latter of Rs. 1,000 per mensem.

Having regard to the Swedish Match Company's undertaking above set out the Articles of Association expressly provide that in the case of this issue no allotment shall be made unless and until the whole issue has been subscribed and the sums payable thereon on application have been paid and received by the Company.

A copy of the Memorandum of Association is printed in the fold of this Prospectus.

The only interests of the Directors in the promotion of or in the property proposed to be acquired by the Company are:—

(1) That the Raja of Gauripur is interested as owner of the land to be leased to the Company as a factory site.

(2) That Mr. M. Bierman and Mr. S. Schéle are both representatives for India of the Swedish Match Company.

(3) That Mr. R. Thorburn is interested as a Manager of Messrs. Forbes Forbes Campbell & Co., Ld.

The Articles of Association provide for reasonable brokerage.

Application for Shares.—Application for shares should be made upon the accompanying form and forwarded to either of the Company's Bankers together with a remittance for the amount payable on application. If no allotment is made the deposit will be returned in full and where the number of shares allotted is less than the number applied for, the surplus will be credited in reduction of the amount on allotment or calls.

Failure to pay any subsequent instalments on shares allotted when due will render previous payments liable to forfeiture.

The Directors will not proceed to allotment unless the whole of the issue now offered is subscribed.

Prospectus and forms of application can be obtained at the office of the Company, and at the head offices and branches of the Company's Bankers.

SAMUEL BEST.

ONKAR MULL JATIA.

ABDUL HAMID.

PRABHAT CHANDRA BARUA.

ROBERT THORBURN.

MOUNTY BIERMAN.

SUNE SCHÉLE.

Dated Calcutta, this 15th day of October 1925.

Stamp Rs. 30.

[THE INDIAN COMPANIES ACTS, 1913—1920.]

COMPANY LIMITED BY SHARES.

MEMORANDUM OF ASSOCIATION

OF

THE ASSAM MATCH COMPANY, LIMITED.

1. The name of the Company is "The Assam Match Company, Limited."
2. The Registered Office of the Company will be situated in Bengal.
3. The objects for which the Company is established are:—

(*a*) To carry on in India, Burma, Ceylon or elsewhere the business of manufacturers of and dealers, whether wholesale or retail, in all kinds and descriptions of matches or match-lights or other lighting appliances or apparatus whether composed or made in part or in whole of or from any combustible or non-combustible substance, material or thing whatsoever.

(*b*) To buy, sell, import, export, manipulate, treat, manufacture and deal in all kinds and descriptions of machinery, plant, implements, tools and property and all chemical, industrial and other preparations and articles and all other substances, apparatus, materials and things capable of being used in the business of manufacturing matches or match-lights or other lighting appliances or apparatus or otherwise howsoever or required by any customers of or any persons having dealings with the Company either by wholesale or retail, and generally to carry on any other business or businesses whatsoever which may seem to the Company or the Company may consider capable of being carried on in connection with the above or calculated directly or indirectly to enhance or render profitable any of the Company's property or rights. And to take up agencies and act as agents for any manufacturers and suppliers of any such machinery, plant, implements, tools, property, chemical, industrial and other preparations and articles, substances, apparatus, materials and things in connection with the business of manufacturing matches or match-lights or other lighting appliances or apparatus or any other machinery.

(*c*) To apply for and to purchase or otherwise acquire from any Government, State or authority, any concessions, grants, decrees, rights, powers and privileges whatsoever whether in India, Burma, Ceylon or elsewhere which may seem to the Company capable of being turned to account, and to work, develop, carry out, exercise and turn to account the same.

(*d*) To acquire by purchase, amalgamation, grant, concession, lease, license, barter, or otherwise, either absolutely or conditionally, and either solely or jointly with others, any houses, lands, farms, forests, forest rights, timber estates, mines, quarries, water rights, water-works, wayleaves, and other works, privileges, rights and hereditaments, and any tract or tracts of country in India, Burma, Ceylon or elsewhere, together with such rights as

may be agreed upon and granted by Government or the rulers or the owners thereof; and to expend such sums of money as may be deemed requisite and advisable in the exploration, survey, development and working thereof; and to obtain rights over, be interested in, build, alter, construct, maintain, and regulate any roads, tramways, railways, canals, water-ways, rivers, wharfs, docks, harbour works and harbours either by acquiring such properties outright or by acquiring the rights of others in, to and over them. And generally to acquire in India, Burma, Ceylon or elsewhere by purchase, lease or otherwise, for the purposes of the Company, any real or personal, immoveable or moveable property, rights or privileges including any land, buildings, rights of way, easements, licenses, concessions and privileges, patents, patent rights, trade-marks, machinery, rolling stock, utensils, accessories and stock-in-trade.

(*e*) To enter into and fulfil all contracts, agreements and arrangements necessary or useful for any or all of the objects of the Company with any Government or Ruling Power, Native State, Municipality or other Local Government or authority or any person, firm, company, corporation or association in India, Burma, Ceylon or elsewhere.

(*f*) To purchase or otherwise acquire, and undertake the whole or any part of the business, property and liabilities of any person, firm or company carrying on any business of a nature altogether or in part similar to the business which this Company is authorised to carry on or possessed of property suitable for the purposes of this Company in India, Burma, Ceylon or elsewhere, and to pay for the same and all other property or rights of whatsoever kind acquired by the Company, in cash or in shares, debentures or debenture stock of the Company.

(*g*) To apply for, purchase or otherwise acquire, register and protect, hold, work, prolong and renew and in any manner dispose of patents, trade-marks, trade names, designs, copyrights, and secret processes, mechanical, chemical or others, inventions, licenses, concessions, and the like, conferring any exclusive or non-exclusive or limited right to use or work the same or any secret or other information as to any invention which may seem capable of being used for any of the purposes of the Company or the acquisition of which may seem calculated directly or indirectly to benefit this Company and to use, exercise, develop or grant licenses in respect of or otherwise turn to account the property, rights, or information so acquired, and to expend money in experimenting upon, testing and improving or seeking to improve any patents, designs, inventions, secret processes or rights which the Company may acquire or propose to acquire.

(*h*) To enter into partnership, or into any arrangement for sharing profits, union of interests, co-operation, joint adventure, reciprocal concession or otherwise, with any person, firm or company carrying on or engaged in or about to carry on or engage in, any business or transaction which this Company is authorised to carry on or engage in, or any business or transaction capable of being conducted so as directly or indirectly to benefit this Company, and to lend money to, guarantee the contracts of, or otherwise assist any such person, firm or company and to take or otherwise acquire shares and securities of any such company, and to sell, hold, re-issue with or without guarantee, or otherwise deal with the same.

(*i*) To take or otherwise acquire and hold shares in any other company having objects altogether or in part similar to those of the Company, or carrying on any business capable of being conducted so as directly or indirectly to benefit this Company.

(*j*) To amalgamate with any company or companies having objects altogether or in part similar to those of this Company.

(*k*) To promote, incorporate and float any company or companies for the purpose of acquiring all or any of the property, rights and liabilities of this Company or for any other purpose which may seem directly or indirectly calculated to benefit this Company or its Members.

(*l*) To construct, or otherwise acquire, repair, maintain and use any buildings or works necessary or convenient for the purposes of the Company, including mills, factories, workshops, godowns, bungalows, wells, depôts, show-rooms and shops; and to demolish, re-erect, and to alter or otherwise deal with the same as occasion may require.

(*m*) To borrow or raise or secure the payment of money in such manner as the Company shall think fit, and in particular, by mortgage or by the issue of debentures or debenture stock, perpetual or otherwise, charged or not charged, by way of specific or floating security on all or any of the assets (both present and future) of the Company, including its uncalled capital, and to purchase, redeem or pay off any such securities.

(*n*) To acquire or issue and use, deal in, and pledge, mortgage, transfer, assign, sell or negotiate mercantile documents of every kind and description, and without prejudice to this generality, to draw, make, accept, endorse, discount, execute, issue, negotiate, and assign cheques, drafts, bills of exchange, promissory notes, hundies, debentures, bonds, bills of lading, railway receipts and other negotiable or transferable instruments or securities; and to purchase, sell, endorse and surrender for renewal any Government Promissory Notes or Government War Loan Bonds or other securities of the Government of India or any other Government, whether within or without the British Empire.

(*o*) To sell, exchange, let assign, mortgage, or otherwise dispose of the undertaking of the Company or any part thereof, or all or any of the property, real and personal, assets, rights or interests of the Company, for such consideration and upon such terms as the Company may think fit, and in particular, for shares, fully or in part paid up, bonds, debentures, debenture stock or securities of any other company, having objects altogether or in part similar to those of this Company.

(*p*) To distribute any of the property or assets of the Company or the proceeds of the sale, lease or other disposal thereof, among the Members in specie or in kind, and to issue to or distribute among the Members of the Company stock or shares instead of cash by way of dividend or bonus.

(*q*) To receive money on deposit or loan on such terms as the Company may approve, and to guarantee payment of the debts and performance of the contracts of Members of the Company or persons having dealings with the Company or others.

(*r*) To subscribe or contribute to any charitable, benevolent or useful object of a public character the support of which will in the opinion of the Directors tend to increase the repute or popularity of the Company among its employees or the public.

(*s*) To provide for the welfare of persons in the employment of the Company or formerly engaged in any business acquired by the Company and the wives, widows and families of such persons by a Provident Fund or Funds, grants of money, pensions or otherwise, and to contribute towards the premiums of insurance payable on any insurance on the lives of such employees, and to

charge the amount of all subscriptions, donations, contributions, premiums or payments which may be made under this and the immediately preceding sub-clause, to the working expenses of the Company.

(*t*) To establish branches or appoint agencies for or in connection with any of the objects of the Company in any part of the world, and to engage in agency business for others in any part of the world, in such manner and upon such terms as are calculated to further the objects of the Company, or any of them.

(*u*) To do all or any of the above things and all such other things as are incidental or may be thought conducive to the attainment of the above objects or any of them, in any part of the world, and as principals, agents, contractors, trustees or otherwise, and by or through trustees, agents or otherwise, and either alone or in conjunction with others.

4. The liability of the Members is limited.

5. The Capital of the Company is Rupees Seven lacs (Rs. 7,00,000) divided into 70,000 shares of Rupees 10 each.

FORM OF APPLICATION FOR SHARES.

To

THE DIRECTORS,

THE ASSAM MATCH COMPANY, LIMITED.

GENTLEMEN,

Having paid to the Company's Bankers, The Chartered Bank of India, The Central Bank of Australia and China India, Limited, Calcutta, the sum of Rs. being a deposit of Rs. 2-8 per share on shares of the abovenamed Company, I request you to allot me that number of shares, and I hereby agree to accept the same or any smaller number of shares, that may be allotted to me and to pay the balance of Rs. 7-8 as follows:—Rs. 2-8 on allotment; Rs. 2-8 when called, but not before the 1st January 1926; and Rs. 2-8 when called, but not before the 1st March 1926; and I authorise you to register me as a holder of the said shares.

Please write distinctly.

Name in full (Mr., Mrs. or Miss) _____

Address _____

Description _____

Date _____

Signature _____

N.B.—This form, with the remittance, should be sent to the Company's Bankers, who will forward the application to the Managing Director of the Company.

THE ASSAM MATCH COMPANY, LIMITED.

ON ALLOTMENT.

Banker's receipt (to be retained by the applicant).

Received this day of 19 , from M the sum of Rs. being the second instalment of Rs. upon shares in the abovenamed Company which have been allotted.

Stamp.

THE ASSAM MATCH COMPANY, LIMITED.

ON APPLICATION.

Banker's receipt (to be retained by the applicant).

Received this day of 19 , from M the sum of Rs. being a deposit of Rs. upon shares in the abovenamed Company.

Stamp.

THE ASSAM MATCH COMPANY, LIMITED.

Notice is hereby given that the Statutory General Meeting of the Company will be held at the Registered Office of the Company, 8, Royal Exchange Place, Calcutta, on Friday, the 16th day of July 1926, at 3 P.M., for the purpose of considering the Statutory Report and of transacting such business as, under the provisions of section 77 of the Indian Companies Act, 1913, should or may be transacted thereat.

By order,

For THE ASSAM MATCH COMPANY, LIMITED,
SUNE SCHÉEL,
Managing Director.

CALCUTTA.
The 26th June 1926.

STATUTORY REPORT OF THE ASSAM MATCH COMPANY, LIMITED.

(Issued pursuant to section 77 of the Indian Companies Act, 1913.)

The Directors report to the Members as follows:—

1. The total number of Shares allotted is 50,000 of Rs. 10 each.

2. The Shares so allotted are on the footing that they are to be paid in cash as under:—

(*a*) Rs. 2-8 per share on Application.
(*b*) Rs. 2-8 per share on Allotment.
(*c*) Rs. 2-8 per share on First Call.
(*d*) Rs. 2-8 per share on Second Call.

3. Total amount of cash received by the Company in respect of the said 50,000 Shares of Rs. 10 each is Rs. 4,99,720.

4. The following is an abstract of the Receipts and Payments of the Company on Capital and other accounts to 19th June 1926:—

RECEIPTS.

	Rs. A. P.	Rs. A. P.
CAPITAL—		
Amount realised on 50,000 Shares at Rs. 10 per share	5,00,000 0 0	
Less—In arrear	280 0 0	
		4,99,720 0 0
INTEREST	...	641 1 0
SUNDRY CREDITORS	...	1,02,377 1 0
TOTAL	...	6,02,738 2 0

PAYMENTS.

	Rs. A. P.	Rs. A. P.
FIXED CAPITAL EXPENDITURE—		
Leasehold Land	1,256 4 0	
Buildings	59,076 4 0	
Machinery (including Fitters' Shop and Caseboard Machinery)	1,44,260 15 0	
Power Plant	44,500 0 0	
Furniture and Equipment	5,618 7 0	
Loose Tools and Plant	33,395 0 0	
		2,88,106 14 0
STOCK OF RAW MATERIALS AND STORES	...	96,883 10 0
ADVANCES	...	79,611 5 0
PRELIMINARY EXPENSES	...	8,626 7 0
BROKERAGE PAID ON SHARES	...	3,070 0 0
DEVELOPMENT EXPENSES	...	28,077 14 0
BALANCE—		
Cash at Dhubri Factory	2,681 6 0	
Cash at Banks on Current Account	81,878 3 0	
With Forbes Forbes Campbell & Co., Ld.	3,802 7 0	
With Rivers Steam Navigation Co., Ld.	10,000 0 0	
		98,362 0 0
TOTAL Rs.	...	6,02,738 2 0

5. The Preliminary Expenses of the Company are estimated at Rs. 9,000.

6. The names, addresses and descriptions of the Directors, Auditors and Managing Director and Secretary of the Company are as follows:—

Directors:

THE HON'BLE SAMUEL BEST, M.L.C., *Chairman*, 14, Old Court House Street, Calcutta, *Merchant.*

RAI SIR ONKARMULL JATIA BAHADOOR, KT., O.B.E., 8, Clive Row, Calcutta, *Merchant.*

HON'BLE MAULVI ABDUL HAMID, Pathantola, Sylhet, *President, Assam Legislative Council.*

RAJA PRABHAT CHANDRA BARUA, Assam, *Raja of Gauripur.*

R. THORBURN, ESQ., Messrs. Forbes Forbes Campbell & Co., Ltd., 8, Royal Exchange Place, Calcutta, *Merchant.*

M. BIERMAN, ESQ., Vulcan House, Nicol Road, Ballard Estate, Bombay, *Merchant.*

Auditors:

PRICE, WATERHOUSE, PEAT & Co., B4, Clive Buildings, Calcutta, *Chartered Accountants.*

Managing Director:

S. SCHÉLE, ESQ., Vulcan House, Nicol Road, Ballard Estate, Bombay, *Merchant.*

Secretary:

A. MOLLER, ESQ., 8, Royal Exchange Place, Calcutta, *Merchant.*

7. Particulars of any contract the modification of which is to be submitted to the meeting for its approval together with the particulars of the modification or proposed modification.—NONE.

We, the undersigned, Directors of the abovenamed Company, certify that the above report is correct.

SUNE SCHÉLE
R. THORBURN } *Directors.*

We, the undersigned being the Auditors of the abovenamed Company, hereby certify that the above report is correct as to the shares allotted by the Company and as to the cash received in respect of such shares and as to the receipts and payments of the Company on Capital Account.

PRICE, WATERHOUSE, PEAT & CO.,
Auditors of the Company.

CALCUTTA;

The 26th June 1926.

NOTICE.

THE ASSAM MATCH COMPANY, LIMITED.

NOTICE is hereby given that the Second Ordinary General Meeting of Shareholders of this Company will be held at the Registered Office of the Company, No. 8, Royal Exchange Place, Calcutta, on Friday, the 1st day of April 1927, at 12 noon (S. T.) for transaction of the following business:—

1. To receive and adopt the Directors' Report, and Audited Accounts for the year ended 31st December 1926.

2. To appoint Directors in the place of Maulvi Abdul Hamid and The Raja Prabhat Chandra Barua, who retire by rotation. They are eligible for re-election.
3. To appoint Auditors for the ensuing year and fix their remuneration.
4. To transact any other business which may be brought forward by the Chairman.

The Transfer Books of the Company will be closed from the 21st day of March 1927, to the 4th day of April 1927, both days inclusive.

By Order of the Board of Directors,

SUNE SCHÉLE.

Managing Director.

The 16th March 1927.

DIRECTORS' REPORT.

To

THE SHAREHOLDERS.

GENTLEMEN,

Your Directors beg to submit their Annual Report, together with the Audited Accounts of the Company for the year ended 31st December 1926, and in so doing have pleasure in stating that the estimated net profit of Rs. 3,010-14-0 shewn by the Interim Accounts submitted to the First Ordinary General Meeting in December last, has increased during the further three months now reviewed to Rs. 5,405-0-0, which your Directors recommend should be disposed of as follows:—

	Rs.	A.	P.
To be written off Preliminary Expenses Account	2,629	8	0
To be written off Brokerage on Shares . .	2,070	0	0
To be carried forward	705	8	0
TOTAL .	5,405	0	0

The main feature during the past year has been the reference of our Industry to the Tariff Board, before whom your Managing Director will appear in due course. At the same time as your Directors hope that due consideration will be given to continued protection in view of the inherent natural difficulties which exist for this Industry in India, they trust that some arrangement can also be made to prevent the existing over-production of matches. Since your Company commenced activities, numerous match manufacturing Concerns have been promoted with complete disregard to the fact that the requirements of the Country were already well covered by existing factories. Moreover, these new additions have, in many instances, lacked both experience and sufficient working capital, and especially the absence of the latter has on many occasions necessitated a forced sale of stocks at rates which have seriously interfered with regular trade. Selling prices have in consequence been steadily on the decline during the year, and there is unfortunately nothing to indicate an early improvement in this respect. Your Directors hope, however, that the present improvement in the cost of production will be maintained to such an extent that pace can be kept with reductions which presumably will be required in order to retain our market and ensure a balance between production and sales.

Experiments with Indian wood have continued during the year, and a few specimens have been found which can be used to advantage. It appears, however, that Indian timber is considerably more uneconomical in the work-

ing than the species available in the match making countries of Sweden and Japan, and your Directors trust that this will duly influence official opinion and lead to the provision of adequate and permanent protection of the Industry.

Two of your Directors, Maulvi Abdul Hamid and The Raja Prabhat Chandra Barua retire from the Board by rotation, and, being eligible, offer themselves for re-election.

You will have to appoint Auditors for the current year and fix their remuneration.

I am,
Gentlemen,
Yours faithfully,

S. J. BEST,
Chairman.

The Assam Match Company, Limited.

Balance sheet as at 31st December 1926.

CAPITAL AND LIABILITIES.

	Rs.	A.	P.	Rs.	A.	P.
CAPITAL—						
Authorised—						
70,000 Shares of Rs. 10 each . .	7,00,000	0	0			
				7,00,000	0	0
Issued, Subscribed and Paid up—						
50,000 Shares of Rs. 10 each .	5,00,000	0	0			
Less :—Calls in arrears . .	75	0	0			
				4,99,925	0	0
DEPRECIATION FUND	...			3,792	8	0
LIABILITIES—						
For Expenses	6,092	6	0			
For Supplies	1,52,216	9	0			
Other Finance	2,225	3	0			
				1,60,534	2	0
PROFIT AND LOSS ACCOUNT—						
Profit for the period as per annexed Account				5,405	0	0
TOTAL .	...			6,69,656	10	0

We have audited the Balance Sheet of The Assam Match Company, Limited, above set forth with the Books and Accounts of the Company in Bombay and Dhubri, and have obtained all the information and explanations we have required.

The Balance Sheet, in our opinion, is drawn up in conformity with the Law and exhibits a true and correct view of the state of the Company's affairs according to the best of our information and the explanations given to us and as shown by the Books of the Company.

A. F. FERGUSON & Co.,
Chartered Accountants,
Auditors.

Bombay, 23rd February 1927.

PROPERTY AND ASSETS.

	Rs. A. P.	Rs. A. P.
FIXED CAPITAL EXPENDITURE—		
Leasehold Land, at cost . . .	17,250 0 0	
Factory Buildings, at cost . .	1,02,501 10 0	
Staff and Workmen's Quarters, at cost	29,075 0 0	
		1,48,826 10 0
Machinery, Power Plant, etc., at cost	2,39,911 0 0	
Machinery in Transit, at cost .	1,724 0 0	
		2,41,635 0 0
Furniture and Fittings at cost .	21,368 4 0	
Loose Tools and Plant at cost .	37,897 11 0	
Motor Car, at cost . . .	1,000 0 0	
		60,265 15 0
		4,50,727 9 0

NOTE.—Allocations of Wages and expenses to Capital Expenditure are as certified by Officers of the Company.

PRELIMINARY EXPENSES . . .	11,629 8 0	
BROKERAGE ON SHARES	2,070 0 0	
		13,699 8 0
GENERAL STORES—		
As per Certified Inventories, at cost	27,432 0 0	
In Transit, at cost . . .	821 5 0	
		28,253 5 0
RAW MATERIALS—		
As per Certified Inventories, at cost	79,505 9 0	
In Transit, at cost . . .	16,575 3 0	
		96,080 12 0
STOCK-IN-TRADE—		
Matches and Stock-in-Process as per certified Inventories, at cost		15,630 0 0
BOOK DEBTS (Considered Good) . .		1,163 12 0
ADVANCES—		
Pre-paid Expenses	2,135 1 0	
Sundry Advances	20,861 15 0	
		22,997 0 0
Carried forward .	...	6,28,551 14 0

PROPERTY AND ASSETS.

	Rs. A. P.	Rs. A. P.
Brought forward .	...	6,28,551 14 0
CASH AND OTHER BALANCES—		
CASH ON HAND AT DHUBRI . .	4,448 11 0	
IN CURRENT ACCOUNT WITH—		
Chartered Bank, Bombay . .	7,655 10 0	
Chartered Bank, Calcutta . .	11,083 15 0	
Central Bank, Calcutta . . .	734 13 0	
Imperial Bank, Calcutta . .	3,225 5 0	
Forbes Forbes Campbell & Co., Ld., Calcutta	11,356 6 0	
		38,504 12 0
DEPOSIT WITH E. B. RAILWAY . .	600 0 0	
DEPOSIT WITH RIVERS STEAM NAVIGATION COMPANY	2,000 0 0	
		2,600 0 0
TOTAL .	...	6,69,656 10 0

We hereby certify that the above Balance Sheet, to the best of our belief, contains a true account of the Capital and Liabilities and of the Property and Assets of the Company.

S. J. BEST
R. THORBURN } *Directors.*
SUNE SCHÉLE

A. MOLLER *Secretary.*

सत्यमेव जयते

The Assam Match Company, Limited.

Profit and Loss Account for the period ended 31st December 1926.

	Rs. A. P.	Rs. A. P.
To EXPENDITURE—		
Factory Expenditure . . .	55,301 14 0	
Managing Director's Salary . .	5,000 0 0	
Technical Advice Fee . . .	1,500 0 0	
Directors' Fees	1,500 0 0	
Auditors' Fees	1,250 0 0	
Sundry Expenses in Bombay .	111 2 0	
Sales Charges	4,859 9 0	
Carried over .		69,522 9 0

	Rs. A. P.	Rs. A. P.
Brought forward .	...	69,522 9 0
To DEPRECIATION—		
Amount transferred to Depreciation Fund		3,792 8 0
To BALANCE—		
Net Profit carried to Balance Sheet		5,405 0 0
TOTAL .	...	78,720 1 0

Examined and found correct.

A. F. FERGUSON & Co.,
Chartered Accountants,
Auditors.

Bombay, 23rd February 1927.

	Rs. A. P.	Rs. A. P.
By Manufacturing Account . .		77,896 8 0
By Interest		425 4 0
By Sundry Receipts		398 5 0
TOTAL .	...	78,720 1 0

S. J. BEST
R. THORBURN } *Directors.*
SUNE SCHÉLE

A. MOLLER *Secretary.*

(5) *Letter, dated the 9th December 1927.*

With reference to your telegram No. 926 and letter No. 927, dated 28th ultimo, we have the honour to submit herewith enclosed the statement showing our latest working cost per gross of matches as per Form II of the Board's questionnaire as desired in your letter under reply.

Further we beg to inform you that you are at liberty to publish same if necessary.

FORM II.—*Statement showing works cost per gross of matches.*

	1926-27 Rs. A. P.
1. Cost of wood for splints and veneers . .	0 4 9
2. Cost of paper for labels and wrapper . .	0 0 11
3. Cost of chemicals	0 2 5
4. Cost of other raw materials	0 1 7
5. Factory labour	0 7 2
6. Power and fuel	0 0 9
7. Ordinary current repairs and maintenance of buildings, plant and machinery . .	0 1 8
8. General services, supervision and local office charges	Included in item No. 5.
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	0 1 4
10. Cost of packing cases	Included in item No. 1
TOTAL .	1 4 7

MESSRS. ADAMJEE HAJEE DAWOOD AND COMPANY, LIMITED

Evidence of Mr. M. A. BAWANEY recorded at Rangoon on Monday the 21st March, 1927.

Preliminary.

President.—Before proceeding with the evidence I should like to explain to you the scope of the Tariff Board's enquiry into the circumstances of the Match Industry and to place before you some of the more important points into which we have to enquire because, on reading some of the replies, from the applicants, I find that they have not fully grasped the lines on which the enquiry is to proceed.

We are opening our enquiry in Burma for the reason that there is some evidence that Burma has very rich forests from which large quantities of suitable wood may eventually be made available for the use of the Match Industry. This province has also another advantage in that Rangoon is a port connected by rivers with the forests and therefore has the advantage of being able to secure its wood by water, to obtain its imported raw materials by sea and of being favourably situated for the export of its finished products to other parts of India, or, it may be, to other parts of the world.

Now, as regards the scope of the enquiry, you must have seen the Resolution issued by the Government of India on the 2nd of October. We followed it with our own Communiqué, dated the 29th November, 1926, in which we explained to the applicants briefly what was required of them. The first point that we have to consider is whether this industry is one which has a good case for protection, that is to say, whether it fulfills the conditions laid down by the Fiscal Commission. The principal conditions are enumerated in paragraph 97 of the Fiscal Commission's Report. But there are other considerations by which we are also to be guided and which have been mentioned in the Communiqué as well as in our previous reports. If we are satisfied that those conditions are fulfilled, then we have to consider what measure of protection should be given and the form it should take, that is to say, whether it should be merely by the imposition of duties or the grant of bounties, or by means of both, or whether it should be in any other form. In order to determine that we have first of all to ascertain the price at which the foreign article competing against the domestic article—in this case matches—enters the country. Then we must ascertain the fair price at which the Indian manufacturer can afford to sell the article. In determining the fair selling price we have to ascertain what we call the works costs, that is to say, all costs incurred in the process of manufacture; then to that we have to add certain other charges, *e.g.*, depreciation, agents' commission and so on, and on top of that what we consider ought to be a reasonable return on the capital invested. When we have arrived at the fair selling price, if we find that this price is higher than the price at which the foreign commodity enters the country, then the difference between the two prices is what we consider the measure of protection necessary. The points I would like to impress upon you are that when we are dealing with the question of cost, you must give us all the information that we might reasonably require and that up to now we have always insisted that such information should be published. Of course, we do not insist upon publication merely for the sake of publication, but our proposals must be based on facts and they should be supported by arguments based on those facts. Our proposals then go up to the Government of India who have also to examine our proposals with reference to the facts. So, they also must know the facts. Then, these proposals cannot be made effective except by legislation. That means the proposals have to be examined by the legislature of the country. Obviously, the legislative bodies would like to know whether the recommendations are sound having regard to the facts on

which they are based. It is therefore to the advantage of the applicants to assist us in every possible way, and I do not think you can assist us better than by giving us all the facts and allowing us to publish them. Of course, if there is any secret process for instance, then perhaps you may be justified in claiming privilege. But I would strongly advise you that it will be to your advantage to allow us to publish all the facts. If you do not, we cannot reasonably make any recommendations and if we do make recommendations we cannot support them in a way which would be acceptable to the Government of India and the Legislature. That is as regards the question of protection. This enquiry will, however, extend much further than the mere question of protection because there are special circumstances to which I shall presently refer. Now there is some evidence that since these revenue duties on matches were increased, a certain number of factories have come into existence which have created more or less what we might call vested interests and even if we find that the match industry does not qualify for protection we have still to enquire into the extent of these vested interests and to see whether, apart from other considerations, the vested interests that have been since created are so strong as to justify the continuance of the duties which were imposed for revenue purposes. I don't think that this Board can take into account any vested interests which may have been created since the 2nd of October, 1926, when the resolution of the Government of India was published. If interests existing before that date are extended or if new interests are created, then the parties must take the risk because it is perfectly obvious that no new interests can be allowed to be pleaded as a reason for the continuance of the revenue duty at its present figure if they have been created since the issue of the resolution by the Government of India and I wish all parties interested in the manufacture of matches at present to understand that if they extend their interests in any way during the course of these proceedings, they will have to take the risk necessarily implied in such extension. As regards their investments prior to the 2nd October, 1926, we shall have to take them fully into account. Naturally I do not suggest that necessary investment of capital in order to make effective the concerns you have already brought into existence should not be undertaken but that any new large investment made merely for the purpose of being able to say afterwards "we have vested interests" in this industry is not permissible, and will not ordinarily be taken into account by the Board.

There is a further point which I should like to explain that is that this duty was imposed for revenue purposes. Now as you produce more and more matches in the country, obviously the revenue decreases. We have, therefore, to consider whether, if the Government contemplated the retention of this revenue, some means should not be devised by which without interfering with the legitimate expansion of the industry, it should be made available to the Government. Matches are articles of common use and the consumer by reason of the revenue duty has been paying a slightly increased price and it is for us to consider whether Government should not continue to levy this small tax on the consumer in this or any other form so that Government can secure to itself a reasonable amount of revenue from matches. If the manufacture of matches takes place on a large scale in this country, then the import revenue will diminish or may vanish. Therefore, we have to consider whether eventually some other form of taxation should not be devised. It may take the form of an excise duty on domestic production, or it may take some other form in order to enable Government to get a certain amount of revenue, and we should be very glad if applicants would tell us the best way of securing to the Government a certain amount of revenue if and when the revenue from the Customs diminishes or vanishes.

But there is one more serious aspect of the case to which I should like to refer. Nearly every representation of any importance that we have received has suggested to us that since the increase in these duties a foreign trust has been operating in India as well as in other parts of the world. I am expressing no opinion and I am referring only to an allegation which has been made. I may tell you that we express no opinion except when we publish our report.

Our opinions are expressed in the report alone and if there is any statement which sounds to you like an expression of an opinion, you must take it ordinarily as the opinion, if it is an opinion at all, of the individual member of the Board or that it is merely put in that form in order to elicit more information. You must not assume that it is the opinion in a final form of either the individual member or the Board. It has been alleged in this case that the object of this foreign organization, which is sometimes described as a Trust, is first of all to enter into competition against the Indian manufacturer by itself manufacturing within the Tariff wall and thus by suppressing rival Indian firms either by excessive price reduction or by absorption into the Trust, in the end to secure complete control of internal manufacture. The Trust is said to possess a very large amount of capital, to be very well organized and to have large resources so that provided the trust really was in existence and if it operated, it would ordinarily succeed in competing very effectively—succeed anyhow in keeping down the expansion of the purely Indian managed and Indian capitalized industry.

First of all, we have got to enquire whether that Trust exists and secondly if it does exist, if it operates in that way. If we are satisfied on both these points, then I think that it would be necessary for this Board to consider whether the existence of such a trust is to the ultimate advantage of this country; that is to say whether it would result in some direct or indirect benefit to the people as a whole. It may cheapen the manufacture of matches, it may give employment and it may give a thousand one other things. But we have to consider whether, having regard to all the circumstances of the case, it will be to the ultimate advantage of India that this Trust should be allowed to operate in this way. If we find that it would be to the advantage of this country, then it may be our duty to say so. If, on the other hand, we should find that it was not to the advantage of the country, then it would be necessary for us to suggest means by which the country could effectively combat the Trust. I want to make it perfectly clear that in examining this aspect of the case we do not propose to emphasize more than is necessary the aspect of foreign capital as such. That is to say, it will not be necessary for us to consider the question whether foreign capital is at all to be allowed to enter this country. That is a much wider question. It may be that we may have to go into that question to some extent but our attention will be mainly directed to this point whether foreign capital should be allowed to enter this country and eventually establish for itself a monopoly in such an important article of domestic use as matches. Some countries have legislated to prevent foreign capital from dominating an important domestic industry and thus creating a monopoly which might result eventually in raising the price of a common commodity. That aspect of the case is most important and I should expect all parties who have made the allegation of the existence of this Trust to give us as much evidence as they can on the various aspects to which I have referred. I have no doubt that the Trust itself will appear before us and give us all the information that is reasonably possible. If they do not, we shall have to act on such materials as we may have. If they do, we shall take into consideration every aspect of the case from their point of view but it is obvious that if neither you who have made this allegation give us the necessary amount of evidence, nor the Trust the necessary amount of counter evidence, our recommendations cannot be as satisfactory as they might otherwise be. I may tell you that this allegation has been made throughout India by manufacturers of matches. They have complained that the Trust does exist and that it is operating to their disadvantage. For that reason we propose to visit as many provinces as we conveniently can and collect as much evidence as possible on that point.

There is one more point to which I should like to refer. In this enquiry we have got to calculate as accurately as possible the nett loss of revenue to the Government. At present the duty is levied on imported matches. As more matches are manufactured in the country, the manufacturers of these matches would require a larger amount of chemicals which are also liable to taxation, so that though fewer matches enter the country, more chemicals do.

Moreover, Government will get a certain amount of income-tax from the operation of a larger number of companies engaged in the manufacture of matches. And I think it would be necessary for us for that purpose to find out exactly how much duty you would be paying on your requirements of chemicals, what income-tax you will be paying and in what other way Government revenue is benefited so that the gain can be set off against the loss on the Customs revenue on matches. I hope that you will be able to give us all the information we want.

The organisation and beginning of the company.

President.—Mr. Bawaney, you are the manager of Messrs. Adamjee Hajee Dawood & Co.'s Match Works?

Mr. Bawaney.—Yes.

President.—Where is Mr. Adamjee Hajee Dawood at present?

Mr. Bawaney.—In Calcutta.

President.—I may tell you, Mr. Bawaney, and it is of course for you to consider, that we ordinarily expect, whenever possible, the proprietor or the managing director of the applicant company to appear before us to give evidence.

Mr. Bawaney.—Mr. Adamjee Hajee Dawood is detained in Calcutta on very important business. It would of course have been better if he were present, but I hope I shall be able to give you all the information you require. We are quite prepared to give you all the assistance you require and I shall be prepared to place all our cards on the table.

President.—So long as you do not tell me that you cannot answer a question without consulting your principals we won't insist upon their appearance here.

Mr. Bawaney.—I do not think I shall have any occasion for that.

Dr. Matthai.—Are there any of your other directors in Rangoon?

Mr. Bawaney.—At present three are in Rangoon permanently. Mr. Adamjee himself is a permanent resident of Rangoon. There are three directors and one managing director who permanently reside in Rangoon.

Dr. Matthai.—Are you manager or managing director?

Mr. Bawaney.—I am one of the directors.

President.—You have only sent us answers to the first 43 questions; what about the answers to the remaining questions?

Mr. Bawaney.—We have to go into a great number of figures and we have not had time to get the figures ready yet, but we hope to have them ready by to-morrow.

President.—Have you got the necessary instructions from Mr. Adamjee?

Mr. Bawaney.—Yes. We can let you have the replies to the remaining questions most probably by to-morrow evening.

President.—The firm of Messrs. Adamjee Hajee Dawood, I take it, does other kinds of business besides the manufacture of matches?

Mr. Bawaney.—Yes.

President.—You do business on a large scale?

Mr. Bawaney.—Yes.

Dr. Matthai.—May I know what kind of business?

Mr. Bawaney.—Rice, gunny, hessians and matches.

Dr. Matthai.—You have branches in India, have you?

Mr. Bawaney.—Yes.

President.—I want to know why you started this factory in 1924; what was the reason?

Mr. Bawaney.—When we saw that Government had imposed a duty for revenue purposes of Re. 1-8-0 per gross, we thought it would be a very good

thing to start the match factory because though in the beginning this industry might suffer and not get the advantage of the extra duty, we thought we would be able to tide over the difficult times and put the industry on a firm footing.

President.—But for the increase in the duty would you have started the industry?

Mr. Bawaney.—When the duty was annas 12 we went into the figures and we thought it would not pay to start the industry then as we did not think with a duty of annas 12 we would be able to hold our own in the industry at that time.

Mr. Mathias.—Did you take into consideration the fact that Re. 1-8-0 was a revenue duty which might be removed at any time?

Mr. Bawaney.—We have an idea that when Government once impose a revenue duty it takes a long time for that to be withdrawn. There are other instances where Government imposed a revenue duty and it took a long time to remove it. If we had thought at that time that the duty would be removed suddenly in a year or two we would not have started the industry.

Mr. Mathias.—Are you aware that the duties are changed from time to time according to the requirements of Government revenue, and that each March there are changes in the duty, sometimes up, sometimes down?

Mr. Bawaney.—There are changes now and then but we did not think that the changes would be such as to affect our business seriously.

Mr. Mathias.—As you knew that the revenue duties were liable to change from time to time, you were prepared to take the risk?

Mr. Bawaney.—To a certain extent we did take the risk.

President.—The duty was raised in the budget of March 1922 I think to Re. 1-8-0. When did you first start your project?

Mr. Bawaney.—In the beginning of 1922 we consulted the expert.

President.—When did you actually order the machinery?

Mr. Bawaney.—About September 1922.

President.—Do you mean to say that you started to manufacture in 1924 February—in such a short time?

Mr. Bawaney.—Yes. It happened in this way. We placed an order for machinery and we got the finishing machine before we got the others and as soon as we had that ready we ordered the splint and veneers from Japan and started manufacturing. We had this advantage that we had been importing matches from Japan since 1914, we were doing very large business in Japanese matches.

Dr. Matthai.—Does that mean that all the matches produced in 1924 were made from imported splints and veneers?

Mr. Bawaney.—Up to October 1924 it was imported splint and veneer; then the splint and veneer machinery arrived and we set them up. As soon as they were ready for operation we stopped the importation of splints and veneers.

Dr. Matthai.—What about the wood? Did you import your wood at the beginning?

Mr. Bawaney.—Yes.

Dr Matthai.—Where did you import that from?

Mr. Bawaney.—Mainly from Japan and we purchased some here.

Dr. Matthai.—Then you went on importing up to 1926?

Mr. Bawaney.—January 1926.

President.—You say that the total capital invested is wholly Indian, but there is one point in connection with this. It has been alleged that even some of the factories which are said to be financed by Indian capital are really financed by some of the foreign firms in this way that they give them

machinery on credit or on the hire-purchase system. I want to know whether such practice exists?

Mr. Bawaney.—So far as my knowledge goes such practice does not exist.

President.—It has been said in some of the documents which have been published that it is a common thing, for instance for a Japanese manufacturer of machinery, to supply all the machines that he can supply, and then working in combination with the manufacturer of raw materials to supply all the raw materials and then again supply the veneers in the same way. In that way it is very largely foreign capital which is really running the industry behind Indian names.

Mr. Bawaney.—The only instance that has come to my knowledge is the case of the Assam Match Works in which Indians take part as directors but the Swedish Trust is supplying all the machinery and material and the supervision is also in their hands.

Mr. Mathias.—So far as you are aware, is the match machinery supplied to Indian manufacturers by foreign firms on the hire-purchase system to any great extent?

Mr. Bawaney.—I have not heard of it.

President.—What do they do precisely? If they don't give the machinery on hire-purchase system, then how do they realise the price of the machinery?

Mr. Bawaney.—We pay cash when we buy any machine.

President.—I am talking of the Assam Match Works.

Mr. Bawaney.—In the Assam Match Works Indians have been appointed as Directors and a certain number of shares has been offered for public subscription, but the Swedish people have kept the control in their own hands.

Mr. Mathias.—Could tell us when this Company was first floated?

Mr. Bawaney.—The prospectus was published on the 28th October, 1925.

President.—Can you allow us to retain the prospectus? We shall revert to this question when we come to the examination of the point about the Trust.

Mr. Bawaney.—Yes.

President.—Then you say you were carrying on this business since 1914.

Mr. Bawaney.—Yes, we were importing matches.

President.—You were importing them principally from Japan?

Mr. Bawaney.—At that time Burma was importing Japanese matches only except one brand which was imported from Sweden.

President.—I think that was the Elephant brand.

Mr. Bawaney.—Yes.

President.—Have you got your former records which would enable us to see at what prices you were importing Japanese matches since 1914?

Mr. Bawaney.—In 1914 the business was done under the name of A. S. Adamjee.

President.—What we want to know really is the pre-war price. During the war prices were very irregular. So the prices that matter to us are the pre-war prices for a couple of years before and since the imposition of the duty.

Mr. Bawaney.—I shall let you have the figures, if available.

President.—You say you are at present employing two Europeans both in the capacity of machinery experts. What nationality are these two Europeans?

Mr. Bawaney.—One is from Czecho-Slovakia and the other is a German.

Dr. Matthai.—Were they both employed in match factories before they came over here?

Mr. Bawaney.—The German had been in a match factory in India for four or five years.

Mr. Mathias.—In which match factory?

Mr. Bawaney.—He erected the match factory near Lahore. He was out here for five years and I think he was detained during the war. He can talk Hindustani very well and therefore he is very useful to us. The other man from Czecho-Slovakia cannot speak a word of Hindustani. He does not know much of English either.

President.—I just want you to tell me what are the principal functions of the German.

Mr. Bawaney.—Erection of the Simplex machines.

President.—Are they all Rollers?

Mr. Bawaney.—Yes.

Mr. Mathias.—Is that his only function?

Mr. Bawaney.—He supervises this work and also the drying drums.

Mr. Mathias.—When your erection is completed, his work will come to an end.

Mr. Bawaney.—He has gone now, but we are importing another man to replace him. We shall have to engage two experts.

President.—Has he worked in the firm of machinery makers?

Mr. Bawaney.—Yes.

President.—Therefore he understands your machinery better than any other man.

Mr. Bawaney.—Yes, Rollers' machinery.

Mr. Mathias.—You say he is leaving you. Do you propose to replace him by another German?

Mr. Bawaney.—He left two days ago and another man is starting in about a week's time.

Mr. Mathias.—Has he also the experience of these Rollers Machines?

Mr. Bawaney.—Yes.

President.—What does the man from Czecho-Slovakia do?

Mr. Bawaney.—He is looking after the splint, veneer and dipping machines and has the experience of these machines for over 20 years.

President.—The same machines.

Mr. Bawaney.—Yes. He is an expert as regards these machines and we have kept him to train up the other men.

Mr. Mathias.—Does the match machinery require a good deal of attention by an expert?

Mr. Bawaney.—At present it is necessary, because we cannot get workmen here, fitters and others who have experience of these machines. When our men get trained up, they will be able to operate the machinery themselves.

Mr. Mathias.—May I take it that if a match factory were started and if it had not experts on its staff with sufficient knowledge of the particular machinery which was employed, then that match factory would probably fail.

Mr. Bawaney.—We will have to employ an expert for some time to come. When the industry has established itself, we would be able to get men from other match factories. At that time it would not be necessary to employ experts, but at a time when there is no established industry in the country, it is necessary to employ experts.

Dr. Matthai.—Where did you purchase these chopping machines.

Mr. Bawaney.—From Japan.

Dr. Matthai.—Why did you get a man from Czecho-Slovakia to start it?

Mr. Bawaney.—He was recommended by Rollers as a man who had experience of the match machinery in Czecho-Slovakia and also in Canada and so we employed him.

Mr. Mathias.—You rely entirely on German machinery and you don't use the Swedish machinery.

Mr. Bawaney.—We had been offered the Swedish machinery, but we didn't buy that for the reason that we were told that the Swedish manufacturers were in the Trust. Consequently we went in for the German machinery. There are two German manufacturers—Baden Engineering Works and Rollers. These two were in combination with the Swedish Trust. After sometime there was some dispute between them and they separated. So we thought we would be on the safe side if we bought the German machinery.

Mr. Mathias.—Is the German machinery, in your opinion, as economical and satisfactory to work as the Swedish machinery?

Mr. Bawaney.—The Swedish manufacturers claim that their machines are superior to German machines, but, in my opinion, looking at the machines, I don't think there is much difference between the two. When these three firms separated, they made a division of the patent rights they had and there is not much difference between the two kinds of machinery.

President.—What about your own experience of match manufacture? Have you had any special training in the manufacture of matches?

Mr. Bawaney.—In 1914 I went to Japan on behalf of Mr. Jamal and made enquiries about the match industry there and tried to learn some secrets, but I didn't have any actual experience of the work. It would not have paid at that time to start the industry here. But since starting this manufacture here I have been going along with the expert and trying to acquire as much knowledge of the industry as I can.

President.—That is to say you acquired a general knowledge of the business rather than the technical knowledge of the industry.

Mr. Bawaney.—I have general experience of machinery, etc., because I have been in another kind of factory for 14 years.

President.—What factory?

Mr. Bawaney.—Groundnut oil mill, ginning mill, etc.

President.—Is that Jamal's?

Mr. Bawaney.—Yes. I was the Manager in Myengyam and Allanmyo Factories.

President.—What sort of a chemist have you got?

Mr. Bawaney.—He is a man from Assam. He has studied chemistry in America for more than three years.

President.—We should like him to be present when we examine you as regards the general process of manufacture.

Mr. Bawaney.—He will accompany me to-morrow.

Dr. Matthai.—Apart from looking after machinery and the chemical part of the work, is there any part of the work which requires technical direction?

Mr. Bawaney.—Yes, in the matter of selection of wood.

Dr. Matthai.—Who is in charge of that?

Mr. Bawaney.—The Czecho-Slovakian expert looks after that and two Burmans are being trained under him.

Dr. Matthai.—As regards the selection of wood, what precisely is his business? When different kinds of timber are experimented upon, is it his business to see which particular wood is suitable for match making?

Mr. Bawaney.—Yes.

Dr. Matthai.—Does it not require a knowledge of local forestry?

Mr. Bawaney.—If he has knowledge of the local forests, it would be more to our advantage.

Dr. Matthai.—At present, are you in close touch with the Forest Department?

Mr. Bawaney.—Yes.

Mr. Mathias.—Do you employ any one in the forests to go round and locate the trees there?

Mr. Bawaney.—We have our Forest Manager in the forests. He has many years' experience of forests in Burma.

Mr. Mathias.—Had he been in the Forest Department?

Mr. Bawaney.—Yes.

Mr. Mathias.—I take it that he is constantly touring the forests and looking for suitable kinds of wood.

Mr. Bawaney.—Yes. He also sends us samples of new varieties for us to try.

Mr. Mathias.—Is he responsible to you for working the concession that you have got from the Forest Department?

Mr. Bawaney.—Yes.

The unit of manufacture.

President.—I want to be quite clear of what you mean by a gross of boxes so that we may be sure that we are talking about the same thing. In answer to Question No. 5, you say "The full capacity of our factory is for the manufacture of 6,000 gross of boxes." I take it that you have used the word "gross" in the ordinary sense, meaning twelve dozen.

Mr. Bawaney.—Yes.

President.—Now as regards the boxes, in calculating a gross what boxes do you mean because there are three different sizes? If you take the middle size, it contains only 55 splints. If you make 6,000 gross of boxes of No. 1 size, you will be making nearly twice the quantity as you would be making if the boxes were of the other size?

Mr. Bawaney.—Our full capacity will be 6,000 gross of boxes of full size.

President.—In that case, you may perhaps have 8,000 boxes of the smaller size.

Mr. Bawaney.—We cannot have 8,000 because the capacity of the machinery that makes the boxes as apart from splints is only 6,000. If we make boxes of the smaller size, we may have some more splints only left because our capacity for making boxes is limited.

President.—So far as your manufacture is concerned, which forms the largest percentage of these three sizes?

Mr. Bawaney.—The full size forms the biggest percentage.

President.—What will be its percentage?

Mr. Bawaney.—55 per cent. of the whole lot.

President.—And ½ size?

Mr. Bawaney.—15 per cent. the rest being half size.

President.—So that the full size is the more popular.

Mr. Bawaney.—Yes, in Burma, whereas half sizes are more popular in India and we export half sizes to India. In Burma we can sell ½ in big cities but upcountry they generally like full sizes.

Mr. Mathias.—Can you say on an average for how many days in a year you work?

Mr. Bawaney.—300 days.

Dr. Matthai.—When you say that you can produce 6,000 gross per day, what you really mean is that you can produce 6,000 gross of boxes of full size. When you say that matches are selling at a particular price, I take it that what you mean is that that is the price of full size matches.

Mr. Bawaney.—When I speak of the price, it is the average price, but if you want the price for full size, I can let you have it.

Dr. Matthai.—Of these three different kinds of sizes, that you make, which is the one that comes most in competition with the imported matches?

Mr. Bawaney.—There is equal competition in all the three sizes.

Mr. Mathias.—Are the imported matches all full size matches?

Mr. Bawaney.—In India, half sizes are more popular. So, in India the imports are half size and full size matches, whereas in Burma both full size and ⅝ size matches are imported.

President.—Do the foreign boxes contain about the same number of match sticks or more?

Mr. Bawaney.—I have not examined that.

President.—The Japanese matches sometimes contain as many as 92 splints.

Mr. Bawaney.—There is no standard size. Some of the boxes may contain more and some less.

President.—If an ordinary purchaser finds that there are 80 match sticks in a full size match box, would he consider that a full quantity?

Mr. Bawaney.—Yes.

President.—He would not object to that?

Mr. Bawaney.—No. If the box is full, no one would object.

President.—I have been told that the purchaser has become wary and that he counts the sticks before buying a particular brand.

Mr. Bawaney.—I have not heard about that. I have not seen any one counting the splints.

President.—He may take it home and count it there and if he finds the number of splints less, he may refuse to buy the same brand again.

Mr. Bawaney.—We have not heard of any such objection.

President.—I don't say in your case. I say that we have heard of that.

Mr. Bawaney.—I have not heard about it.

Mr. Mathias.—You have not considered the desirability of printing on the label that the box contains so many splints.

Mr. Bawaney.—We have not noticed any demand on the part of the public for any such thing and so we have not considered that necessary.

President.—The number of splints varies very considerably in Indian boxes of the same size.

Mr. Bawaney.—It depends upon the thickness of the splints.

President.—In the full size, the number goes up to as many as 120.

Mr. Bawaney.—Yes, if the splints are thin and if the heads are not thick.

Dr. Matthai.—Would a full size match be twice as expensive as the half size?

Mr. Bawaney.—No, not at all.

Dr. Matthai.—It is only just a small difference.

Mr. Bawaney.—Only a slight difference.

Output.

President.—I do not wish to go into the question of your output in 1924-25 because you started in 1924. In 1925, you were still using imported wood. In 1926, you started using your own wood, and you have given your output as 6,000 gross of boxes per day. For a year of 300 working days, your output should be 18 lakhs gross of boxes.

Mr. Bawaney.—Yes.

President.—You only reached an output of 11 lakhs in 1926. How is it that you have not reached your full output yet?

Mr. Bawaney.—Our workmen have not yet become fully efficient, yet with the same machinery in 1925 our output was only 8,58,000 and in 1926 we came to 11 lakhs.

President.—When do you think you would be able to reach your maximum output of 18 lakhs?

Mr. Bawaney.—At present we have reached 5,000 a day according to the February output and we think it will still take some time to reach the maximum.

President.—If it is 5,000 then it is within a short percentage of the maximum production.

Mr. Mathias.—Was your production limited in any way by the demand in 1925-26?

Mr. Bawaney.—No. Our demand is larger than what we can produce.

President.—Would it be possible for you to work two shifts?

Mr. Bawaney.—If we want to we can.

President.—Would your work at night be as satisfactory as in the day?

Mr. Bawaney.—I do not think matches manufactured at night would be as satisfactory as matches manufactured in the day.

Mr. Mathias.—Would the system of working two shifts be prevented by factory laws, women being engaged at night and so on?

Mr. Bawaney.—We can have boys or men working in place of women if we have two shifts.

President.—I notice that in your factory you do a considerable amount of work by hand as well as by machinery. There are other factories in India as well as in Japan, I understand, where practically after the splint stage everything can be done by hand?

Mr. Bawaney.—That is true, only the splint dipping is done by machinery.

President.—But splint dipping is also done by hand?

Mr. Bawaney.—That will be by machinery, but the machines will be worked by hand; they are manual power machines.

President.—You say you cannot work at night.

Mr. Bawaney.—We can, but the quality will deteriorate.

President.—You can do what other people are doing. They make the matches, then they distribute the veneers to be made into boxes and put the labels. What is really done is the splint and it is dipped and then distributed to outside people to be made up.

Mr. Bawaney.—Yes in Japan they do that.

President.—The point I would like to make is this, that instead of two shifts and instead of employing two sets of people in the factory you can work only one shift and hand the splints over to outside people and thus increase your output.

Mr. Bawaney.—There are certain disadvantages in having the work done outside the factory; outside work cannot be so well supervised and the work would not be quite so satisfactory, and we cannot keep account of the veneers issued.

President.—Why not?

Mr. Bawaney.—When done by hand, these people dry the boxes in the sun and the colour of the labels as well as papers fades, the gum dries quickly and the label comes off. We prefer everything being done by machine as there is a better get up.

President.—This is done by contract system in Rangoon by other factories, is it not?

Mr. Bawaney.—Yes, the Rangoon Match Works do it. But we have the necessary machinery and in comparison to the work done in our factory we do not consider hand work as satisfactory.

Dr. Matthai.—A good deal of match boxes are made in their own houses by outside people, are they not?

Mr. Bawaney.—Yes.

Dr. Matthai.—You have never tried that system?

Mr. Bawaney.—We did for a short time.

Dr. Matthai.—And you did not find it satisfactory?

Mr. Bawaney.—We have the necessary machinery and in comparison to the work done in our works we found the work done by hand not quite so satisfactory.

Mr. Mathias.—But the small pieces of veneers which cannot be put on the machine are done by hand, are they not?

Mr. Bawaney.—Yes, if there are pieces of veneers which we cannot put into the machine. But we have got small hand machines for cutting veneers of small pieces so that they may not be wasted.

President.—In your works you do practically everything by machinery except that you do a certain amount of hand filling, is that right?

Mr. Bawaney.—Yes, hand filling, gross packing and putting them into cases—these we do by manual labour.

President.—These processes are all subsequent to the process of manufacture I am talking of the process of manufacture. Removing the bark for instance?

Mr. Bawaney.—Peeling of the bark is done by hand but cutting to pieces is done by machinery.

President.—Then you get on to the splint stage.

Mr. Bawaney.—The actual drying of the splints is done by machinery.

President.—We have seen a factory where drying is done in the sun.

Mr. Bawaney.—That is the Japanese method. There is also mechanical drying.

President.—Then the dipping can be done by hand?

Mr. Bawaney.—Yes. They are filled in the hand frame and then dipped by hand.

President.—Having done that you dry them by machine. Can the drying be done in the sun?

Mr. Bawaney.—I think the Rangoon Match Works do it.

President.—Having got the heads on it is possible after that to do everything by hand, is it not?

Mr. Bawaney.—Yes.

President.—You cut the veneer into proper sizes by machine, then the labelling, pasting, painting the sides all these processes can be done by hand and are done by hand in some factories, are they not?

Mr. Bawaney.—It can be done and some do it.

President.—What it comes to is this, that a match factory may consist really of a splint cutting machine and a veneer cutting machine chiefly and it may be called a factory?

Mr. Bawaney.—Yes. You can have even two small hand chopping machines made of wood and can do everything required, except that the peeling machine will have to be a power machine.

President.—You will also require the veneer machine?

Mr. Bawaney.—Yes.

President.—You will require the peeling machine, the splint cutting machine and the veneer machine and the rest can be done by hand?

Mr. Bawaney.—Yes.

Dr. Matthai.—Why is it that you have never tried to do the debarking by machine? I understand that this is done in European factories by machine.

Mr. Bawaney.—It is only when the bark is very thin and sticky that you require a machine to do it. In the case of the Burma wood it is cheaper to do it by hand; we can remove the bark by a crow bar. We have got the machine but we have found it more economical to remove the bark by hand and we have not used the machine. Except in the case of pine we can remove the bark by hand.

Situation of the factory.

President.—In answer to question 8 you say "In our opinion all the factors mentioned in (*a*), (*b*), (*c*) and (*d*) under this question are equally important." It is a non-commital reply! There are four things—raw materials, fuel supply, market and labour. The most important thing from the point of view of the industry is probably raw materials. One of the conditions laid down by the Fiscal Commission is that there must be an abundant supply of the principal raw material. If you have not got that it is doubtful whether you would be able to establish a case at all.

Mr. Bawaney.—In our case we have got all the four things here.

President.—I do not dispute that, but would you not regard wood as the principal raw material and therefore the most important factor?

Mr. Bawaney.—Yes.

President.—I want to know whether there are any climatic difficulties in the manufacture of matches. In Burma you have only got two seasons, dry and wet.

Mr. Bawaney.—We have not experienced any difficulty on account of the wet season. We have manufactured matches in the wet season.

President.—One of the defects in Indian matches is that in the monsoon the heads come off.

Mr. Bawaney.—It is not on account of the wet season, but on account of the defects in the composition of the chemicals employed.

President.—The dampness would affect the matches. The best match in India some times would not strike at all.

Mr. Bawaney.—The defect is in the composition. You should be careful to see that the chemicals employed and the paste are not easily affected by damp.

President.—You don't consider that climatic conditions matter in the production of good matches.

Mr. Bawaney.—No.

Mr. Mathias.—Do you have to lay in any stock of wood during the rains or can you extract wood then?

Mr. Bawaney.—We extract more wood during the rains.

Mr. Mathias.—In regard to the quality of wood, is it correct to assume that if the wood is kept in water for any considerable time, it is useless for your purpose.

Mr. Bawaney.—Not if it is kept under water.

Mr. Mathias.—How long could it be kept in water and still be useful?

Mr. Bawaney.—Even for one year if it was kept under water, it would be useful for our purpose.

Dr. Matthai.—On the question of market you say the location of your factory in Rangoon is advantageous. Of the 11 lakhs of matches that you made in 1926, what proportion did you export to India?

Mr. Bawaney.—25 per cent.

Dr. Matthai.—And the rest did you sell in Upper Burma?

Mr. Bawaney.—25 per cent. was exported to India, about 25 per cent was sold in Lower Burma and about 50 per cent. in Upper Burma.

Dr. Matthai.—As far as the market in Upper Burma is concerned, a place like Mandalay for the location of the factory would be more advantageous than Rangoon.

Mr. Bawaney.—If our factory caters only for Upper Burma, it would be more advantageous to have the factory in Mandalay, because there would be a saving in freight if that is the only criterion. But if it is to have an export business too, it is more advantageous to have the factory at Rangoon.

Dr. Matthai.—As things stand at present, 50 per cent. of your sales are in Upper Burma.

Mr. Bawaney.—That was in 1926. Since 1926 we have been exporting large quantities to India. Our output has increased and our export to India has also increased.

Mr. Mathias.—As regards the fuel supply, we shall probably discuss the question at greater length later. Do you attach any great importance to the fuel supply, because I understand most of the factories are able to supply their fuel by waste wood.

Mr. Bawaney.—So far as we are concerned, we don't attach much importance to fuel. We are able to meet our requirements from the spare waste wood.

President.—As far as I can see the establishment of a factory in Mandalay or Moulmein or any other place would have no particular advantage over a factory established in Rangoon so far as Burma itself is concerned or India is concerned, is that so?

Mr. Bawaney.—No.

President.—Except perhaps as regards the market in the immediate vicinity.

Mr. Bawaney.—That is so, but the disadvantage would be that we would have to take imported raw materials from Rangoon.

President.—As regards the more distant markets, they would not have any very great advantage perhaps because they would have to pay a higher freight so that in your opinion it would be more advisable if more factories were to be started at all in Burma, they should be started only in Rangoon rather than in any other place?

Mr. Bawaney.—Yes, if they want to do it on a large scale.

President.—You would recommend that it should only be done in Rangoon.

Mr. Bawaney.—Yes.

Dr. Matthai.—Now to judge the relative importance of the various conditions, am I right in thinking that of the three factors, labour, cost of the wood and the cost of other materials, the biggest item is the cost of labour; the next biggest item is wood and the third is the other materials?

Mr. Bawaney.—Yes.

Mr. Mathias.—Including all the other materials except wood.

President.—Supposing you were to start another factory, where would you start?

Mr. Bawaney.—In Rangoon only.

Quality of Indian made matches.

President.—We put you three different questions in question No. 9. The first was as regards the difference in appearance and quality generally.

Mr. Bawaney.—Yes.

President.—As regards those points you say that the Indian matches are perhaps inferior to imported matches. Do you mean that they are inferior both to Swedish and Japanese matches or to Swedish matches alone?

Mr. Bawaney.—They are inferior to Swedish matches. If they are inferior to Japanese matches, they are only inferior to matches made out of aspen wood. On the contrary the Indian matches are superior to dark wood Japanese matches.

Mr. Mathias.—Do you consider Sawbya matches are inferior in colour to that of imported aspen matches?

Mr. Bawaney.—These matches are only inferior to Swedish matches in appearance.

President.—I have compared your *sawbya* matches with the best Swedish matches. It is only with regard to the superior Swedish matches, they appear inferior as regards colour.

Mr. Bawaney.—The finish is better.

President.—For practical purposes really speaking there is not very much difference. So far as lighting capacity goes, is there any real difference?

Mr. Bawaney.—There is no difference in the practical use of the thing.

Dr. Matthai.—Is the *sawbya* match more brittle?

Mr. Bawaney.—No.

President.—Then you say another difference may be in respect of the composition of chemicals, but that would be really due to lack of experience.

Mr. Bawaney.—Quite.

President.—There is no natural defect there.

Mr. Bawaney.—No.

President.—That does not mean any natural disadvantage?

Mr. Bawaney.—No.

Dr. Matthai.—As regards chemicals, you get your chemicals from abroad. The fact that Indian matches are inferior in respect of chemicals is due to the fact that you use different proportions.

Mr. Bawaney.—Yes. We are not yet able to fathom the secret of proper composition.

Dr. Matthai.—Is the proportion in which the chemicals are mixed a trade secret?

Mr. Bawaney.—Yes.

Dr. Matthai.—You make your own formulas.

Mr. Bawaney.—There are chemical elements of water in different places. The water of different places affect the chemicals differently. One recipe which may be satisfactory to one place will not be applicable to another place.

President.—Are you getting over the difficulty? Will you be able to get the proper formula in a little more time.

Mr. Bawaney.—Yes.

President.—The next point is as regards the prejudice. What we had in mind was that in this country a locally made article is generally supposed to be inferior to the imported article, but that prejudice may be carried too far. What we wish really to know is. Is it a real prejudice based on the inferiority of the quality of the matches or was it merely because it was a locally made article?

Mr. Bawaney.—The majority of the people have prejudice against Indian matches because in the beginning the Indian matches were bad. Now that prejudice is being gradually removed. Still, there are some people who think that only the high priced matches can be good and they do not want to purchase the locally made matches.

President.—Is it your point that at the beginning there was some justification for this prejudice on the part of the consumer because the matches were bad?

Mr. Bawaney.—Yes.

President.—Now that the quality has improved, there is not the same justification for the prejudice to exist?

Mr. Bawaney.—That is the thing.

Dr. Matthai.—If your splints can be made as white in colour as the imported matches and if the quality of your chemical composition is quite as good, then there is nothing to prevent you from getting as good a price as the imported article.

Mr. Bawaney.—Not just now but when the prejudice is removed, when people come to know that Indian matches are as good as the imported matches, then we can realise the same price.

President.—To-day the prejudice does exist to some extent.

Mr. Bawaney.—Yes, and it is not a prejudice that can be removed at once.

President.—What it comes to is this that a consumer who has this prejudice would pay four annas more for a dozen boxes of the foreign make than he would pay for the Indian article.

Mr. Bawaney.—Yes.

President.—So long as that prejudice does exist, you think that the Indian manufacturer will have to sell his matches at a lower price.

Mr. Bawaney.—Certainly?

***President.*—Then, you have not answered question 9 (c). I want to know how much cheaper you would have to sell your matches to a consumer who is using foreign matches to-day to induce him to buy yours?**

Mr. Bawaney.—About one rupee per gross, for the full size match. We shall have to sell our matches by one rupee less than foreign matches.

President.—That is at how much per gross?

Mr. Bawaney.—In Burma the difference is about one rupee.

Dr. Matthai.—Take the Swedish match. What is the price of that in Burma?

Mr. Bawaney.—Rs. 132 per 50 gross full size.

Dr. Matthai.—What would be the price of your matches of the same size?

Mr. Bawaney.—About Rs. 90. The difference is about Rs. 42 for 50 gross.

President.—The Swedish manufacturer then is in luck's way in Burma.

Mr. Bawaney.—Yes. But in India their price is Rs. 2-10-0 per gross. There we are selling at Rs. 1-8-0 per gross, the difference being about 12 annas.

President.—The difference is about fourteen annas if you take India and Burma together.

Mr. Bawaney.—Yes.

President.—They cannot sell matches cheaper in Bombay. They must sell their matches at more or less the same price.

Mr. Bawaney.—They sell their matches for the price they can realise in the market. They don't work on the basis of costs. They sell at whatever price they can realise.

President.—It comes to this that they will get as much out of this prejudice as they can in any market.

Mr. Bawaney.—Yes.

Mr. Mathias.—Can you tell me what your present price is?

Mr. Bawaney.—About Re. 1-13-0 per gross for full size in Burma.

Mr. Mathias.—What is the highest price you have ever been able to get so far?

Mr. Bawaney.—Rs. 2-8-0 per gross.

Mr. Mathias.—I suggest to you that your reduction in price from Rs. 2-8-0 to Re. 1-13-0 is due not so much to prejudice against Indian matches as to the competition between Indian match producing firms.

Mr. Bawaney.—When we got Rs. 2-8-0 per gross, Swedish matches were not in the market. Then, only one brand of theirs was on the market. At that time our own costs were very high.

Mr. Mathias.—The question of cost does not come in here. Every match factory sells its matches at the maximum price it can get. You got Rs. 2-8-0 two years ago. At that time Sweden got only Rs. 2-9-0. The money value of the prejudice was about 1 to 4 annas.

Mr. Bawaney.—At that time the Japanese prices were very high and there was a large difference between their price and our price. Their price was Rs. 3-0-0 per gross.

Mr. Mathias.—What was the year when you were selling at Rs. 2-8-0?

Mr. Bawaney.—1924. At that time we imported Japanese splints, boxes, labels, everything and we did the dipping only here.

Mr. Mathias.—The value of the prejudice so far as the striking property is concerned amounts to very little.

Mr. Bawaney.—At that time, people did not know that the striking property of the Indian made matches was not so very good.

President.—They mistook them for the Japanese made matches.

Mr. Bawaney.—Yes.

Dr. Matthai.—Can you tell me from your experience as far as the Burma market is concerned whether your price is affected to any extent by competition from other Indian factories in Burma?

President.—Is it the case that internal competition compels you to reduce the price?

Mr. Bawaney.—Not in Burma.

President.—In Burma it may not be so, but in India there is to be a factory which is said to be controlled by a Trust. That Trust competes against you by manufacturing matches in India. They reduce the price of Indian matches and therefore you have also to reduce yours.

Mr. Bawaney.—Yes.

President.—As regards imported matches, they still sell at a higher level because of this prejudice?

Mr. Bawaney.—Yes, because people are under the impression that Swedish matches must be better.

President.—Take this concrete case. Swedish matches were formerly selling at Rs. 2-12-0. Now the Swedish Company have started manufacturing matches here. They sell locally made matches at Re. 1-10-0 per gross. So, you have also to reduce your price to Re. 1-10-0, though the foreign matches are still selling at Rs. 2-10-0. The difference between your price and the Swedish price is still one rupee and that is due to the prejudice.

Mr. Bawaney.—Quite so.

Mr. Mathias.—There is another part of the question, No. 8 (c). What difference in the price between the imported and Indian matches would you consider reasonable having regard to the quality? That is to say, if the purchaser was entirely unprejudiced and looked to the quality only, what would be the difference?

Mr. Bawaney.—At the most 4 to 6 annas.

Dr. Matthai.—You say in answer to question 9 that there are certain markets where preference is actually given to Indian matches. What markets are those?

Mr. Bawaney.—In the Madras Presidency we have found that consumers have realized that there is not much difference in quality and so preference is given to Indian matches which are cheaper.

Dr. Matthai.—Preference is given on account of cheapness of the matches when the quality is considered to be the same and the prejudice is removed?

Mr. Mathias.—They would not be preferred if they were sold at the same price?

Mr. Bawaney.—No.

President.—As regards coloured matches, have you tried them here to disguise the colour of the wood?

Mr. Bawaney.—There are not many buyers of coloured matches.

President.—There is some prejudice against coloured matches so that it is not worth your while manufacturing them Is that what you mean?

Mr. Bawaney.—They look to the country of manufacture and when they find that they are of Indian manufacture on account of the prejudice they prefer the foreign article.

Characteristics of suitable wood.

President.—I want to know generally what constitutes good quality of wood for the purpose of manufacturing matches? What are the special properties?

Mr. Bawaney.—It must be soft, the grain should be fine so that there may be no difficulty in making splints otherwise if you strike the match it would break, that is to say it should have straight fibres so that when cutting into splints it can be cut nicely and the polish would be better. Then again it should not crack and should not be resinous and when drying it should not lose its straight shape and get curved. The colour should be white. There are many kinds of wood which are white but do not preserve a straight shape when drying.

President.—Are these the principal properties of good match wood?

Mr. Bawaney.—Yes. There is another thing. The wood should not be such as would attract damp. There are some kinds of wood in which the sap is sweetish and draws moisture during the rainy season and the wood becomes damp.

President.—Most of the conditions are more or less what we may call conventional. If you can prove that matches made from dark coloured wood which are not well polished are just as useful and strong and burn as well as the other ones, in course of time they may become as popular as the other?

Mr. Bawaney.—That is so; the prejudice against colour should disappear very soon because matches are not meant for ornaments but are burnt and thrown away.

Dr. Matthai.—Can you bleach coloured wood?

Mr. Bawaney.- Yes. In Japan they do. We have also tried it ourselves by treating them in sulphur fumes but it is a troublesome job, and we think the prejudice is gradually dying down against coloured wood and that people are getting accustomed to it and the easiest way for us would be to accustom the people to dark wood rather than bleach them.

President.—There is one rather important point. The wood must be such as to have practically no industrial value for other purposes. If it is wood required for other things it would be expensive.

Mr. Bawaney.—That is so, in fact the Forest Department classify the match wood as jungle weed. Before we began to use this wood the Forest Department used to spend money from their own pocket to cut these trees in order that more valuable trees would get better nourishment.

President.—Is it generally correct to say that as far as your knowledge goes all this wood which you have found suitable for matches has really no market value for industrial purposes?

Mr. Bawaney.—That is so.

President.—Do these trees ordinarily grow naturally?

Mr. Bawaney.—Yes; the trees we are using have not been planted, they are of natural growth.

Size of log required.

President.—What is the smallest girth of log that you can conveniently use for splints?

Mr. Bawaney.—With the German machinery that we have the smallest girth we can use is 3 feet.

President.—What is the biggest girth that you can use?

Mr. Bawaney.—We have machines with which we can use up to 7½ feet girth, but we understand that in Port Blair there are virgin forests where

wood up to 12 feet girth is available, so we ordered machinery for using up to 12 feet girth. They have arrived but have not been set up yet.

President.—Are there many sorts of wood in which the girth is as much as 12 feet?

Mr. Bawaney.—Yes.

President.—You say you can use as small a girth as 3 feet, but I notice that in your concessions the smallest girth is 5 feet?

Mr. Bawaney.—Quite so. When we were discussing this matter with Mr. Hewett, the Forest Officer, we decided to have 5′ as the minimum girth. When we go back to the first compartment after 15 years, we would be able to use the other smaller girth trees. They would be ready for cutting by the time when we go back to the first compartment.

Mr. Mathias.—The limitation has been placed by you and not by the Forest Department.

Mr. Bawaney.—We are getting wood from other places also. We say that there would be no difficulty if we agreed to the 5′ girth. We found that 5′ girth is more economical and we get a better outturn. Mr. Hewett told us that he would agree to a smaller girth if we wanted it. In the summer when we had occasion to cut smaller girth trees we got special permission from the Forest Department.

Dr. Matthai.—Why is it more economical to use a girth of 5′?

Mr. Bawaney.—For one thing there is less wastage from the 5′ girth log and there is less handling which saves time and labour. We get a better output. If we use 3′ logs, we have to do twice as much work.

Dr. Matthai.—That is to say it saves waste of wood and waste of time. Both those considerations apply to the maximum and minimum girth. Supposing the log was 8″ in diameter smaller than 1′ and you try to work your machine on that, there would be some waste of wood and waste of time in handling.

Mr. Bawaney.—From each log the central portion or the heart about a diameter of 3½″—would have to be discarded and so proportionately there would be a very big wastage in 10″ diameter logs than in 5′ logs.

Mr. Mathias.—When I went round the factory I noticed that in some of the bigger logs, the central portion or the heart as it is called which is not suitable for producing veneers is rather large. Is the central portion or the heart larger in the case of big logs than it is in small logs?

Mr. Bawaney.—That depends more on the soil and climate and not on the size of the log. If the tree has been growing on boggy land, the heart wood would be larger than if the tree had grown on drier soil.

Dr. Matthai.—Whatever may be the kind of tree, supposing you are using sawbya, if the sawbya tree grows in this kind of soil, you will find that there is a larger amount of heart wood than if sawbya grows in a more favourable soil.

Mr. Bawaney.—We are at present using sawbya from Burma as well as from Andamans. In the case of Burma wood we have to discard only about 3½″, but in about 30 per cent. of the logs we get from Andamans, we have to discard a much larger proportion.

Dr. Matthai.—Actually your peeling machine can work it down to a diameter of 3½″, but there are some kinds of wood on which you would not be able to do that.

Mr. Bawaney.—It can work up to 3½″, but if the wood is soft and if the veneer is not suitable for our purpose, we have to stop it.

Extraction, transport and storage of logs.

President.—In order to get good results I take it that the log has to be fairly green.

Mr. Bawaney.—Yes.

President.—That is to say how long after extracting, can you reasonably use it? I am talking generally of Burma wood.

Mr. Bawaney.—On an average we can allow the logs to remain for about three months.

President.—In the forests?

Mr. Bawaney.—From the time it is felled and up to the time it is put on the peeling machine.

President.—In the interval you have to keep it under water?

Mr. Bawaney.—We have facilities for keeping them in water. It would not matter even if we don't keep the logs in water for about three months after felling.

President.—The reason why I am asking you is an important one. Supposing we came to the conclusion that no foreign wood ought to be used, then the question will arise—can Burma wood be used in Bombay?

Mr. Bawaney.—Yes.

President.—According to you it must be used within three months.

Mr. Bawaney.—Yes.

President.—From the forest to Bombay it may take a much longer time.

Mr. Bawaney.—What I mean is that it must be used in three months if it is left dry, but if after cutting it in the forest, it is brought by water to Rangoon, it has to remain in a dry place for only one month on the steamers, so it would not be affected. At present Burma wood is being exported to Calcutta.

President.—Take the dry season when you cannot float the logs at all. In that case you have to bring the logs by lorry or rail until you get enough water in the creeks. It may be that you cannot get any cargo steamer for six weeks.

Mr. Bawaney.—If there are forests where there are no facilities for floating the log during the dry season, these forests can be worked for export business for six months only during the monsoon.

President.—Take your own forests. It is only 60 miles by road and 120 miles by water. Can you float the logs all the year round from your forests?

Mr. Bawaney.—Provided we make a forest road for about 30 miles.

President.—That means more expense.

Mr. Bawaney.—According to our calculation the additional cost would be about Rs. 6 to Rs. 8 per ton, if we bring the log by bullock cart to the banks of the river. There are many forests in Burma from which we are purchasing even now during the dry season and we can get logs from them.

President.—How do you get them now?

Mr. Bawaney.—By rail.

President.—How long can you keep this wood under water before it perishes or before it becomes less serviceable?

Mr. Bawaney.—If it is kept under water even for one year, it would be quite useful.

Dr. Matthai.—Does that apply to all kinds of wood?

Mr. Bawaney.—Yes, to all kinds of wood that we have been using up till now.

President.—Are not they liable to be eaten by insects?

Mr. Bawaney.—If the log be completely under water, the insects won't attack the logs, but if the top of some portion of the log be exposed to the air, then they would attack the exposed portion of the logs after 6 months.

President.—Would it be easy to keep the logs, which are supposed to float, under water?

Mr. Bawaney.—If you make a tank, you can put all the logs. The top ones would press down the bottom ones. We do like that. Our tank would

accommodate 500 logs floating. Then after that when we put more logs, it keeps the logs under water.

Mr. Mathias.—Have you had any cases in which wood otherwise serviceable for match making purposes has become unserviceable for match-making during transport?

Mr. Bawaney.—Yes.

Mr. Mathias.—What is the percentage of your wood that has become so unserviceable?

Mr. Bawaney.—Formerly we had to suffer because sometimes the logs would be delayed in the forests on account of the removal passes not being granted by the rangers. The rangers would be busy elsewhere and they could not come to our lot and would not be able to measure the logs and give the removal passes. These logs would sometimes be delayed near the railways. Sometimes wagons would not be available and sometimes there would not be cranes to lift the logs on to the wagons. Thus the logs would occasionally be delayed for about 10 months. Now all these difficulties have disappeared.

Mr. Maithias.—When you purchase from contractors, do you find a large percentage of logs becoming useless?

Mr. Bawaney.—Formerly our contractors did not understand exactly what kind of logs was required by us. They were sending cracked and unsuitable wood for our purpose. But now they also understand quite well what the exact sort of thing should be sent to us and we have not now to reject even a single log.

Mr. Mathias.—Take the case cited by the President just now. Supposing some contractors undertook to export wood to a match factory in Bombay, would there be any difficulty in arranging with the contractors for guaranteeing that the quality of the wood would be suitable for match-making.

Mr. Bawaney.—At present they are petty contractors. They are not in a position to guarantee the logs up to Bombay. They can supply only here in small quantities. I do not consider it impossible to have arrangements made. If a really good demand springs up, there will be big contractors in the field who will undertake to do this business. There is also another way to overcome the difficulty of the wood drying up. After the log is cut, if some kind of composition is applied at both the ends, then the log would be in good condition for six months during which it can be used for match-making purposes. We imported some Aspen wood from Europe with the ends painted up and this wood was lying for 9 months in the sun and still we were able to use it. When the ends are closed up, the wood does not get dry. When we had occasion to bring some logs of 3 ft. girth to which I had already referred, we also treated the ends with glue and other things. By that way, we did not get complete protection but still we got some kind of protection.

Mr. Mathias.—You were saying just now that if a big demand sprang up in Bombay, no doubt a contractor would be forthcoming to supply the wood. You have some considerable experience. Could you give us some idea as to what would constitute a good demand? Would a demand for 10,000 tons annually be a good demand?

Mr. Bawaney.—I would consider that a good demand.

Dr. Matthai.—But these contractors that you have been speaking of deal in all kinds of wood, don't they?

Mr. Bawaney.—There are some contractors who deal in both soft and hard wood. There are some who deal only in soft wood. Government call for tenders and they submit their tender and if they secure the forest, they work it.

Dr. Matthai.—The contractors from whom you are purchasing part of your supplies, do they deal only in soft wood?

Mr. Bawaney.—Three out of our four contractors are dealing only in soft wood.

President.—The point is that those people who deal in hard wood are really big contractors.

Mr. Bawaney.—Yes, but there is not a big demand for soft wood. Consequently those who care for the soft wood are the small contractors. If, however, a big demand springs up, big contractors would come and take up this business.

President.—There is a great deal of misapprehension about the demand. Even if India manufactured all the matches it required, the demand in terms of forest language would not be very great. The demand may come to 100,000 tons. That would not be considered a big demand by the Forest Departments of all the provinces. One hundred thousand tons of soft wood would be only a small quantity.

Mr. Bawaney.—It may be a small quantity in terms of the Forest Department, in terms of the growth of soft wood in Burma but in terms of the contractor it would be a big quantity.

President.—If Burma supplied all the wood required by the Match Industry, on the present figures it would not amount to much more than 100,000 tons but there are some parts of India which will get their own wood. In that case, the demand will be less than 100,000 tons. Therefore I think that it will not attract large capitalists into the business. It is not big enough for that purpose.

Mr. Bawaney.—In my opinion even 10,000 tons a year would be sufficient to attract reliable contractors.

President.—At present with your royalty it comes to Rs. 35 a ton. Cut out the royalty, it comes to Rs. 20 a ton, that is for extraction. The total turnover would be only about two lakhs.

Mr. Bawaney.—Even if the contractors made only Rs. 5 a ton, they would make Rs. 50,000 on 10,000 tons. It would be a paying business for the contractor.

Output per ton of wood.

President.—You talk of 50 c. ft. as representing a ton. That is only a measurement. Now I want to know the weight in lbs. of one c. ft.?

Mr. Bawaney.—25 to 38 lbs. per c. ft. on an average. Letpan weighs 23 lbs. per c. ft.

President.—Letpan you use only for veneers.

Mr. Bawaney.—Yes. Gwe weighs 26 lbs. per c. ft.

President.—Shall we take 25 lbs. as the average?

Mr. Bawaney.—The average will be about 30 lbs. There are some kinds of wood which weigh as much as 40 lbs. per c. ft.

President.—My impression is that it will be about 30 lbs. What I wish to know is really the quantity. When you say that you require 1 ton for 200 gross, how much wood do you recover in the finished condition in lbs.? What I want to know is what do you really get out of one ton because the rest would be used as fuel and packing cases?

Mr. Bawaney.—I think that 35 to 40 per cent. is the loss incurred by us on account of the evaporation of water in the wood. When we use the wood, it is wet.

President.—Take the Aspen wood. Out of one ton of Aspen they really get about 200 gross.

Mr. Bawaney.—We lose about 25 per cent. on account of our workmen not being skilled enough.

President.—At what stage does the skill come in so far as wood is concerned?

Mr. Bawaney.—In making boxes.

President.—I am not talking of boxes. I am talking of splints.

Mr. Bawaney.—I shall let you know to-morrow.

President.—What I want to know is this. When you say you use 50 c. ft. of wood, you get out of that perhaps 150 boxes of splints—that is about right

just now. Out of the same quantity, you get sufficient materials for making packing cases. How many c. ft. will that represent?

Mr. Bawaney.—The quantity we can use for packing cases would be negligible because if we work up to 3½ inch diameter then what is left cannot be used for packing cases.

President.—What does that represent if you have to waste 3½ inch diameter? How many cubic feet does it mean?

Mr. Bawaney.—That depends upon the girth of the log; the larger the girth less would be the percentage of wastage. We have not gone into these calculations.

Dr. Matthai.—If you take a log of 18″ diameter and if you left 3½″ what would be the proportion of the wastage?

Mr. Bawaney.—We shall let you have the figures.

President.—For the purpose of calculation should we be justified in taking 156 gross as your outturn from 1 ton of wood?

Mr. Bawaney.—Yes.

President.—That is the present outturn; do you expect to get it up to 200?

Mr. Bawaney.—Yes.

President.—What was your outturn last year?

Mr. Bawaney.—In the beginning when we started it was varying from month to month from 130 to 146, but in the later months it was 156. 156 is the average for the whole years; it was lower at the beginning and higher at the end. We reached up to 165. I will give you the exact figures. We have got monthly statements.

Mr. Mathias.—What is the best outturn you got from European aspen?

Mr. Bawaney.—We will let you have the figure to-morrow.

President.—By 156 gross you mean 156 gross boxes of matches?

Mr. Bawaney.—Yes, from 1 ton we get 156 gross boxes including veneers.

President.—I take it for packing cases you require 5 c.ft. for a case, that is to say you require 15 c. ft. nett weight.

Mr. Bawaney.—Yes, 15 c. ft. of plank.

President.—How much would the gross weight come to?

Mr. Bawaney.—25 c. ft.

President.—That is to say you want 25 c. ft. in round log or 15 c. ft. of plank for three packing cases.

Mr. Mathias.—What percentage of these planks do you supply now from waste wood?

Mr. Bawaney.—Not more than 3 to 4 per cent.

President.—It comes to this that for splints and veneer and packing cases you want 75 c. ft. in the log for 156 gross?

Mr. Bawaney.—Yes.

President.—How does that compare with the imported wood, say Swedish?

Mr. Bawaney.—What is called Swedish wood is really Russian wood. Russian wood is not as economical as the wood we get locally because the former is only from 9″ to 14″ in diameter and that means a lot of wastage whereas we can get wood of much wider girth locally. When our workmen get more efficient it would be more economical to use local wood so far as output is concerned.

President.—Is the Japanese aspen of the same kind as the Russian?

Mr. Bawaney.—Japan too imports from Russia. Germany and Austria also import from Russia. Even Sweden cannot meet all its demand from its own aspen; it also imports from Russia. As regards wood we are much better placed because India can always get all the wood it requires locally whereas other countries cannot.

Mr. Mathias.—How many c. ft. of aspen would it take to make 156 gross boxes of matches and three packing cases?

Mr. Bawaney.—I will let you have these figures later on.

Local timber resources.

President.—Then according to you India is much better off than other countries as regards wood?

Mr. Bawaney.—There is no doubt about it. We are only handicapped as regards chemicals. As regards labour also we are better placed and lastly India has got a very good market.

President.—You have not given us the price of imported log. You imported logs up to the end of 1926. Will you please let us have the c.i.f. price?

Mr. Bawaney.—We imported aspen from Japan and also 165 tons of Russian wood, *viâ* Bremen.

Dr. Matthai.—In your output last year when you made 11 lakhs gross-boxes was there any imported wood?

Mr. Bawaney.—Yes. We did not actually import; we had some left in stock and we used it.

Dr. Matthai.—How much of the wood did you get from your reserves last year?

Mr. Bawaney.—In 1926 we extracted 3,793 tons from our own reserve.

Dr. Matthai.—And the whole of the balance you got from contractors, did you?

Mr. Bawaney.—Yes, out of which we got 1,743 tons from the Andamans. In all we had 9,962 tons in 1926.

Mr. Mathias.—This 3,793 tons of wood from your own reserve, was that all from one single coupe? You divide your block into 15 coupes I understand of 10 compartments each.

Mr. Bawaney.—We worked 10 compartments which comes to practically 1/15th of the whole block.

President.—Does this 3,793 tons represent 3,793 trees or more or less or what?

Mr. Bawaney.—On the average it would be about that.

President.—All these trees were 5 feet girth?

Mr. Bawaney.—4′ 6″ and over.

President.—What I want to know is, did you actually work all the 15 compartments?

Mr. Bawaney.—Of these, three compartments have not been worked, because there were wild elephants.

President.—Did you finish all the wood that you could extract from these compartments?

Mr. Bawaney.—No. There is about 1,000 tons left.

President.—It means that you have got nearly 5,000 tons.

Mr. Bawaney.—Yes.

Mr. Mathias.—This particular coupe, is it particularly rich in match wood?

Mr. Bawaney.—Yes, it is richer.

Dr. Matthai.—These trees that you extracted last year from your reserves were all, I think, extracted from the Paunglin reserve.

Mr. Bawaney.—From the Mahuya reserve.

Dr. Matthai.—You didn't touch the Paunglin reserve last year.

Mr. Bawaney.—No.

Mr. Mathias.—You have no idea as to whether it contains 5,000 or 10,000 tons.

Mr. Bawaney.—Forest people cannot give us any idea. The Forest Department examined few compartments properly and then they judged the apparent vegetation in the other compartments on the basis of the compartment which they examined properly. They don't take so much trouble about this wood as they do about the teakwood. In the teakwood forest each tree is examined.

Dr. Matthai.—In this 3,793 tons, how many kinds of trees are included?

Mr. Bawaney.—Five kinds.

Dr. Matthai.—Those are mentioned in the Forest Officer's letter to you.

Mr. Bawaney.—Yes.

Dr. Matthai.—And nothing else.

Mr. Bawaney.—No. I have got a list of all the kinds of wood that we have purchased in the year 1926 and you will see that 90 per cent. of our requirements are classified under five or six species.

President.—Do you expect to get the same quantity from the remaining coupes? You estimated that this one coupe would yield 5,000 tons roughly.

Mr. Bawaney.—In the new ten compartments which we are going to work next year according to the estimate made by our Forest Manager, we should be able to get 3,000 tons.

Mr. Mathias.—You have the whole of the Mahuya reserve.

Mr. Bawaney.—Yes, here is a report from our Forest Manager (handed in).

President.—Has he enumerated these trees?

Mr. Bawaney.—He has not actually numbered the trees, but he has forest experience and has been through all these coupes.

President.—How many compartments have you worked during this year? It is now three months.

Mr. Bawaney.—Not a single compartment.

President.—How is that?

Mr. Bawaney.—We stopped at the end of December, because there were no water facilities. We shall begin again in May.

Mr. Mathias.—What are you doing now for wood?

Mr. Bawaney.—We have some wood in stock and we have made contracts for supplies from Port Blair for about 7,000 tons.

Mr. Mathias.—Why do you get logs from Port Blair when you have got logs in your own reserve?

Mr. Bawaney.—We expect to get about 4,000 tons from our concession whereas our requirements are about 11,000 tons.

President.—From your reserve on an average how much do you expect to get?

Mr. Bawaney.—3,500 tons of 5 ft. girth.

President.—Then you have not got enough in your reserve for your full requirements and you have to depend on the Andaman Islands?

Mr. Bawaney.—We have also tendered for the Pugyiokkan reserve. If this also be given to us, we expect to get 1,500 tons a year. There are two other forests for which we are negotiating. We had discussions with Mr. Barrington and we expect a good quantity from there too. As soon as we get a sufficient quantity from our own reserve, we shall give up the practice of ordering wood from the contractors.

Dr. Matthai.—When you get wood from Andamans, what is the cost of it at your factory?

Mr. Bawaney.—One kind costs Rs. 41 a ton and other kind Rs. 36 a ton These contracts are with the Forest Department.

Mr. Mathias.—Is it sent here by Government?

Mr. Bawaney.—Yes.

Mr. Mathias.—Why not you buy wood from contractors?

Mr. Bawaney.—If we get a reliable contractor, we would be willing to pay a rupee or two more. We had a discussion with Messrs. Mason and Bonington and they told us that abundant supplies of wood could be had from Andamans.

Mr. Mathias.—Do the Government work the forests?

Mr. Bawaney.—Yes.

Mr. Mathias.—Would Government be prepared to supply you with an unlimited quantity?

Mr. Bawaney.—At present Government have guaranteed 500 tons a month and have promised to try to give 800 tons a month.

President.—These forests are under the control of the Government of India.

Mr. Bawaney.—Yes.

President.—Who is the officer in charge?

Mr. Bawaney.—Mr. Mason, the Chief Conservator of Forests.

Dr. Matthai.—It is practically the same kind of wood.

Mr. Bawaney.—Sawbya and Bonmeza. They say they have considerable quantities of sawbya. Mr. Pearson, the Government Economist, had a discussion with me when he came here and he told me that there is a very large quantity of sawbya available there and supplies could be had from there.

Mr. Mathias.—I suppose the Andaman Government could supply wood at approximately the same price to Calcutta.

Mr. Bawaney.—I can't say.

President.—Do you make an annual arrangement or have you got a long term arrangement with the Andaman Forest Department?

Mr. Bawaney.—Only an annual arrangement. We are also thinking of asking for a long term arrangement. We don't think they will stop supplying us all of a sudden. There were other enquiries from here and they replied to those people that they are already supplying us. If they had more facilities for dragging the log, they would take the contract from others.

President.—You have given here these three classes of wood for splints, veneers and packing cases. Now I wish to know whether as regards splints you have tried all these classes of wood on any large scale.

Mr. Bawaney.—We are at present using sawbya, maulettanshe and setkadon.

Varieties of wood.

President.—Let us first confine ourselves to your actual reserve. In your reserve how many of these kinds have you got for splints?

Mr. Bawaney.—We have got all these kinds in our reserve.

President.—The names do not seem to agree. These trees that you have specified under splints are not all to be found in the concession that you have got.

Mr. Bawaney.—We wrote to the Forest Department for permission to cut these also because we wanted that these should be included in the kinds we could work and we have got a letter.

President.—Of these classes of wood under splint, which is the most common? Is it Sawbya?

Mr. Bawaney.—Sawbya, Maulettanshe and Gwe. In our forests, the first tree is the most common.

President.—Have you been using them on a large scale?

Mr. Bawaney.—No.

President.—Of these three classes you get Sawbya from the Andaman Islands.

Mr. Bawaney.—Yes.

President.—As regards the others, I take it that they are found comparatively in very small quantities.

Mr. Bawaney.—In our reserves, they are found in very small quantities.

President.—Have you got any specimens made out of these two others, namely, Maulettanshe and Gwe?

Mr. Bawaney.—Yes (handed in).

President.—Out of Sawbya, Maulettanshe, Gwe, Bonmeza you can make everything.

Mr. Bawaney.—Yes.

President.—Bonmeza is a tree which is found everywhere and its quality is suitable for your purposes?

Mr. Bawaney.—Yes.

President.—Of the five kinds which are most common in your forests?

Mr. Bawaney.—In our forests the first three kinds are very common and the others not so common.

President.—As regards the rest of Burma, you can get Bonmeza in large quantities.

Mr. Bawaney.—Outside contractors supply Bonmeza as much as we like.

President.—As regards Sawbya, after how many years does it attain 5 ft. girth?

Mr. Bawaney.—The Forest Department have not paid much attention to this and so they cannot tell us exactly about that. Mr. Scott's opinion is that it would take about 7 years to attain a girth of 5 ft.

President.—What about Maulettanshe and Gwe?

Mr. Bawaney.—Gwe is a tree of rapid growth. Maulettanshe would take a little longer time.

President.—How much?

Mr. Bawaney.—I have no exact idea as to how long it would take but 15 years would be quite sufficient for any of the kinds that we are using.

Mr. Mathias.—You said that it would take only about 7 years for Sawbya to grow to 5 ft. Would that be from the time it was planted as a seedling or are you referring to the trees which you are leaving behind in your coupe?

Mr. Bawaney.—Those that we are leaving aside now would be quite ready in 7 years time.

Dr. Matthai.—I think that what Mr. Scott said was that it would take 7 years for the Forest Department to judge what exactly would be the period required for the maturity of these trees.

Mr. Bawaney.—What Mr. Scott told me was that it was his belief that in seven years time the growth would be as much as 5 ft. but that he was not quite certain about it.

Mr. Mathias.—It is not that you would be able to plant Sawbya and then after 7 years you would be able to cut it for your purposes.

Mr. Bawaney.—No.

Mr. Mathias.—Bonmeza and Pine have got to be added to the list under splints.

Mr. Bawaney.—Formerly we used Pine for splints but now that we are getting Sawbya in large quantities, we don't use it.

Mr. Mathias.—Where do you find Pine in Burma?

Mr. Bawaney.—In Shan States. The Burma Pine has got some kind of knots. If you use a pressure of 30 lbs. when boiling, then the knots become soft and the resin disappears to a certain extent, and then we can split it into veneers easily.

Dr. Matthai.—Where do you get Setkadon from?

Mr. Bawaney.—We have got it in our own forests in a small proportion.

President.—Does it grow in your reserves?

Mr. Bawaney.—Yes.

President.—Are you satisfied with the quality?

Mr. Bawaney.—If we could get that in a large quantity it would be quite as good as aspen. We have not in stock any sample matches made of this wood at present because we have no stock of this wood in the factory at the present moment.

President.—Have you been to your forest?

Mr. Bawaney.—Yes.

President.—Do these trees grow in clusters or do they grow separately.

Mr. Bawaney.—They are not systematically planted.

President.—What is your own experience.

Mr. Bawaney.—My own experience is that 10 compartments would yield about 3,000 tons.

President.—Your coupes cover the whole of the Mahuya reserve?

Mr. Bawaney.—No. 70 in Mahuya and 80 in Paunglin.

President.—Would it matter if you mixed up several varieties of wood when making matches or will you have to confine yourselves to one species of wood only at a time?

Mr. Bawaney.—We would prefer so far as possible to work on one species at a time so that we can get uniform quality. That refers to splints only. In the case of boxes it does not matter at all because these are covered with paper.

President.—Sometimes you paint them?

Mr. Bawaney.—Yes.

Mr. Mathias.—You do not use different kinds of labels for different kinds of woodsplints?

Mr. Bawaney.—We could do that if there were sufficient quantities of wood available of different kinds. At present for the full size we are using Sawbya and for half size Maulettanshe from our forest and from the Andamans, but in the Burma forests there are many varieties of wood that can be quite suitably used for matches.

Dr. Matthai.—Would it not be a disadvantage—I am not talking of your factory—to a factory if it had difficulty in getting wood of one kind but had 10 different kinds of wood for splints so that it would get varying qualities and thereby a bad reputation owing to the colour and quality of the wood?

Mr. Bawaney.—It would be possible to sell these matches but they would not command a good price.

Dr. Matthai.—That would affect them particularly in export markets?

Mr. Bawaney.—That is so. If we mix up Taungmyo, Gwe and Setkadon it would not make much difference. We have done it. We mix up Taungmyo with Maulettanshe and Bonmeza with Gwe and has not made much difference. Sawbya we have to use separately because it has got a specially glazed and wavy appearance. If we mix it with any other kind it would at once be obvious.

Continued on Tuesday, the 22nd March, 1927.

Varieties of wood.

President.—From the list supplied by you yesterday, Statement No. 12, it does appear to me that there are only about 6 varieties which you can get in large quantities and that the rest really speaking are miscellaneous species which you probably use to make up the necessary quantity.

Mr. Bawaney.—The item shown there as miscellaneous consists of the varieties of wood which we have tested from time to time.

President.—That may be true but so far as good wood is concerned they are only six in number and the rest you have only tested so far but not used extensively.

Mr. Bawaney.—What happened was that we found the first six varieties suitable for our purposes, could be had in large quantities and there was therefore no occasion for us to pay much attention to the other varieties except testing their suitability for the manufacture of matches so that we might use them whenever required.

President.—If these six classes are suitable would it not be better for the forest authorities to concentrate on the six species which have already been proved?

Mr. Bawaney.—I agree, but we have been experimenting with the other varieties and find some of these are more suitable than even Sawbya.

President.—There must be two things: first, the wood ought to be suitable and secondly, the wood must be easily procurable. It is no use getting a tree here and there which makes extra superfine matches.

Mr. Bawaney.—Of these varieties there are two which, if the Forest Department were to try, we believe they would be able to get in large quantities because the jungle Burmans with whom we have been dealing are prepared to enter into contract with us for their supply in large quantities; one of these is Taungmeok.

President.—And yesterday you also mentioned Setkadon?

Mr. Bawaney.—Yes.

President.—Do they grow in large quantities?

Mr. Bawaney.—Although they are not in large quantities in our reserve, in other places they can be found in large numbers which have been already proved. As regards Taungmeok we have heard from Burmese contractors that they grow abundantly in the Tenasserim district.

President.—How will you bring them here from Tenasserim?

Mr. Bawaney.—Up to Moulmein we can bring by water. The proposed extension of the Moulmein railway passes near by and after the extension is complete we can have the logs brought by rail.

President.—How much would it cost you to bring it?

Mr. Bawaney.—We have not yet gone into the figures as to what the cost of transport would be per ton.

President.—There is another disadvantage and that is that if you have this wood growing at such a long distance from Rangoon though the wood may be of good quality it may be expensive.

Mr. Bawaney.—But there it is very cheap and even adding the cost of transport it would pay us to get them.

President.—The royalty may be Rs. 2 to 3 less but that is not going to make a substantial difference.

Mr. Bawaney.—It would cost about 4 to 5 rupees per ton extra. We have imported large quantities of wood from Moulmein. From Martaban to Rangoon the freight is about Rs. 9-6. They charge per 100 *vis* which comes to about Rs. 2-13-6 by weight. About 1,000 tons have been imported from Moulmein. So I take approximately Rs. 5 per ton extra.

President.—But if you can get 5 or 6 varieties in the neighbourhood of Rangoon what is the point in getting it from Moulmein?

Mr. Bawaney.—Nothing except that these would make better splints.

President.—Have you made any splints out of Taungmeok?

Mr. Bawaney.—Yes. We can get Taungmeok in the forest between Moulmein and Rangoon also.

President.—What forests are these?

Mr. Bawaney.—Bilin forests.

President.—Have you got samples of Taungmeok or setkadan?

Mr. Bawaney.—No.

President.—These make 8 varieties.

Mr. Bawaney.—There is one more, No. 18 (Yemne) which is found in very large quantities in Tavoy and Mergui.

Dr. Matthai.—When you say that these trees grow in large quantities, what is your source of information?

Mr. Bawaney.—We have bought wood from there and our contractor interviews the forest people.

President.—And then there is the pine also.

Mr. Bawaney.—Pine is found in large quantities on Kalaw side. The difficulty about pine is that it takes a long time to attain the proper girth. When the present quantity is exhausted, it will take years for suitable trees to be available.

President.—You have given nine varieties and if we include pine they come to 10.

Mr. Bawaney.—Yes.

President.—The first six varieties are :—

1. Sawbya
2. Bonmeza
3. Didu
4. Gwe
5. Letpan
6. Maulettanshe.

Mr. Bawaney.—Yes.

Dr. Matthai.—You accept the statement of the forest people that as far as your own reserve is concerned, it is these kinds of wood that predominate in your own reserve.

Mr. Bawaney.—Except Didu and Letpan which are in small quantities in our reserve.

President.—I wish to know which of these types are suitable for splints, veneers and packing cases?

Mr. Bawaney.—Bonmeza can be used for all the three purposes conveniently.

President.—Is it because of the bigger girth of Bonmeza?

Mr. Bawaney.—Yes.

President.—For packing cases you require a fairly big girth.

Mr. Bawaney.—Yes.

President.—Of these varieties Bonmeza is the only variety which can be used for all the three purposes conveniently?

Mr. Bawaney.—That is the only one which we can use conveniently

President.—For splints which is most suitable?

Mr. Bawaney.—Bonmeza, Sawbya and Gwe, Nos. 1, 2 and 4. We place Bonmeza as the first, Sawbya second and Gwe third. Maulettanshe splints are a little harder.

Dr. Matthai.—When you find a wood good enough for splints, it should be good enough for veneers. I can understand a tree which is not good enough for splints being good enough for veneers, but a tree which is good enough for splints should be good enough for veneers also.

Mr. Bawaney.—Not necessarily.

President.—You have mentioned three varieties for splints. Are they equally good for veneers?

Mr. Bawaney.—Bonmeza, Didu and Letpan can be used for veneers.

President.—What you would ordinarily do would be to get Maulettanshe for splints and then you would try and get Didu and Letpan or Bonmeza for veneers.

Mr. Bawaney.—Yes.

President.—And then you make the packing cases out of Didu and Letpan.

Mr. Bawaney.—For packing cases we would prefer Maulettanshe and Bonmeza.

President.—Unless you get Bonmeza, you would require at least two varieties for other purposes.

Mr. Bawaney.—Yes. In Japan they make packing cases mostly of pine wood and also the boxes. They make splints from aspen.

President.—Supposing the Forest Department concentrated on these 5 or 6 varieties it is much better that you should get wood of all these varieties than that you should get pine for something and other kinds for something else.

Mr. Bawaney.—I think if the Forest Department could give us an assurance that they would concentrate on a limited number of varieties, we on our part would undertake to test all the varieties available here, report to them and on that they could concentrate on the varieties that were found most suitable. They need not confine themselves to the six varieties.

President.—The Forest Department does not carry on match business. It is for persons interested in the match business to say: "These are the woods that we have tested; they are found in such and such a place; they are good woods and can be produced in large quantities. Will the Forest authorities help us?" You don't expect them to make experiments for you. You must in the first instance find out the kinds of wood suitable for your purpose.

Mr. Bawaney.—I believe there must be many varieties of wood in the forests of Burma which would be quite suitable for the match-making industry and if the Forest Department were to make a list of all the kinds of wood available and make an estimate of the quantities available, then we will find many varieties that would be quite suitable and even without going into regular plantation for this, we may be able to get wood which will be sufficient for our requirements.

President.—It will be really a haphazard business for them to look for trees here and there and tell you. The idea is that if the industry is to be established, certain varieties of wood should be concentrated on in the more accessible areas.

I must point out to you this. To us it may sound a very big sum, but the Burma forests are very rich forests. They get a very large revenue from the more expensive classes of wood and even if Burma supplied the whole of India with the necessary match wood, it will not be much more than 100,000 tons on the present figures. This is not such a paying proposition for the forest authorities to induce them to go all over the province and make experiments for you. It is for the industry to say:

> "Here are the varieties which can easily be grown. Will the forest authorities assist us in securing these varieties."

Mr. Bawaney.—We are still experimenting with the other varieties.

President.—You have given nine varieties. They ought to be sufficient for practical purposes and if you come across any other variety which grows more easily and which is better, then of course you can draw the attention of the forest authorities. That may be a practical proposition.

Mr. Bawaney.—Yes, but as we are still experimenting with other varieties, we don't like to be definite about them. We might find some variety which would be more suitable.

President.—What do you expect the forest authorities to do whilst you are experimenting?

Mr. Bawaney.—Bonmeza we would require always. For splints we require Setkadon, Maulettanshe and Sawbya. We should like them to go on with Bonmeza for veneers and boxes and for splints with whatever varieties they find they can grow easily, out of the three others.

President.—Setkadon will have to be grown in the Tenasserim Division. Does it grow in this part of Lower Burma?

Mr. Bawaney.—We have got in our reserves too, but not in large quantities.

President.—But you have not been able to secure very much.

Mr. Bawaney.—We have got in fair quantities, but the girth is not so very good.

President.—You must remember this. Setkadon is no doubt a good tree but it takes 60 years to grow. It is not worth while to plant such a tree.

Mr. Bawaney.—So far as the wood for splints is concerned, we place Setkadon first, Maulettanshe second and Sawbya third but if it is not so very convenient to grow Setkadon they can grow any other variety which will take less time to grow.

President.—The trouble is that nobody seems to know how long these trees take to grow.

Mr. Bawaney.—That is why we too could not come to any decision.

President.—You do not know whether all these trees would grow in the same area.

Mr. Bawaney.—We cannot say definitely whether the same locality would be equally suitable for the growth of all these kinds of trees but we know that these trees grow in the same locality. The industry is still very young and we cannot get any definite information from the Forest Department as regards the growth of these trees.

President.—There are these two points. First of all, you must show that you have got sufficient quantities of wood to carry on until trees can be planted and the results ascertained.

Mr. Bawaney.—We don't think that there would be any difficulty due to the exhaustion of the forests by the time the experiments are over because even now we can get 3,000 tons a year from our own reserve and if we get the Okkan reserve for which we have applied, we would be able to get another 1,500 tons. We get our wood also from outside contractors. These contractors take out leases from Government for the reserve forests and supply us. Our contractors are willing to supply more than what we require. Then, we can get from Port Blair too. For the current year we have contracted for nearly 80 per cent. of our requirements from the Andaman Islands. So, I think, that we will be left over with a stock of two or three thousand tons if we get timber from our own reserve.

President.—You told me yesterday that you could make out of one ton of wood 156 gross including packing cases.

Mr. Bawaney.—We could make out of 75 c.ft.

President.—That is right. How much of that would you require for veneer only? How much would you require for splints only?

Mr. Bawaney.—We have not kept separate accounts for these.

President.—If it is a superior wood which can be used for splints, I take it that you won't use it for veneers. Take the case of Setkadon. At present you don't get Setkadon in large quantities. You say that it is the best wood. Why should you use it for veneer?

Mr. Bawaney.—We are not using it for veneer.

President.—Probably you want more for veneer.

Mr. Bawaney.—No, it would take much less. If you weigh both the splints and the veneers, you can get an approximate idea.

President.—I should like to get some idea as to what it really is.

Mr. Bawaney.—We have got the daily output. We will work out the figures and send them to you.

Dr. Matthai.—As regards packing cases, I take it that any kind of soft wood would be useful.

Mr. Bawaney.—Yes.

Dr. Matthai.—The kind of wood that is good enough for splints or veneers, it would be a waste to use for packing cases.

Mr. Bawaney.—Any kind of soft wood will do for packing cases.

President.—Is it not the case that from all classes of wood you get some portions which you cannot use either for splints or for veneers but which you can use for packing cases?

Mr. Bawaney.—No, these ends are only about 6″ or 9″ or at the most about one foot.

President.—But one foot will give you a fairly large quantity.

Mr. Bawaney.—For packing cases we require longer planks. One foot would not do. Sometimes the logs are cracked or very dry and cannot be used for match making. They can be used for making planks.

President.—For packing cases you can use any wood that may be locally available.

Mr. Bawaney.—Yes, any kind of soft wood which is not suitable for making splints or veneers can be used for making packing cases.

Mr. Mathias.—Do you use any kind of wood for making packing cases which can be used for making splints or veneers?

Mr. Bawaney.—We use for packing cases only those which are rejected.

Mr. Mathias.—Apart from rejections?

Mr. Bawaney.—We are generally able to get sufficient planks out of the wood which we reject or which may be too dry to be made into splints or veneers.

Mr. Mathias.—My point is that you would not use any wood which is actually suitable for making splints or veneers for the purpose of making packing cases.

Mr. Bawaney.—No.

Sources of timber supply.

President.—I want to consider the principal localities from which you can get the largest quantity of wood.

Mr. Bawaney.—We get a large quantity—nearly 1,200 tons—from Martaban.

President.—In the Tenasserim Division?

Mr. Bawaney.—Yes. We can get up to 4,000 tons a year from that place.

President.—What are the principal kinds of wood you can get from Martaban?

Mr. Bawaney.—Sawbys, Didu, Letpan and a small quantity of Maulettanshe.

President.—In 1925, you got from Toungoo about 1,900 tons.

Mr. Bawaney.—Yes.

President.—I understood that at Pyinmana you got more of these kinds of wood.

Mr. Bawaney.—True, but we have to consider the question of contractors also. As we get better contractors at Toungoo, we get more from Toungoo.

President.—What varieties were these?

Mr. Bawaney.—Sawbya and Maulettanshe.

President.—Then, you get considerable quantities from the Prome Division.

Mr. Bawaney.—Yes, Sawbya and Bonmeza we get from there.

President.—Then you have got your own reserve, and lastly you get large quantities from Port Blair, so that these four or five places are the big centres.

Mr. Bawaney.—From Myitkyina and Shan States we can get wood at Rs. 30—all charges paid at Rangoon. As we get it nearer home we don't pay much attention to getting it from those places.

Dr. Matthai.—Is it your experience that when you buy wood from contractors, they charge different prices for different kinds of wood?

Mr. Bawaney.—Lately, it has happened like that.

Dr. Matthai.—How long ago did this practice start?

Mr. Bawaney.—Six months or so ago.

Dr. Matthai.—Among the kinds of wood which you buy which is the kind for which they charge highest?

Mr. Bawaney.—Maulettanshe and Setkadon, Rs. 4 to 5 a ton extra.

Dr. Matthai.—Is it because there is more demand for these?

Mr. Bawaney.—Because we prefer this wood to any other wood we use for half size matches and we are prepared to offer a higher price for these if we can get in large quantities.

Mr. Mathias.—What is the price at which you buy Maulettanshe from contractors?

Mr. Bawaney.—Rs. 34 to Rs. 35 delivered at the works.

Mr. Mathias.—Other kinds you get at Rs. 30, do you?

Mr. Bawaney.—Yes. At about that price.

Mr. Mathias.—You say you have every reason to believe that if proper research work is carried on under the direct control of the Government, it is not impossible to locate a supply of that particular species of wood from which attractive splints can be manufactured. What reason have you to believe that?

Mr. Bawaney.—We have tried the kinds of wood that we can get in our own reserve and we have tried about 35 varieties out of which three varieties have been found quite good. The Utilization Department and the Forest Department can get all kinds of wood in Burma and so we think that when we have got three or four varieties from our own reserve there is a chance of getting more varieties from all the forests in Burma.

Mr. Mathias.—You say that even after making experiments for a considerable time you have not been able to obtain local wood quite as satisfactory as the imported wood, and therefore it appears to me that you have little reason to suppose that better wood exists in Burma.

Mr. Bawaney.—In the course of our experiments we have come across some kinds of wood which have been found better and our experiments have not reached finality yet, so that there is every possibility that if proper research is made the Forest Department may come across a better class of wood.

Mr. Mathias.—Do you mean better quality of wood for splints?

Mr. Bawaney.—Yes.

Mr. Mathias.—What you say is really an expression of your desire—a hope—not probability at all.

Mr. Bawaney.—You may take it as a hope or anything you like but we do believe that they can find many varieties after research.

The Company's forest concession.

President.—I wish to ask you a few questions about this forest of yours. Your concession is confined to two forests, Mahuya and Paunglin?

Mr. Bawaney.—Yes.

President.—I wish to know a little about your communications. How do you bring your wood down? Are there any cart roads at all in the forests?

Mr. Bawaney.—No.

President.—As soon as the tree is felled you have got to drag it, I take it by means of elephants or buffaloes to the nearest running stream?

Mr. Bawaney.—Yes.

President.—What is the furthest distance that you will have to go?

Mr. Bawaney.—One mile.

President.—Wherever you extract the trees from?

Mr. Bawaney.—Yes.

President.—Which is the principal creek that you use?

Mr. Bawaney.—We have small streams all over the reserve from the principal river which are only used during the rains; that is up to the main stream. From there we bring them down by river to Rangoon.

President.—You mean that the streams go right through the forest?

Mr. Bawaney.—Yes, there are streams running into the various compartments; there are small channels.

President.—Do you mean to say that the whole of the wood can be brought down by water to Rangoon?

Mr. Bawaney.—Yes.

Mr. Mathias.—Have you got elephants or buffaloes?

Mr. Bawaney.—We hire both.

Mr. Mathias.—Could you use tractor engines at all?

Mr. Bawaney.—If we had the assurance that we will have roads to the forests tractors would no doubt gradually come into use.

President.—I want to know the exact period during which you will be able to float the logs?

Mr. Bawaney.—June to November.

President.—After November the streams begin to dry up, do they not?

Mr. Bawaney.—The small streams dry up.

President.—For six months you can bring the logs down by water?

Mr. Bawaney.—Yes.

President.—For the remaining six months what will you do? What communication will you have as regards the Mahuya reserve? Which is the nearest point, the railhead or the riverhead?

Mr. Bawaney.—The riverhead. It would be about 3 miles above Hlaing which is tidal to Rangoon. That is 19 miles.

President.—But your compartments may be higher up. What I want to know is what is the longest distance?

Mr. Bawaney.—That would depend on how far we went further north: it would be an additional mile. In the dry season the longest distance would be 27 miles.

President.—Will you be able to cart it from the forest?

Mr. Bawaney.—Yes.

President.—You would cart it direct to Hlegu?

Mr. Bawaney.—Three miles above Hlegu, that is to Letpanway.

President.—How much would it cost you in that case? It would be about 24 miles, would it not?

Mr. Bawaney.—Yes.

President.—How much would it cost you?

Mr. Bawaney.—It would be about Rs. 7 more.

President.—Then as regards the Paunglin forest, what would you do there during the dry season?

Mr. Bawaney.—This would not be possible there.

President.—You get your coupes in both of them.

Mr. Bawaney.—We will get in compartments in both of them.

President.—You will work some in the wet season and others in the dry season.

Mr. Bawaney.—Yes. Each has got 75 compartments.

Dr. Matthai.—Do 10 compartments make one coupe?

Mr. Bawaney.—15 compartments.

President.—You will have a coupe in each forest.

Mr. Bawaney.—Yes.

President.—You work the Mahuya forest in the dry weather and the Paunglin reserve in the wet weather?

Mr. Bawaney.—Yes. Of course we would not get much extraction in the dry weather as in the rainy weather, so it would take a longer time.

Dr Matthai.—Your arrangement with the Forest Department is that you work one coupe a year.

Mr. Bawaney.—We work any 10 compartments that we want.

Dr. Matthai.—The cycle is worked that way. You can take any 10 compartments in either of the reserves in one year.

Mr. Bawaney.—Yes.

Mr. Mathias.—Out of any coupe you like.

Mr. Bawaney.—Yes. They would not give us more than 10 to work in a year.

President.—You will select them in such a way as to suit your convenience.

Mr. Bawaney.—Yes.

Dr. Matthai.—So that during the dry weather you would confine yourself to the south and during the wet weather you would confine yourself to the north.

Mr. Bawaney.—Yes.

President.—They have given an estimate of these two reserves. They contain about 98,000 tons. The kinds of wood that you want represent only a small total percentage of the timber available in the forest. There will be other classes of wood.

Mr. Bawaney.—Yes, which we don't touch.

President.—Are there any expensive classes of wood there?

Mr. Bawaney.—Yes, we have got several classes of hard wood. Nos. 1, 2, 3 and 4. There is no teak except in the northern boundary.

President.—If the forest authorities were to undertake planting in these reserves, they must work off all the wood.

Mr. Bawaney.—Not necessarily because the lower portion is what they call ever green. You will never get any teak or any other wood to grow there. The southern portion of the Paunglin and Mahuya is practically an ever green forest. No teakwood is grown there.

Mr. Mathias.—There are no hard woods there.

Mr. Bawaney.—Not in any appreciable quantity.

President.—That area can be cleared.

Mr. Bawaney.—Yes.

President.—How many acres would that make?

Mr. Bawaney.—You can take it as 150 square miles.

President.—For both reserves.

Mr. Bawaney.—That is what they have at the present time allocated into compartments. Although the reserve includes the northern portion, they have not allocated it into compartments because they say it would be absolutely impossible for us to work the match wood out of that.

President.—Because it is inaccessible.

Mr. Bawaney.—Yes.

President.—They have only given you 29 compartments.

Mr. Bawaney.—80 compartments in the Paunglin and 70 in the Mahuya.

Dr. Matthai.—The forest officer says 100.

Mr. Bawaney.—Yes. Of that only 80 will be workable.

Dr. Matthai.—Hard wood in your reserve is also being worked.

Mr. Bawaney.—Not at the present time.

Dr. Matthai.—Supposing somebody gets a lease with regard to hard woods in this reserve and he starts working would the stream get congested?

Mr. Bawaney.—Undoubtedly.

Dr. Matthai.—Would that block your traffic?

Mr. Bawaney.—To a certain extent it would.

Mr. Mathias.—That would not affect your cutting match wood next year.

Mr. Bawaney.—We have got to bring them all in one season.

Mr. Mathias.—Supposing you get a certain coupe this year and float all your wood down it is quite possible for the Forest Department to extract hard wood next year. In this way in any your flotation of timber would not be impeded unless the hard wood and soft wood were let out to two separate people at the same time.

Mr. Bawaney.—Where it would come in I will tell you. All these hard woods that grow there are not floating woods and they have got to be supported with bamboo rafts. Whereas if an ordinary match wood is cut and thrown into the stream, it will float of its own accord down to a place where it is caught. As regards the hard wood from the time it is put into the river, it has to be supported by bamboo rafts. One log will probably take the place of 3 logs so that a log of 5′ girth would really require 15 feet of space to float down the stream.

Mr. Mathias.—If you are extracting at the same time.

Mr. Bawaney.—Yes, we will have to use the same stream.

Mr. Mathias.—Even if he is working in different compartments.

Mr. Bawaney.—Unless he is using a different stream.

President.—In his case it would not matter if there was some delay.

Mr. Bawaney.—Yes, whereas in our case it would matter if there was delay.

President.—If there was to be any plantation, must it be a plantation of one species of wood?

Mr. Bawaney.—Not necessarily for the simple reason that hard wood can be cut and allowed to remain, whereas as regards the soft wood we cut and bring it to the factory as soon as possible.

President.—Is there much extraction done in these forests of hard wood?

Mr. Bawaney.—Not in our reserves.

President.—Nobody is extracting anything.

Mr. Bawaney.—No.

President.—Supposing it was a case of planting would the other trees have to be removed.

Mr. Bawaney.—Not necessarily.

President.—Have you got space to plant?

Mr. Bawaney.—If we cut down 20,000 trees.

President.—You must get at least 20 to 30 tons per acre. To get that quantity you must have more space and that means you must remove the other timber.

Mr. Bawaney.—Undoubtedly. You are not going to allow the trees that still exists in the forest to remain there.

President.—Supposing now the Government said that they were going to plant in this particular reserve, how many years do you think it would take to clear the forest of the other classes of wood which are not suitable for match-making?

Mr. Bawaney.—That would be impossible to say for the simple reason that at the present time in the forests there exists according to the data—working plans—trees of 2′ to 2′ 6″ girth, 3′ to 3′ 6″ girth, 4′ to 4′ 6″ and 5′ girth of all species. But the arrangement with the Government is that we will not cut timber under 5′ girth. But there are thousands of trees all below 5′ girth

which on the cycle rotation of the next 15 years would attain 5′ girth, because once you finished a compartment, they don't allow you to go into that for the next 15 years.

President.—What it means is this that until all the trees have grown and are cut down, there cannot be a really complete plantation.

Mr. Bawaney.—At present we are ensured a supply for 45 years in the forests with the existing trees including those below the girth limit.

President.—You may have it for yourselves but I am talking of a plantation for the whole industry.

Mr. Bawaney.—There are supplies at the present time which would give us 3,000 tons a year for 45 years.

President.—But then that would only give you 3,000 tons per year.

Mr. Bawaney.—The other forests will also give us an equal quantity.

President.—If the policy of plantation is adopted, then unless all these other trees are cut down or you wait 45 years, the plantation on a large scale cannot take place.

Mr. Bawaney.—I don't think Government work in that way. Before they start planting again they don't fell all the big trees. As they fell, they plant.

President.—In this case we want a certain quantity of wood not only for you but for other people.

Mr. Bawaney.—The working plans officer goes through the area we have finished every 5 years and sees exactly what he can plant.

President.—That is perfectly true. I understand by a plantation that you must as far as possible have these particular varieties only in that forest. Take a rubber plantation. You don't have anything else. Rubber trees must be planted a certain number of feet apart. If plantation on that principle were to be undertaken, then either the Government have to wait for 45 years until all these trees were worked or they must cut down the other trees whether they are ripe for cutting or not and start plantation.

Mr. Bawaney.—I understand from the Conservator, Utilisation Circle, that if Sawbya and Maulettanshe were planted on a clear area and so much apart instead of as it is just now, the duration to attain a growth of 5′ would be about 16 to 18 years, but allowing it to grow as it is just now in the forests, it generally takes 35 to 45 years.

President.—I am asking you for information just now. The forest authorities may like to have an easier road, but that is another matter. What I want to know is whether it is possible by clearing the forests to plant these trees like a regular plantation.

Mr. Bawaney.—I cannot vouch for what the Forest Department would do.

President.—I am asking you.

Mr. Bawaney.—My idea is they will go on planting where we have extracted.

President.—You would have as many trees as you have cut.

Mr. Bawaney.—Quite so.

President.—That is not sufficient.

Mr. Bawaney.—They still go on cutting out other trees. They cut down hard woods.

President.—You have got 150 square miles out of which you get 3,000 tons a year. That is not good enough.

Mr. Bawaney.—Only of our species, but there are other kinds.

President.—But I am not talking of the other kinds. We are concerned with the Match industry.

Dr. Matthai.—What we are concerned with is not the regeneration of an area which you are working now but a fresh plantation altogether. Is it possible in Burma to plant an area which has been completely cleared with only one kind of match wood?

Mr. Bawaney.—Certainly it is possible.

Mr. Mathias.—I understand the system of clear felling even in the case of the more valuable wood such as teak has not been approved by the Forest Department.

Mr. Bawaney.—So I understand. They never wait for the whole area to be entirely cleared. They will just go on planting.

President.—Until eventually they are all match wood trees.

Mr. Bawaney.—That is in ever green areas where match wood or soft wood would grow.

President.—I understood you to say that Mahuya is an ever green area.

Mr. Bawaney.—Yes, there is no teak in it.

President.—That would lend itself to plantation more easily.

Mr. Bawaney.—Yes.

President.—As regards Paunglin?

Mr. Bawaney.—The northern portion is not an ever green area.

President.—How much does that represent?

Mr. Bawaney.—30 to 40 miles.

President.—Out of how many miles?

Mr. Bawaney.—70 miles.

President.—Then there is the Okkan forest (Tharrawaddy division.) That is in the north.

Mr. Bawaney.—Yes.

President.—There is also a forest in the south.

Mr. Bawaney.—Nothing south of Mahuya, but there is in the south east.

President.—Does that contain an ever green area?

Mr. Bawaney.—It is an ever green area.

President.—The whole of it.

Mr. Bawaney.—Not much teak is growing there.

Dr. Matthai.—How many miles is that?

Mr. Bawaney.—It is about 200 miles.

Mr. Mathias.—In this ever green area provided the soil is suitable for match wood trees, the production per acre could be very much increased by natural regeneration assisted by extraction of non-match wood trees, is that so?

Mr. Bawaney.—Undoubtedly.

Mr. Mathias.—It will not be really necessary after extracting the hard wood to plant the soft wood trees.

Mr. Bawaney.—No.

Dr. Matthai.—From your point of view it will be more economical to extract where the match wood is growing.

Mr. Bawaney.—Yes.

Mr. Mathias.—Why?

Mr. Bawaney.—Because otherwise there would be competition between one man working timber worth Rs. 100 a ton and another working timber worth Rs. 30 a ton.

President.—The creek in Okkan goes into the Hlaing river which falls again into the Rangoon river.

Mr. Bawaney.—Yes. The waterways are very suitable, but unfortunately for only six months in a year?

President.—That would apply to the whole area.

Mr. Bawaney.—Practically to the whole area in so far as rafting is concerned.

President.—Then you will have to transport by land a considerably long distance before you reach the creek in Okkan.

Mr. Bawaney.—But you can do it.

President.—I am talking of the dry weather.

Mr. Bawaney.—It would not be feasible at all.

President.—What would you do as regards the other areas in the dry season?

Mr. Bawaney.—As far as Okkan is concerned, we would have to close down. It would be too far away from a railway head.

President.—What would you do?

Mr. Bawaney.—All these people can drag the wood to the railway head. The Government's policy has always been to give the small people the easiest to work and the big people the hardest to work.

President.—They are difficult to work in the sense that they are hilly.

Mr. Bawaney.—No, it is just the same ground.

President.—I have some recollection that some of the forest officers told me that these trees grew on slopes.

Mr. Bawaney.—Not on the top, but just on the bottom slope.

President.—That applies to all these soft woods?

Mr. Bawaney.—More or less and especially in the Mahuya it is all flooded ground.

Mr. Mathias.—What about Letpan?

Mr. Bawaney.—Letpan would only grow on the banks of streams and more so in the salt water swamps.

President.—You pay a high royalty of Rs. 12-8-0 a ton for your wood.

Mr. Bawaney.—Yes. Government asked for a tender and we submitted our tender offering to pay a royalty of Rs. 12-8-0 per ton.

President.—Don't you think that by offering to pay a higher royalty you have made the cost of wood higher for other people?

Mr. Bawaney.—When we went into the figures, we calculated that it would cost about Rs. 17-8-0 for extracting and bringing to Rangoon. On that basis we offered this royalty to Government.

President.—Now what is your expense?

Mr. Bawaney.—Later on we found that we were wrong in our calculations regarding expenses. It costs more now than what we thought it would cost. It comes to Rs. 22-8-0 for extracting and bringing it to Rangoon.

Dr. Matthai.—It is not because you anticipated any special competition from anybody else that you offered to pay the high royalty of Rs. 12-8-0.

Mr. Bawaney.—That was one of the reasons. We wanted to secure the forest. We thought there might be other people who would be tendering for the forests. At that time we were getting wood at Rs. 30 per ton from outside. We calculated that our charges would come to Rs. 17-8-0 and so we offered to pay the balance of Rs. 12-8-0 as royalty.

President.—You were prepared to pay the whole of the margin.

Mr. Bawaney.—Yes.

President.—Besides yourselves, there is no one here who is manufacturing matches who has got forests.

Mr. Bawaney.—No, but the Swedish Trust people also tendered for the forests.

President.—Did they?

Mr. Bawaney.—Yes.

Plantation of match wood species.

President.—You have given us an estimate prepared by Mr. Robertson for planting Bonmeza.* Mr. Robertson is the Utilisation Officer.

* Mr. Robertson does not recollect having made this estimate.

Mr. Bawaney.—Yes, he is called Conservator, Utilisation Circle.

President.—Was it prepared at your suggestion or how did it come about?*

Mr. Bawaney.—This was prepared at our suggestion. I had to go and consult him every now and then in connection with our match wood and when we found that Bonmeza was suitable I asked him to give us an estimate.

President.—Is it an estimate for plantation on a clear felled forest or is it an estimate for plantation in the ordinary way where there is room?

Mr. Bawaney.—It is on the basis of clearing the forest and starting a new plantation.

President.—Is there any new clear felled forest in the vicinity of Rangoon?

Mr. Bawaney.—Not so far as I know.

Dr. Matthai.—This planting charge that Mr. Robertson gives of Rs. 20 per acre for 7 years, includes not merely planting but also clearing.

Mr. Bawaney.—Planting, supervising and everything. I think that it includes the clearing charge but for planting match wood trees, the clearing has not to be done on the same scale as for other plantations.

President.—Have you any personal experience of planting at all?

Mr. Bawaney.—No.

President.—We will have to question Mr. Robertson on this point. Do you consider the estimates of Mr. Robertson as reasonable?

Mr. Bawaney.—Yes.

President.—Of course he calculated that the cost per ton would be Rs. 2-8-0, that is to say to meet Government's out of pocket expenses.

Mr. Bawaney.—It allows for compound interest on capital invested from the time of plantation to the time of extraction.

President.—According to this, on an investment of Rs. 46 Government will get Rs. 120 royalty for the wood alone.

Mr. Bawaney.—Yes.

President.—Would you consider that a fair return on capital?

Mr. Bawaney.—Yes. We look to that Rs. 2-8-0 only.

President.—That of course includes the price of the land. Have you any idea as to what the value of the land would be in the forests if you were to buy? More or less this would be treated as waste land.

Mr. Bawaney.—Government allows waste land to be occupied free of charge. The land has no value. Government can get no revenue out of it.

Extraction and transport costs.

Dr. Matthai.—If you take Rs. 35 as the cost at the factory and if from that you deduct the royalty, it leaves Rs. 22-8-0 for the cost of transport and extraction. How is it divided between extraction and transport?

Mr. Bawaney.—About half each way.

Dr. Matthai.—That is to say, the transport would cost as much as extraction.

Mr. Bawaney.—Yes, because transport includes the cost of establishment.

Dr. Matthai.—Do you do your own extracting? Have you got your own cutters, elephants, etc.?

Mr. Bawaney.—We hire the elephants and buffaloes but we have our own men. Extraction includes the cost of dragging the trees from the place where they are felled to the river bank.

President.—What is the average cost per ton?

Mr. Bawaney.—About Rs. 9 from the stump to the stream bed.

President.—After that, what costs have you to incur?

---

* Mr. Robertson does not recollect having made this estimate.

Mr. Bawaney.—There is rafting.

President.—What does that cost?

Mr. Bawaney.—It costs about Rs. 9½ for rafting from the stream bed into which it was dropped right down to Rangoon.

President.—That comes to Rs. 18-8-0 only.

Mr. Bawaney.—Yes.

President.—How do you account for the balance of Rs. 4?

Mr. Bawaney.—That covers the establishment charges.

President.—Would it be possible to do this work on the contract system?

Mr. Bawaney.—It is done on a contract system.

President.—Can you tell a man 'bring this down and we will pay you so much'?

Mr. Bawaney.—That is what we do.

President.—You have accounted for Rs. 9 and Rs. 9-8-0.

Mr. Bawaney.—Yes, the balance, *viz.*, Rs. 4, is what we give to the contractor as his profit.

President.—You pay Rs. 22-8-0 in all.

Mr. Bawaney.—Yes.

Dr. Matthai.—Then your wood cutters are employed by your contractors.

Mr. Bawaney.—Yes. There are different men to whom we allot the compartments.

President.—At what stage does the measurement take place?

Mr. Bawaney.—At Hleghu.

President.—Do you meet the big stream there?

Mr. Bawaney.—First of all from the small stream where the logs are dropped into the river bed, they come down in small rafts of 5 logs to a raft until it comes to Phaunggyin where they are made into rafts of 30 logs each and brought to Hlegu. There the line is perfectly clear and they are made into rafts of 100 to 120 logs. Thus, there are three rafting contractors.

President.—Do you enter into separate contracts or do you give Rs. 22-8-0 to one man?

Mr. Bawaney.—We give Rs. 22-8-0 to one man.

President.—And that man allocates the work to three different persons.

Mr. Bawaney.—Yes.

President.—Then, as extraction becomes more difficult, you will have to pay more.

Mr. Bawaney.—No, because it is a fixed rate.

President.—It cannot go on for ever.

Mr. Bawaney.—In this area, the cost of extraction is the same because dragging has to be done for only one mile and the floating charge for the remaining distance is practically the same.

Mr. Mathias.—During the hot weather, what do you do?

Mr. Bawaney.—We have separate contracts for that.

Dr. Matthai.—You make your contracts for one year, don't you?

Mr. Bawaney.—Yes.

President.—Would the same man do it for you?

Mr. Bawaney.—Yes.

President.—You will have to pay him a little more, I suppose?

Mr. Bawaney.—Yes, Rs. 7 or Rs. 8 extra.

President.—So that in the hot weather the cost would go up by Rs. 7 or Rs. 8, making a total of about Rs. 42.

Mr. Bawaney.—Yes.

President.—At other times, the cost will be only Rs. 35.

Mr. Bawaney.—Yes.

President.—The average would work out at about Rs. 40 for the whole year.

Mr. Bawaney.—Yes.

Mr. Mathias.—You say in answer to the questionnaire that you find the supply of wood constant in respect of quality. I have heard it alleged as regards the quality of the trees used for making splints that some trees growing on the hills for instance will yield splints of very good quality while the splints made for those growing a little lower down are brittle. Have you found anything like that?

Mr. Bawaney.—We have not experienced this difficulty although it is possible that if the soils is different the quality of wood may vary also.

Mr. Mathias.—You have had not complaint about the varying quality?

Mr. Bawaney.—No.

Dr. Matthai.—You have told us of a small concession that you got from the Burma Railways. What was this concession?

Mr. Bawaney.—On the Shan State Railways the freight charges are double of what they are on the other lines, but when we were getting timber from the Shan States in 1925 the Burma Railways charged us at the ordinary rates instead of the double rate on the Shan State Railways.

Dr. Matthai.—Have you experienced any difficulty as regards wagon supply?

Mr. Bawaney.—During the paddy season we have some difficulty in getting wagons.

Dr. Matthai.—It has not inconvenienced you to any great extent?

Mr. Bawaney.—We were inconvenienced when we were getting our supplies by rail but at present we are not getting by rail. There was difficulty as regards the supply of cranes also. The Burma Railways have not got cranes at all stations and when bringing wood down we could not get cranes. We had to wait till it had finished one station then it came to another and so on to us.

Other Raw Materials.

President.—I want to know whether there is any big organization which deals in most of the principal raw materials or do you have to buy them from different countries and different firms? Are any of these materials controlled by the Swedish combine?

Mr. Bawaney.—The Swedish combine tried to corner certain of the materials, they did not succeed but the result was a rise in prices.

President.—In the list that you have given us of the other raw materials I do not find any reference to Sweden except in connection with blue match paper and red match paper?

Mr. Bawaney.—The reason why their name does not appear in connection with other raw materials is that they themselves do not produce these. What happens is that they supply 50 per cent. of the matches required all the world over and they tried to corner these materials wherever they were produced. In France, for instance, they began to purchase Amorphous Phosphorus and in Germany Chlorate of Potash and tried to corner these because they can afford to purchase their requirements of a whole year at one time.

President.—In these various articles that you have mentioned are there any which are only used in the manufacture of matches?

Mr. Bawaney.—Amorphous Phosphorus.

President.—Are you sure that it is not used for anything else?

Mr. Bawaney.—So far as I am aware it is not used in any other industry.

President.—Where is it prepared?

Mr. Bawaney.—In France but now it is also being manufactured in Great Britain, Germany and Japan.

President.—What is it made of?

Mr. Bawaney.—From bones.

President.—Has anybody got such control over any of these articles that unless you buy it from him the manufacture of matches would be stopped?

Mr. Bawaney.—No.

President.—It may be that this phosphorus is used only in the manufacture of matches and that somebody has got more experience and can manufacture it cheaper than other people, but you do not suggest, that it is manufactured only by one particular firm or one particular country?

Mr. Bawaney.—No.

President.—These other articles are used for other purposes also?

Mr. Bawaney.—Yes.

President.—So that there cannot be much cornering in these?

Mr. Bawaney.—No.

President.—We asked you for prices you do not tell to what year these prices refer. In what year did you buy these articles?

Mr. Bawaney.—If you want figures for each year with dates we will give it. What we have given you are the minimum and maximum prices from 1924 to 1926.

President.—Give us the most recent and the earliest year, say, 1924. Give us also the rate of exchange. For the earlier period you may have to give Indian exchange because in 1924 it had not stabilized at 1*s.* 6*d.* From 1925 you may assume the exchange at 1*s.* 6*d.* You have given prices in *yen;* you must convert them into rupees. We do not know what this 100 *kins* amounts to and what are catties?

Mr. Bawaney.—We will convert these into rupees and send you a fresh statement.*

Dr. Matthai.—The figures that you give in Statement A in the last column are all in lbs. that is to say if you take a thing like Antimony Trisulphide for which you give a quotation in Statement B per 100 Kg. do you convert it into lbs. here in Statement A?

Mr. Bawaney.—Yes.

President.—What we want is the price per ton or lb. or whatever unit you use for purchasing; that is as regards statement B. As regards A we want the total value; take Amorphous Phosphorus for instance. You must give the total for a particular year. Give us the figure for three periods, for the year 1924, then the complete year 1926 and then your latest quotation. You can give figures for the whole calendar year January to December.

Mr. Bawaney.—We shall let you have it.*

President.—In statement A what I want to find out is the total value. There are two things we want to ascertain: the duty you pay to Government on these materials and the amount you consume.

Mr. Mathias.—Can you tell me why you get your glass powder from Germany instead of powdering it here?

Mr. Bawaney.—The quantity we require is not big and for a small quantity the cost of powdering it here will be higher.

Mr. Mathias.—Your biggest item in materials is paraffin wax. Can't you get it in Burma? I should have thought that in a place like Burma you ought to be able to get it locally.

Mr. Rashid.—The B. O. C. and the I. B. P. are generally manufacturing the paraffin wax at a melting point of 130 degrees suitable for making candles. What we require is a melting point of 108 degrees and we find it cheaper to import.

---

* Supplementary Statement No. 10.

Dr. Matthai.—They do make it, but you find it more expensive.

Mr. Rashid.—They generally make a higher grade.

Dr. Matthai.—They can make the quality you want.

Mr. Rashid.—Yes.

Mr. Mathias.—Why do you buy Japanese iron oxide when you can buy it here?

Mr. Rashid.—We have not made proper enquiries in India. We have not gone into the question very carefully.

Dr. Matthai.—I find in the representation that we have had from another match factory in Rangoon they seem to get their glass powder, glue and paraffin from India.

Mr. Rashid.—The glue is not properly refined and we find the imported article suitable for our purpose.

Dr. Matthai.—You have not considered the question very fully.

Mr. Rashid.—We have not gone deeply into the matter.

President.—I wish to know whether in making use of these chemicals, you use the ordinary formula or have you made any special formula of your own.

Mr. Rashid.—We have made a special formula of our own.

President.—I do not wish to know your formula, but what I wish to know is wherever you make an alternation in the formula, can you give me the reason for it?

Mr. Rashid.—We make an alteration when we receive a consignment of any chemicals different from what received before. For instance our formula calls for one lb. of manganese dioxide, to contain so much of manganese and so much of oxygen. After receiving the consignment instead of 98 per cent. of manganese dioxide, it contains 55 per cent. So inevitably we should have to take instead of 1 lb. and 12 ounces.

President.—There are two things. The first thing is the wood. The second thing is the climatic consideration. As regards the wood did you have to make any serious alteration in the usual formula?

Mr. Rashid.—No. We don't have to make any alteration as regards the wood.

President.—In your chemical composition?

Mr. Rashid.—The different qualities of wood do not affect the chemical composition.

President.—As regards the climate?

Mr. Rashid.—We find that our climate is rather damp and so we have to make some special compositon that will resist the atmospheric influence.

President.—You want to make the glue a little more waterproof.

Mr. Rashid.—*Yes.*

President.—For that reason you have got to make your own formula.

Mr. Rashid.—Yes, it is generally not known to all chemists. We have had to make some researches and formulate a certain recipe.

President.—Do you have to go on altering your formula according to the weather or what do you do?

Mr. Rashid.—Once having made a formula, we don't have to alter the formula, but we have to alter the percentage of different chemicals when they are of different strength.

President.—If you have got the chemicals of the same strength, then you won't make any alteration.

Mr. Rashid.—No.

President.—Do you use the same formula throughout the year?

Mr. Rashid.—We make uniform chemical composition throughout the year, but during the dry weather we make it a little less damp proof.

President.—I understand that you had some training in America.

Mr. Rashid.—Yes.

President.—Were you in a match factory?

Mr. Rashid.—I studied chemistry and specialised in match making, tanning etc.

President.—What I wish to know is, is there any process connected with the raw materials which is of special difficulty as regards India?

Mr. Rashid.—I don't think so. There is no difficulty at all in India in the matter of composition.

President.—It has been claimed that foreign matches are superior, because the composition is better, the heads remain in good condition longer and they strike better.

Mr. Rashid.—I don't quite agree with that information, because I find that India has all the materials that we require. For instance I am under the impression that Burma contains the largest deposit of zinc and lead in the world. These are exported to different countries now.

President.—I am not talking of the minerals just now. What I am talking of is the process. In the process of manufacturing matches so far as chemicals are concerned, is there any difficulty experienced in India which you have to get over?

Mr. Rashid.—The only difficulty the Indian manufacturer experiences is in making a damp proof composition, but those who understand how to make damp proof composition are not likely to have any difficulty whatsoever.

Mr. Mathias.—You understand how to make damp proof composition.

Mr. Rashid.—I am supposed to know that.

Dr. Matthai.—That is largely a question of glue.

Mr. Rashid.—Yes.

President.—You keep the glue in the proper state of consistency.

Mr. Rashid.—In the proper state of specific gravity and also we add to it a certain chemical which is both soluble in spirit and also in water so that when it dries, it takes a coating of damp proof surface. Chlorate of potash when it is exposed to moist air absorbs water from the atmosphere. In order to prevent that, we have to devise some means of making a suitable glue. Glue must receive some water proof coating in order to resist the atmospheric influence.

Dr. Matthai.—You have a laboratory in your factory.

Mr. Rashid.—Yes.

President.—Do you mean to say that you have discovered the process of making the composition?

Mr. Rashid.—Practically so.

Dr. Matthai.—Have you got any assistants in your laboratory?

Mr. Rashid.—Yes, 2 assistants.

Dr. Matthai.—Are they chemists locally trained?

Mr. Rashid.—They have been employed here locally and I have trained them.

Dr. Matthai.—Did you have any training in chemistry before you went to America?

Mr. Rashid.—No.

Dr. Matthai.—How many years were you there?

Mr. Rashid.—4 years.

Dr. Matthai.—After your training in the University, you went into a match factory.

Mr. Rashid.—No. I was engaged by Mr. Jemal in the research work of mining.

Dr. Matthai.—Where was that?

Mr. Rashid.—In different places.

Dr. Matthai.—How long have you had practical experience in chemistry?

Mr. Rashid.—4 years in all.

President.—About impregnating matches, it is claimed that Indian matches glow too much. That is a defect. As regards that have you succeeded in getting over the difficulty?

Mr. Rashid.—Without impregnation it will glow, but after properly impregnating I find that our wood is better than aspen or (pine) of foreign countries. I find that Swedish woods do not absorb the chemicals so much as the wood of Burma.

President.—Which wood do you mean?

Mr. Rashid.—I mean sawbya or any wood of Burma. When we impregnate them the heads do not break.

President.—It takes in more chemical.

Mr. Rashid.—Yes, it gets strongly impregnated. If we want the splints impregnated, we can use a little more impregnating solution and make it stronger and it will never glow.

Mr. Mathias.—If you impregnate too much.

Mr. Rashid.—If you impregnate too much, it would not burn at all.

President.—Have you discovered the proper formula for that?

Mr. Rashid.—Yes, we have given you samples.

President.—You don't say on the labels that you have impregnated the matches.

Mr. Rashid.—We don't sell impregnated matches. I think there is not much demand for it. I have not received any instructions to make impregnated splints.

President.—Does it add very much to the cost?

Mr. Rashid.—The impregnation does not cost much.

President.—Does it delay the process?

Mr. Rashid.—Very little, but we have to make an arrangement so that it won't be delayed.

President.—At what stage do you impregnate?

Mr. Rashid.—Between chopping and drying. Immediately we chop the splints in wet condition we soak them in the impregnating solution and dry them.

Mr. Mathias.—You have an impregnating tank.

Mr. Rashid.—Yes.

Dr. Matthai.—Can you say approximately how much it increases the cost?

Mr. Rashid.—As. 6 per 50 gross.

President.—There are certain articles here which may be hereafter manufactured in the country, such as printing ink, printing paper, match paper and so on if there was a bigger demand.

Mr. Rashid.—We have not gone deeply into the matter of making our own chemicals here and if we go into this matter, there will be no difficulty in getting all the chemicals, as for instance zinc oxide, lead oxide and manganese dioxide.

President.—Nobody is going to start the manufacture of chemicals merely for the match industry. These chemicals are used in many other industries and it is only when the demand for them increases, they can be manufactured in the country.

Mr. Rashid.—Nobody has taken up this matter, otherwise there is a demand for these chemicals both for painting and match works.

President.—In connection with the Match industry after all the quantity required is very small and it is not worth while going into the question as to whether we should manufacture chemicals or not. Is it not generally true

that in most countries where matches are manufactured, they don't produce all the chemicals?

Mr. Rashid.—I am not sure about that.

President.—Take the case of Sweden. Does it produce all the chemicals?

Mr. Rashid.—Yes.

President.—Does it manufacture all the chemicals in the country?

Mr. Rashid.—Yes.

President.—Our information is rather different.

Mr. Rashid.—Japanese do not import anything. It depends upon the prices. We don't have to import paraffin, but we find if somebody sells paraffin one pie cheaper, we buy. Generally speaking we should have no difficulty in getting all the materials required in India. The question of prices is the chief thing of which I am not quite sure.

Dr. Matthai.—When you sell matches locally in Burma, you enclose them in zinc sheets.

Mr. Rashid.—Zinc sheet tins. We line the case inside with zinc sheets.

Dr. Matthai.—The wooden case you use for export—I am talking of matches sold in Burma. How are they packed?

Mr. Rashid.—That is encased in a zinc case and six of these cases may be packed in each wooden case.

President.—In Burma I understand that you simply sell in zinc cases. In India you have a big wooden packing case which is lined with zinc sheets.

Mr. Rashid.—Yes.

President.—In Burma you will probably have to use more zinc.

Mr. Rashid.—Yes.

President.—In India you have zinc and packing case. Would it very nearly cost the same?

Mr. Rashid.—Yes, it comes to practically the same thing, because we pay more freight. The cost of the zinc in the zinc tin and the cost of the wood in the wood case counterbalance each other.

Mr. Mathias.—Why can't you use tin plates instead of zinc plates? What is the reason?

Mr. Rashid.—I cannot give any reason except that all have been using that article to make cases air tight.

Mr. Mathias.—Is there any chemical reason why tinplate is not used?

Mr. Rashid.—Tinplate gets more easily oxidised. Tinplate is steel coated with tin. It gets rusty. The zinc sheet won't corrode.

Mr. Mathias.—These tins are required to be kept for long periods.

Mr. Rashid.—Yes.

Labour.

President.—As regards the general conditions of labour in Burma in most industrial concerns, in the bigger towns at any rate, more Indian labour is employed than Burmans?

Mr. Bawaney.—That is so.

President.—For the more strenuous forms of labour, it is not easy to obtain Burmans.

Mr. Bawaney.—That is so.

President.—That is as regards factory labour. But as regards other labour—for instance in the fields and in the forests—you employ Burman labour.

Mr. Bawaney.—That is so.

President.—In your factory I noticed that there were quite a large number of Burmese women.

Mr. Bawaney.—Yes.

President.—What I wish to understand is—have you got these Burmese women on your regular staff or are they doing work by the piece.

Mr. Bawaney.—They are paid so much per unit. About 10 per cent. of the Burmese employees are salaried employees and others are employed on the contract basis.

President.—Taking the whole labour together, what percentage would be your regular staff?

Mr. Bawaney.—About 55 per cent.

President.—The remaining 45 per cent. would largely consist of Burmese women.

Mr. Bawaney.—Yes.

President.—In the other 55 per cent. how many per cent. would be Burmans?

Mr. Bawaney.—In the proportion of about 45 Indians to 10 Burmans.

President.—In what form of labour or in what class of work do you employ Burmans?

Mr. Bawaney.—Mostly on light work such as box filling, labelling, box making machines, etc.

President.—That work can be done by women.

Mr. Bawaney.—Yes.

President.—Do you employ a man for the same sort of work as can be done by a woman?

Mr. Bawaney.—Yes.

President.—You don't employ Burmans for any strenuous work.

Mr. Bawaney.—For heavy work, we don't employ Burmans. They cannot manage the work. They get tired soon.

President.—From what parts of India, do you get Indian labour?

Mr. Bawaney.—From Madras, Orissa, and Central India.

President.—By Central India, do you mean the Central Provinces?

Mr. Bawaney.—The United Provinces and the Central Provinces.

President.—I suppose for mechanical work, you have to get men from the United Provinces.

Mr. Bawaney.—Yes, especially on the frame filling work. On the peeling work, we employ people from Orissa.

President.—Is peeling work more strenuous?

Mr. Bawaney.—The frame filling work is also equally strenuous.

Dr. Matthai.—How many skilled labourers you have in all?

Mr. Bawaney.—I should like a better definition of skilled work before I can reply to that question.

Dr. Matthai.—Is there any kind of work in your factory for which it would be impossible for you to recruit a raw hand?

Mr. Bawaney.—A new man can do the work but he won't be efficient.

Dr. Matthai.—How many people are employed on the machines?

Mr. Bawaney.—About 75 per cent. of the salaried employees.

Dr. Matthai.—They must be fairly skilled.

Mr. Bawaney.—They require some knowledge and practice of the work.

President.—Is there any process in the manufacture of matches where really skilled labour and long training are necessary? It is purely mechanical. It is more practice than anything else.

Mr. Bawaney.—On all machines, the more experience a man has, the more efficient he is.

President.—It is all repetition work. One man does not have to attend to half a dozen machines simultaneously.

Mr. Bawaney.—They are to learn only about the machine which they attend to.

President.—One particular workman would attend to one machine and one particular part of it, is not that so?

Mr. Bawaney.—Yes.

President.—So that the training required will not be either long or difficult.

Mr. Bawaney.—No. They have to know everything about the machine which they are working. They must know how to set the machine otherwise the work would not be done properly.

Dr. Matthai.—Generally it is true, is it not, that the match machinery is more automatic than other machinery?

Mr. Bawaney.—Yes.

Dr. Matthai.—This particular kind of machinery—Roller's Machinery—is simpler than any other match machinery.

Mr. Bawaney.—Yes.

Mr. Mathias.—Do you find the Burmese labour particularly adept in those kinds of work which require delicate or rapid handling?

Mr. Bawaney.—Yes.

President.—Especially the women?

Mr. Bawaney.—Yes, they can do better the kind of work which requires delicate hands to do.

President.—When you say that they must know how to set up the machinery, what do you mean?

Mr. Bawaney.—They must know how to feed the machine. The mechanical portion of the work is done by the fitter.

Mr. Mathias.—That is a matter which is easily learnt.

Mr. Bawaney.—Yes. They have to keep their eyes on three or four places. They must know how to handle the machine. If the paper is not being fed properly and if a man goes and attends to that, the veneer may go wrong in the meantime. He must have a quick eye to attend to all these things. It requires some experience.

President.—The machine is easily stopped.

Mr. Bawaney.—Yes.

President.—So, there is no difficulty as regards that.

Mr. Bawaney.—Quite.

President.—He has not got to do anything whilst the machine is in motion. The machine can be immediately stopped, if necessary.

Mr. Bawaney.—When the girl is a new hand, the fitter shows her how to set it right if anything goes wrong but when she is properly instructed, she can attend to the machine herself when the machine is in motion.

Wastage of material.

President.—At the beginning, what sort of wastage took place, what was your difficulty? We will start from peeling. What I want to know is this. Supposing you have untrained labour what would happen in the matter of peeling?

Mr. Bawaney.—If the machine is not properly set, the veneer would not be smooth and even. The thickness would vary.

President.—The knife would be set by somebody who understands that and not by the man who attends to the machine.

Mr. Bawaney.—The operator has to attend to that because the knife moves away every now and then.

President.—Don't you have a mechanic to attend to that?

Mr. Bawaney.—It does not require a mechanic to attend to that. The only mechanical knowledge required is how to set the pressure bar. There are screws by which it can be set. There are knives which cut grooves and if these are not properly set, the grooves won't be cut.

President.—Did you have much difficulty in training the men?

Mr. Bawaney.—No.

President.—On what part of the process you found the greatest difficulty in training your labour?

Mr. Bawaney.—In the packeting machine and box making machine.

President.—What do you mean by packeting machine?

Mr. Bawaney.—The machine in which packets are made. As regards box making, we had, in the beginning, a wastage of about 40 per cent. in making the inner and outer portions of boxes.

President.—Owing to what?

Mr. Bawaney.—Sometimes the paper would be on one side. Sometimes the paper would not be properly pasted. Instead of folding it in one way, they would fold it in the wrong way. In that case, the veneer would break. Sometimes the paste would not be sufficient for paper to stick. For 40 machines we cannot have as many fitters. We have two fitters. If while they are engaged a machine goes wrong, that machine has to be stopped.

President.—Do you mean to say that 40 per cent. of the boxes that came out of the machines were useless?

Mr. Bawaney.—Yes, in the beginning.

President.—What is the wastage now?

Mr. Bawaney.—About 15 to 18 per cent.

President.—What ought to be the wastage?

Mr. Bawaney.—It should not be even 5 per cent. if the workmen know their work properly.

President.—Do you expect to reach that?

Mr. Bawaney.—Yes. Day by day our workmen are getting better. The output also increases and the wastage decreases.

Wages.

President.—As regards wages what you say is not very clear. You say males earn on the average Re. 1-4-0 and the females Re. 1. Do you pay them by the piece?

Mr. Bawaney.—Most of the women are piece workers and their average earnings come to about Re. 1 a day.

President.—You have about 25 working days in the month?

Mr. Bawaney.—Yes.

President.—Do you get them to work for 25 days in the month?

Mr. Bawaney.—On the average 22 days a month. They attend *pwes* and so on now and then and when they have money in hand they get indolent and are not very regular in their attendance. We have therefore to employ 600 women where we can do with 500 only.

Mr. Mathias.—How much can a really clever girl make by piece work a day?

Mr. Bawaney.—One by way of inducement to produce more work we had a competition and distributed a gold and a silver medal to the best girls and at that time one girl made Rs. 7 and the second girl Rs. 5.

President.—Afterwards did you find any such results?

Mr. Bawaney.—They cannot sustain their efforts. They come at 10 A.M. and go at about 4 P.M. and their habit is to waste time in smoking and gossiping.

Dr. Matthai.—If you work to capacity would it be necessary for you to increase your labour proportionately?

Mr. Bawaney.—Only in the hand filling department we will have to increase the labour.

Dr. Matthai.—Can you tell me approximately how much increase that would mean in the labour that you employ.

Mr. Bawaney.—An increase of about 100 girls per day and 2 to 3 per cent. in the other labour.

Dr. Matthai.—So that it would really mean a very small addition to your present labour?

Mr. Bawaney.—That is so.

Dr. Matthai.—Are you familiar with the match industry in Japan?

Mr. Bawaney.—I went there in 1914 and am acquainted with the conditions which then existed.

Dr. Matthai.—In 1914 when you were there, most of the work was done by women in the factories there?

Mr. Bawaney.—Yes.

Dr. Matthai.—You employ more men than women here, don't you?

Mr. Bawaney.—Yes we can only have the lighter work done by women here.

President.—If you did everything by machinery how many men would you require?

Mr. Bawaney.—We can make a reduction of 500 men.

President.—But when you say you employ 1,500 men and you pay them by the piece, that does not really represent 1,500 at all because some of them may work two hours a day or less.

Mr. Bawaney.—Those who work on the machines have to attend 10 hours a day but those who do hand filling work can go at any time.

President.—How many are these?

Mr. Bawaney.—500 women.

President.—Do you pay them all by the piece?

Mr. Bawaney.—Yes.

President.—In all the departments?

Mr. Bawaney.—In Labelling Department by the basketful. If they label so many basketful of packets we pay them so much. We have got an approximate idea of how many boxes of full size and $\frac{3}{4}$th size or half size a basket will contain and we pay accordingly.

Mr. Mathias.—You say you employ no child labour; is it because you find it unremunerative or what?

Mr. Bawaney.—We do not like child labour so long as we can get female workers because we have not got proper arrangements for accommodating them and because we have no work which we can leave to the children. The women are more efficient, and they can attend to this kind of work better.

President.—From what you say I take it that two-thirds of the work is done by machinery and one-third by hand?

Mr. Bawaney.—That is correct.

President.—And for this one-third you do not use machinery because you find manual labour cheaper than machinery?

Mr. Bawaney.—We find work done by women labour more satisfactory. Hand filling is better than filling by machinery.

President.—In what way is it better?

Mr. Bawaney.—If the dipping had been done on the simplex automatic machine then heads would be uniform and the sticks also would be uniform and then the automatic box filling machine would work properly. But our dipping

is done by hand so the heads are not uniform so that if the work is done by machine the heads will sometimes stick together or the sticks will be broken.

President.—But you have automatic dipping machines too?

Mr. Bawaney.—Yes. When we dip matches in the simplex automatic machine we also use the automatic filling machine.

President.—You want to get rid of the hand filling machines and get automatic machines, don't you?

Mr. Bawaney.—We are going to try the simplex machines for one year and if we find it better then we will do away with the hand filling machines. We have not tried it long enough to decide what process to adopt.

President.—Do you mean to say that in Europe a lot of hand filling is done?

Mr. Bawaney.—I heard from Mr. Littorin that hand filling is done in Sweden and that there they have been doing it from generation to generation and are so expert that they can do as many as 50 gross a day.

President.—How much do your workmen do?

Mr. Bawaney.—7 to 10 gross, but here labour is cheaper than in Sweden.

President.—It does not matter to you at all because if she only does 7 gross you pay her only for 7 gross?

Mr. Bawaney.—If they all become experts they can do more filling work, and rates would be reduced. Here we are paying now on the basis that they might get a rupee a day.

President.—That may be one of the reasons why they are not putting in as much work as they would otherwise do.

Mr. Bawaney.—I do not think that is the reason because they have really become more expert now. Formerly their average was 5 gross, now-a-days some can put in as much as 10 gross.

President.—How do you work out these figures of Re. 1-4-0 and Re. 1. How much do you pay per gross?

Mr. Bawaney.—We pay 12 annas per tin of 8 gross, that is an anna and a half per gross.

President.—That is for filling?

Mr. Bawaney.—Yes. When they do about 10 gross they earn about a rupee.

President.—How does the man earn Re. 1-4-0?

Mr. Bawaney.—We have drawn up an average of all classes of male labour, that makes Re. 1-4-0 a day.

President.—Then their wages are not apparently higher than in India?

Mr. Bawaney.—I have heard that in India the minimum is 8 to 9 annas. I think Tatas are paying that.

President.—That is purely cooly labour, not factory labour. Your wages do not appear to be very much higher than the corresponding wages in India?

Mr. Bawaney.—Mr. Sen has also calculated on the same basis.

President.—He may have done so, but in our enquiry we have not come across such low wages.

Mr. Bawaney.—Mr. Troup also did the same.

President.—Mr. Troup might have been right in 1909-1910. I don't think we have come across such low wages for factory labour as that.

Welfare.

Now as regards the welfare of labour, you don't have any doctor or anybody in attendance in the factory during the day.

Mr. Bawaney.—We have one doctor there.

President.—Does he move about the works during the day to see if there is any accident?

Mr. Bawaney.—He is always in attendance there. If there is any accident, the case is attended to immediately by the doctor.

President.—Is he a qualified medical practitioner?

Mr. Bawaney.—I don't think he has any medical degree, but he has worked as hospital assistant.

Mr. Mathias.—That is as a compounder.

Mr. Bawaney.—Yes.

Mr. Mathias.—I understood you to say that your medical officer had no medical qualifications.

Mr. Bawaney.—I don't know.

Mr. Mathias.—If he has no qualification he cannot be a sub-assistant surgeon.

President.—What is his pay?

Mr. Bawaney.—Rs. 75. In case of any serious accident, we send the man to the hospital.

President.—Are accidents frequent?

Mr. Bawaney.—No.

President.—What sort of accidents do you have?

Mr. Bawaney.—Sometimes the hand or face gets burnt.

President.—Have you had any fatal accidents in your works?

Mr. Bawaney.—No. There was only one case and that was a man who died of electric shock. That was the time when he was not on duty. He was feeling hot and wanted to have a fan. That was the only accident. But most of the work in the factory is light.

President.—In the result do you consider that your labour is fairly well trained or do you expect to train it much better?

Mr. Bawaney.—We don't think our labourers are quite all right. We expect to get some better improvement.

President.—Do you have much absenteeism?

Mr. Bawaney.—Not among the salaried employees.

Mr. Mathias.—Is the labour resident or do you have constant changes?

Mr. Bawaney.—Most of them are practically residents of Burma. The Indians have practically settled down and the Burman labourers come from nearly 8 villages round about.

Mr. Mathias.—Is the supply of labour pretty constant?

Mr. Bawaney.—Yes.

Power.

President.—How is your machinery run?

Mr. Bawaney.—It is run by electricity.

President.—All the machines are worked by electricity?

Mr. Bawaney.—Yes, almost all.

President.—You obtain your power from the Rangoon Electric Tramway Company.

Mr. Bawaney.—Yes.

President.—You have said that the rate is ·8 of an anna per unit. Is that a flat rate or does it depend on the amount of electricity you take?

Mr. Bawaney.—Formerly it was on a sliding scale. Now it is a flat rate.

Dr. Matthai.—That is to say if you increase your output considerably and expend more electrical energy you are not likely to get a reduction in rate?

Mr. Bawaney.—Not now. Formerly we got a reduction.

Mr. Mathias.—Is the flat rate applicable for other factories as well as yours?

Mr. Bawaney.—I don't know of any other factory using the current from the Rangoon Electric Tramway Company.

President.—What is your present total consumption of electricity in a year?

Mr. Bawaney.—Besides the payment for current, we have to pay for the motor at the rate of Rs. 5 per horse power. Calculating the two, it comes to anna 1·6.

President.—You have got to pay so much per horse power.

Mr. Bawaney.—So much per horse power for the motors employed, *plus* ·8 per unit for the consumption of electricity.

Dr. Matthai.—As. 1·6 per unit.

Mr. Bawaney.—Yes. For 100 gross it comes to Rs. 2-12-0.

Dr. Matthai.—The figure that you have given here includes both the flat rate and the special rate charged for your motors.

Mr. Bawaney.—Yes.

Dr. Matthai.—What I want to get at is this. Taking your last year's output you have apparently consumed 30,000 units of electricity. When you attain your full capacity, you will consume twice as much or at any rate considerably more. Have you made any enquiries with the electric supply company here as to possible reductions that they might make on rate if you use more current?

Mr. Bawaney.—We have not made any enquiries, but they have made a recent reduction from one anna a unit to ·8 anna a unit.

Dr. Matthai.—When you started your operations, you paid one anna a unit.

Mr. Bawaney.—It was even more than one anna.

Dr. Matthai.—What was it?

Mr. Bawaney.—It was on a sliding scale.

President.—Did they charge also per horse power then?

Mr. Bawaney.—Yes.

President.—What was the idea of charging per horse power? Are they your motors or theirs?

Mr. Bawaney.—Our motors. The idea is this. When we tell them that we are going to employ motors of so many horse power they have to make all the arrangements and keep the energy ready at their station to supply so many horse power whether we use it or not. So they charge so much per horse power and afterwards so much per unit consumed. If we begin working all our machines and they have not got their energy, we will have to stop.

Mr. Mathias.—It is calculated to cover out of pocket expenses when you are not working.

Mr. Bawaney.—Yes.

President.—I take it that you are getting 5,000 gross per day only when all your machines are working.

Mr. Bawaney.—Yes.

President.—So that your getting 6,000 gross per day would not necessarily mean any increase in your charges. It will simply mean getting more outturn.

Mr. Bawaney.—Possibly.

Dr. Matthai.—You can get your increased output by working your machinery at the same pace.

Mr. Bawaney.—Even if the output be increased, the increase in expenses would not be in the same proportion.

President.—At present your output is less because there is so much wastage. In the wastage also the same amount of power is consumed, is it not? Why should your charges for power increase at all?

Mr. Bawaney.—All the increase would not be the increase out of the savings in the wastage of the material, but what sometimes happens is that machines have to be stopped on account of the inefficiency of the girl or man attending to the machine and when they become more efficient, these machines would be working whole time and so there would be more energy consumed. The saving in power would only be in proportion to the less wastage that we have on account of the better efficiency of our workmen.

President.—You have already attained 5,000 gross. You want to get up to 6,000 gross.

Mr. Bawaney.—Yes.

President.—That is an increase of 20 per cent.

Mr. Bawaney.—Yes.

President.—Your wastage is now 18 per cent. You want to get down to 5 per cent. 13 per cent. out of the 20 per cent. will come out of the wastage.

Mr. Bawaney.—12 per cent. would only be the saving out of the wastage and the other 8 per cent. would come out of the consumption of more energy.

President.—Did you adopt electricity as motive power after examining the cost or simply adopted it because you found it more convenient? Did you try to find out whether there was any other method by which you could get the same result?

Mr. Bawaney.—We went into the figures and we found that electricity would cost a little more in money than any other form of power. But we found that it would be more convenient and we didn't consider that the extra cost was not justified on account of the better convenience.

Dr. Matthai.—The cost of power is a very small part of the cost of making matches.

Mr. Bawaney.—That is also true.

Fuel.

President.—As regards fuel, you require fuel chiefly for creating steam.

Mr. Bawaney.—We require steam for heating the drying machines.

President.—And also to boil the wood.

Mr. Bawaney.—Yes. We do not require all our wood to be boiled, but we have to boil certain kinds especially those which have got juice.

President.—That is all that you require.

Mr. Bawaney.—Yes.

President.—That I understand you find from your waste wood.

Mr. Bawaney.—Yes, at present.

Dr. Matthai.—Did you ever have to get wood fuel from outside?

Mr. Bawaney.—Up to the end of October, 1926, we were using paddy husks also.

Dr. Matthai.—When you get wood fuel, you never get it in the form of saw dust.

Mr. Bawaney.—No.

Dr. Matthai.—Have you any information that if anybody wanted saw dust for fuel in Rangoon, what would be the cost?

Mr. Bawaney.—We made enquiries about that but I am not quite certain just now. I think that it costs Rs. 8 per 100 bags.

Dr. Matthai.—That is, if you are situated near a saw mill or anywhere in Rangoon?

Mr. Bawaney.—If we are situated near a saw mill, it would be more economical to use saw dust. We require twice the quantity of paddy husk.

Dr. Matthai.—Then, it would be an advantage if a match factory in Rangoon were near a saw mill.

Mr. Bawaney.—In Rangoon, the cost would be about the same.

Mr. Mathias.—After you have utilised your waste wood for making steam and so on, have you any scrap left over?

Mr. Bawaney.—For the last two or three months, we have some surplus left but we think that it would all be used up in the rainy season.

Mr. Mathias.—Do you sell it?

Mr. Bawaney.—We don't.

President.—How much burning fuel do you get out of waste?

Mr. Bawaney.—We have not calculated that.

President.—We cannot in that case calculate at all what your fuel costs.

Mr. Bawaney.—If we really require wood for fuel, we would not use this wood. As we are getting this for nothing, we are using it as fuel. It has very little heating power. For fuel we have other varieties.

President.—Including your electric power the cost per 100 gross of boxes comes to about nearly two annas. What is your total electric bill?

Mr. Bawaney.—Rs. 3,000 to Rs. 3,200 a month.

Continued on Thursday the 24th March, 1927.

Market.

President.—You have given your estimate of the extent of the market as 14 million gross boxes.

Mr. Bawaney.—Yes.

President.—I suppose that you have taken it from the import figures.

Mr. Bawaney.—Yes.

President.—How have you calculated the production of matches in India? Nearly 8 million gross boxes are imported. Then, it is claimed that Bombay manufactures about 4 million gross and you manufacture about a million gross, the total being 13 million gross boxes. There are quite a large number of factories in the country, so that it must be more than 14 millions.

Mr. Mathias.—Before the specific duty was raised from twelve annas to Rs. 1-8-0, the total imports were as high as 18 million gross of boxes.

Dr. Matthai.—In 1915-16 the figure was 18 millions.

President.—That may perhaps partly be explained by the fact that matches were sent to the Expeditionary Forces. Before the war, it was 15 millions. Burma alone is manufacturing at present about 2 million gross, including yourself, the Swedish firm and the other two small factories. Thus, Bombay and Burma together with the imports account for 14 millions. There is the rest of India.

Mr. Bawaney.—The consumption may be more, but we have no reliable figures, other than the import figures.

President.—I am trying to find out whether any real attempt has been made to estimate the extent of the market.

Mr. Bawaney.—We have not gone deeply into the matter.

President.—Do you make any special attempt to popularise your matches or how do you expect to increase your market?

Mr. Bawaney.—We have appointed agents everywhere and there are canvassers under them.

President.—Have you got agents who are selling your matches only and not any other matches?

Mr. Bawaney.—Our agents would not deal with matches of other manufacturers.

President.—The foreign manufacturer may send out his man with the best matches who may say "look at the Indian matches, they are bad and I will

sell you the matches I have brought at the same price." Do you do anything of that sort?

Mr. Bawaney.—We do our best to popularise our matches.

President.—Do you have to sell your matches on commission?

Mr. Bawaney.—Yes. We have also many branches.

President.—That is to say, you have paid agents.

Mr. Bawaney.—We have got our own offices with our own staff.

Dr. Matthai.—Do you mean that you have paid agents for all the businesses that you are doing?

Mr. Bawaney.—We have only for matches.

President.—In how many places have you got agents?

Mr. Bawaney.—In nine places, *viz.*, Calcutta, Cochin, Madras, Calicut, Mandalay, Thazi, Bassein, Prome and Henzada.

President.—You have your own agents in all those places to look after the match business?

Mr. Bawaney.—Yes.

President.—When you sell on commission, how much commission do you have to allow?

Mr. Bawaney.—We have not got a flat rate of commission.

President.—On an average how much would you have to pay?

Mr. Bawaney.—About Rs. 4-8-0 per 50 gross.

President.—That is about 1¼ annas per gross.

Mr. Bawaney.—Yes.

Mr. Mathias.—Do you sell your matches in Calcutta?

Mr. Bawaney.—We do.

Mr. Mathias.—Are they on sale at Calcutta.

Mr. Bawaney.—We despatch about 200 cases a month to Calcutta.

Dr. Matthai.—Have you any idea whether they are sold in Calcutta or in the moffusil?

Mr. Bawaney.—At present it is only in Calcutta and not in the surrounding districts.

Dr. Matthai.—Out in India, you generally deal at the ports.

Mr. Bawaney.—The fact is that we have branches in very many places. The people at the ports send our matches to the surrounding locality.

Dr. Matthai.—The agents are stationed at the ports.

Mr. Bawaney.—Yes. They send out canvassers to tour round the neighbouring districts by rail.

Mr. Mathias.—Is there any difficulty in selling your matches?

Mr. Bawaney.—For the last six months we have been able to sell all our production.

President.—Though the output has increased a lot?

Mr. Bawaney.—Yes.

Mr. Mathias.—You have got your own sales organisation.

Mr. Bawaney.—Yes.

President.—What I wish to know is what percentage you sell in Burma and what you export?

Mr. Bawaney.—If we take the average for the last six months, 50 per cent. is sold in Burma and 50 per cent. is exported to India.

President.—Do you get a better price in India than in Burma?

Mr. Bawaney.—We realise as a matter of fact a little less in India because our charges are higher there.

President.—What is the difference in the nett prices you get in India and Burma? Do you export only half sizes?

Mr. Bawaney.—We export to India both half and full. For the half sizes we realize Rs. 1-3-0 per gross. For the full size the price we have given is an average, that is Rs. 1-8-0.

President.—What do you get in Burma?

Mr. Bawaney.—Rs. 1-9-0 in Burma and Rs. 1-7-0 in India.

President.—Would that pay for your freight and landing charges?

Mr. Bawaney.—Yes.

President.—What about Swedish matches. Would they sell at about the same price?

Mr. Bawaney.—What they manufacture here from indigenous wood they sell at Rs. 1-4-0 per gross while we sell at Rs. 1-9-0. What they manufacture here are not quite as good as our matches.

Dr. Matthai.—I have heard it suggested that the reason why you charge a lower price in India is that you experience more competition in India from the Swedish Match Company?

Mr. Bawaney.—That is so. Within the last six months they have reduced their price by about 4 annas per gross, by reducing their prices every month by one anna, one anna and a half and so on.

President.—Have they done the same here?

Mr. Bawaney.—They have done the same but their quality not being good they cannot stop our sale here. People are more satisfied with their imported matches than their matches made from indigenous wood.

President.—They also import wood, do they not?

Mr. Bawaney.—Yes, and the matches manufactured from imported wood they are selling at Rs. 1-8-0.

President.—I take it all the imported Swedish matches are imported by the Kemmendine Match Company, Limited?

Mr. Bawaney.—Yes. It is a subsidiary company of the Swedish Trust.

President.—Therefore, the only people who can give us the price of Swedish matches are these people?

Mr. Bawaney.—Yes.

Dr. Matthai.—Do you think that the only way by which consumption of matches can increase is by the increase of population and of the habit of smoking?

Mr. Bawaney.—I don't think that that is the only way.

Dr. Matthai.—What is your experience? Supposing you bring down the prices still further, is the general consumption of matches likely to increase?

Mr. Bawaney.—I don't think so, because a person who uses one box of matches and pays two pice for it perhaps needs one box to serve his purpose and he won't strike two matches because he gets it cheaper.

Dr. Matthai.—Supposing we increased the duty and put up prices will that reduce consumption?

Mr. Bawaney.—Yes, but to a very small extent, because if it becomes too dear the poorer people will economise a little more.

President.—The prices are not governed by the foreign price *plus* the duty, are they?

Mr. Bawaney.—These prices are governed by the price of foreign matches because if they were not so, foreigners would not up to now, be able to supply 50 per cent. of India's requirements. Even now they are supplying 50 per cent. of India's requirements.

President.—50 per cent. is represented by the imports. In addition to that they are manufacturing about 25 per cent. in the country, so that it is really 75 per cent. that they are supplying?

Mr. Bawaney.—That is so.

Mr. Mathias.—Is it not correct to say that the price of imported matches is governed by the price of local matches? You told us yesterday that the money value of the prejudice against Indian matches was about 12 annas to Re. 1 a gross and therefore if your price is Rs. 1-8-0 the foreign price would be Rs. 2-4-0 to Rs. 2-8-0.

Mr. Bawaney.—What I meant to say was not that the money value of the prejudice was 12 annas a gross but that on account of the prejudice these people are at present able to get so much more, but that those who are prejudiced in favour of foreign matches would still buy foreign matches even if they charged Rs. 2 extra till such time as they were convinced that the Indian matches were quite as good.

President.—You cannot explain it away in that way completely. At present the demand is about 17 to 18 million gross. India is not manufacturing more than 10 million gross, and, therefore, 7 million matches have got to come from foreign countries. Apart from the prejudice there is a market which has to be supplied.

Mr. Bawaney.—It is not because India cannot manufacture more but because of the prejudice that there is not sufficient demand for Indian matches. There are Indian factories which are quite capable of producing much more and are not working to capacity, while there are some who have large stocks left on hand. If we had sufficient demand we could manufacture double the amount of our present production.

President.—That applies to the inferior quality of matches, but there is a margin at present of 12 annas to a rupee a gross for the better class of matches, and if better class of matches are entering the country in competition with indigenous matches, there must be market for them.

Mr. Bawaney.—That is true. But even if India begins to produce better matches the Trust is not going to let go its hold on 75 per cent. of the market and they will lower their prices. So far as I am aware, they are not dependent on what prices they realize here. The trust has its ramifications all over the world and they have in past years made and are making such big profits on their turnover that even if they suffer a loss in their business in India, it would not matter to them.

President.—Can you let me have the freights, insurance and landing charges to the different ports that you have mentioned.

Dr. Matthai.—Is Berhampore a port?

Mr. Bawaney.—No. Gopalpore is the port but we ship our goods to Berhampore.

Dr. Matthai.—What about Cuddalore?

Mr. Bawaney.—The Scindia Steam Navigation Company's steamer goes to Cuddalore at times.

President.—I want the freights to the places mentioned in your answer to Question 46, namely:—Tavoy, Mergui, Akyab, Chittagong, Calcutta, Gopalpore, Coconada, Madras, Cuddalore, Tuticorin, Cochin, Calicut.

Mr. Bawaney.—We shall send you a statement later.*

Dr. Matthai.—Does your agent at Cuddalore complain of smuggling from the Pondicherry frontier?

Mr. Bawaney.—No.

President.—Do you get regular freights to these different ports in India?

Mr. Bawaney.—To Coconada, Madras, Calcutta, Tavoy, Mergui and Akyab

* Supplementary Statement No. 9.

we get regular freight, but as regards the other ports they are not so regular and we have to keep one month's supply at the other ports.

President.—What is the longest time you have to stock your matches?

Mr. Bawaney.—At present not long; we generally have to keep stock for about one month because the quality has improved.

Mr. Mathias.—How many months credit do you allow?

Mr. Bawaney.—On an average 4½ months.

President.—When you say that you are exporting 50 per cent. do you mean to India alone?

Mr. Bawaney.—India only.

President.—How much do you sell outside Rangoon of the 50 per cent. you sell in Burma?

Mr. Bawaney.—Out of the 50 per cent. sold in Burma, about 5 per cent. would be in Rangoon and 45 per cent. outside Rangoon.

President.—As much as that?

Mr. Bawaney.—Yes.

President.—Do you send these matches outside Rangoon chiefly by rail?

Mr. Bawaney.—By rail and river boats in the delta.

President.—You would not send them to Prome by rail?

Mr. Bawaney.—Yes, we would.

Dr. Matthai.—Of the 50 per cent. that you send to India how much goes to Bengal ports and how much to Madras ports?

Mr. Bawaney.—42½ per cent. on the Madras side and 7½ per cent. to Bengal.

Dr. Matthai.—How do you account for this fact that the bulk of your sales is done in Madras.

Mr. Bawaney.—In Calcutta the Swedish Trust has got its own factory and there is keen competition. If they were to send their matches to Madras, they would have to pay railway freight. We can get a better price in Madras than in Calcutta.

President.—Have not the Swedish Match Company a factory at Madras?

Mr. Bawaney.—We have heard that they are going to start, but it is not ready yet.

Dr. Matthai.—In the other lines of business that you do, have you more business connections with Madras than with any other province?

Mr. Bawaney.—We have not got much business connection regarding our other business. Mostly our other business is in Calcutta. We are dealing in hessian and gunnies.

President.—In answer to Question 48 (*b*) you say "As far as Burma is concerned we have reasons to suppose that there is a certain amount of illicit importation of matches into the country over the Chinese frontiers. Such illicit imported matches are being sold in almost all places in Shan States." Are you speaking from personal knowledge or this is what you have heard?

Mr. Bawaney.—From the reports of our agents and canvassers at these places.

President.—How do you know that they are smuggled?

Mr. Bawaney.—Because the brand sold there are not known to have been imported through any port in Burma nor are they manufactured in Burma and from looking at the matches one can say that they are of Chinese manufacture.

President.—It cannot be on a very large scale.

Mr. Bawaney.—They can bring as big quantities as they want by mules because generally China takes its food it requires from the Shan States and so the caravans have to come to take away the goods. When the mules from

China are coming empty, they can accept any freight. Our last information is that 16,000 gross was imported at one time.

President.—Anyhow the Collector of Customs is coming to give evidence and we shall ask him about that.

Competition.

Now as regards competition you say that competition from Sweden is keenest and Japan also competes. As far as we can see at present the competition from Sweden is not very great so far as you are concerned.

Mr. Bawaney.—We can only say this much that when Sweden sells 50 per cent. of our requirements, the competition must be very keen.

President.—Unfortunately we have not got figures to show from what countries these matches are being imported into each province. The only thing that the figures show now is that Japanese matches are gradually being pushed out by the Swedish matches throughout India. That is quite clear from the figures, but it is not quite clear what is happening in Burma.

Mr. Bawaney.—The same state of affairs prevails in Burma too.

President.—I should like to point out that so far as the Swedish imports are concerned in the last three or four years there has not been a very marked variation, but as regards Japan the imports are steadily decreasing. What these figures suggest is rather this that locally made matches either by Swedes or by you have pushed out Japanese matches. The imports from Sweden do not show such big variations. At present it is the Indian match which is really competing against Japanese matches either made by the Swedish Company or by the Indian Company.

Mr. Bawaney.—As the Indian matches continue to improve, they are getting better sales here, but on account of these other imports, Indian matches are not able to command as much sale as they would otherwise be able to command.

President.—What these figures seem to show is that Japanese matches amounted to 15 millions in 1917-18 and then they began to decline, though there was some slight variation the other way. From that they have come down to about a million.

Mr. Bawaney.—One interpretation of these figures would be that India has been able to compete successfully with Japan and has not been able to compete successfully with Sweden.

President.—That is what I am trying to point out just now. Your competition has practically killed the Japanese competition. Though we have no definite evidence, if the Swedish Trust is operating in Japan, then it may be that they are not exporting any matches from Japan at all and they are simply manufacturing more matches locally to replace their own Japanese matches in India. That is quite possible.

Mr. Bawaney.—This shows that Sweden is still competing in the Indian market and is able to hold its own.

President.—Of course it may also show that they have come to some understanding with Japan.

Mr. Bawaney.—We are getting regular reports from Japan. I will give you some particulars about this. They have not got any special arrangements with the Japanese manufacturers so far as we have been able to ascertain.

President.—We will have to go into that question a little more fully later on. What I wish to know is that in answer to Question 51 (1) you have not given me the figures for 1925-26 for the foreign matches nor for 1924-25. I want you to give me separate figures for Swedish and Japanese matches. We will get the figures from Swedish manufacturers as regards Swedish matches.

Mr. Bawaney.—We will give you figures for Japanese matches.

President.—I want to know only about Japan. You stopped importing them in 1923-24. Who are the principal importers of Japanese matches?

Mr. Bawaney.—Mitsui Bushan Kaisha. En Hing Hwat.

President.—Have they got their offices here?

Mr. Bawaney.—Yes.

Dr. Matthai.—What is your impression during these years for which you have given your prices? Are the Japanese prices lower than Swedish prices?

Mr. Bawaney.—I cannot say for certain.

Dr. Matthai.—Because I noticed from the trade returns a difference of annas 2 to annas 3 between Swedish and Japanese matches.

Mr. Bawaney.—Quite possible.

President.—There must be some mistake. This works out at Rs. 2-12-0 and if you deduct Rs. 1-8-0 from that, it comes to Rs. 1-4-0. That is the figure we get from the import figures, but you have given here Re. 1.

Mr. Mathias.—If you add to the cost of Rs. 50, the duty of Rs. 75 it comes to Rs. 135. There is a balance of Rs. 10 (Rs. 135 *minus* Rs. 125).

Mr. Bawaney.—That is for the seller.

President.—There is a substantial difference between these figures and the Customs figures. The Customs figures are very often not accurate. The duty is not *ad valorem* but specific. For that reason the Customs authorities need not enquire into the market price.

Mr. Bawaney.—They must have put down approximate prices. We were the biggest importers of Japanese matches here up to 1924. About 70 per cent. of Burma's requirements was met by us. We have worked out these figures.

Dr. Matthai.—The prices given in the Trade Returns might be for the average size.

Mr. Bawaney.—It might be so.

Mr. Mathias.—For the purpose of comparing the selling price with the fair selling price for the Indian matches, you will have to deduct the profit of Rs. 10 which is given to the wholesale merchant.

Mr. Bawaney.—Yes.

Mr. Mathias.—Rs. 125 would include the cost of production, overhead charges and manufacturer's profit.

Mr. Bawaney.—Yes.

Mr. Mathias.—The prices that you have given in answer to Question 51 (2), are they nett or gross?

Mr. Bawaney.—They are the prices at which we sell. They are gross prices.

Mr. Mathias.—These are the prices at which the manufacturer sells to the wholesaler?

Mr. Bawaney.—Yes.

President.—The man who imports also does not sell direct. He sells them to other people.

Mr. Bawaney.—Yes, to the petty traders. We sell to the wholesale merchants.

President.—These prices are wholesale prices.

Mr. Bawaney.—Yes.

President.—From Rs. 1-8-0, how much has to be deducted to arrive at the nett price?

Mr. Bawaney.—Two annas.

President.—You get about Rs. 1-6-0 at the factory.

Mr. Bawaney.—Yes.

Mr. Mathias.—After paying the duty, the foreign manufacturer would get Rs. 125 and not Rs. 135.

President.—When the foreign manufacturer sells at Rs. 2-8-0 you sell at Rs. 1-6-0. Even in competition with Japanese matches, you have to sell your matches two annas cheaper.

Mr. Bawaney.—Yes.

President.—Is that due to the prejudice?

Mr. Bawaney.—Yes.

President.—I don't understand why Japan should get nearly one rupee more than you do.

Mr. Bawaney.—Japan has got a good hold on the market. Their matches are well known. The consumers purchase matches with labels which they know well. We are trying to push our way. We have to reason with customers and tell them that our matches are really good and thus induce them to buy. We are gradually making headway.

President.—It is quite possible that your matches in the bazar do not sell really as cheaply as you are selling to your wholesaler.

Mr. Bawaney.—Our matches sell at the rate of one pice per box. If you buy only one Japanese match box, you will have to pay two pice because there is no half pice current in Rangoon but if you buy two boxes, you have only to pay three pice. Swedish boxes also sell at the same price as Japanese.

President.—Per packet of 10 boxes, you get one anna less.

Mr. Bawaney.—Yes. It is the retailer that gets that.

President.—Are you sure that your retailer sells your matches at this price?

Mr. Bawaney.—Yes.

President.—How do you know?

Mr. Bawaney.—We had a peculiar case in the Court and they gave evidence to the effect that they were selling at the rate of 2¼ and 2½ annas. When the enquiry was going on, they were asked about the Japanese matches and they gave these figures.

President.—But the case was between you and the Swedish Match Company?

Mr. Bawaney.—When the case was going on they gave evidence about Japanese matches.

Mr. Mathias.—Your retail price is Rs. 2-4-0 a gross?

Mr. Bawaney.—This is how it happens. We sell to the wholesaler, then it goes to the petty trader; he in his turn sells to the shopkeepers and very small shopkeepers and they have this price.

Dr. Matthai.—When you get down to the petty shopkeeper or the *biriwalla*, that is to say the last stage before you reach the consumer, there is practically no difference between your price and the Swedish; am I right?

Mr. Bawaney.—We sell in packets of 10 at annas 2-3 to annas 2-6 according to distance and the petty seller sells at 3 pies a box while the Swedish is sold at 2 pice a box or if a consumer buys two boxes he has to pay 9 pies.

Mr. Mathias.—That works out to Rs. 2-4-0 a gross and the other Rs. 3-2-0, so that when you really get down to the retailer there is still a difference between your price and the Swedish price.

Mr. Bawaney.—There is a difference of about 50 per cent. between the two.

President.—Let us take the *bidiwala*. He sells your packets of 10 for annas 2-6, that means you have got to get 144 pice or Rs. 2-4-0 for a gross.

Mr. Bawaney.—That is correct, and the Swedish sells at annas 3-6 per packet of 10 or Rs. 3-2-0 per gross.

President.—He gets 50 per cent. more, that is to say, you have got to pay the whole difference between the import price and your selling price, that is what it comes to.

Dr. Matthai.—Or in other words the prejudice against your matches, which is measured at somewhere between 12 annas and Re. 1, continues right up to the retail end?

Mr. Bawaney.—Yes.

Dr. Matthai.—With regard to this question of prejudice you say that this prejudice exists both in favour of Swedish matches, and of Japanese matches.

Mr. Bawaney.—Yes.

Dr. Matthai.—I take it, it is largely due to the fact that the big dealers in the country have been accustomed to selling these foreign matches and they have, therefore, a vested interest and try to push the sale of the foreign matches for all they are worth?

Mr. Bawaney.—Yes.

Dr. Matthai.—The principal sales organizations in this country are more interested in selling foreign matches and therefore this prejudice exists. What I want to put to you is this; your firm has also been engaged in importing matches for a long time and, therefore, you have a good sales organization at your disposal and you ought to be able to get over this prejudice more quickly than other local manufacturers?

Mr. Bawaney.—That is right. That is the reason why we have been able to make such headway.

President.—There must be some explanation for the difference between your price and the imported price of 14 annas. Perhaps the agent gets more commission?

Mr. Bawaney.—He gets Rs. 4-11-0 commission per case wholesale. For the Swedish matches he gets Rs. 4-11-0 for 50 gross that is annas 1-6 per gross and at the same time he gets the case which he can sell at Rs. 1-12-0 to Rs. 2.

President.—That is another half an anna, so that he gets 2 annas. How much do you give?

Mr. Bawaney.—We give commission about Rs. 4 but we do not give the case.

President.—Your price is not comparable with his in that case. You have got to deduct from the c.i.f. price the price of the packing case.

Mr. Bawaney.—Yes.

President.—They come to about half an anna cheaper. The point is that you are giving him the same commission as the other man except that he gets Rs. 2 extra for the packing case.

Mr. Bawaney.—Yes.

President.—So that the thing for you to do may be to give him some interest in selling your matches.

Mr. Bawaney.—They are making more profit by selling our matches. By selling our matches at Rs. 1-9-0 they make a profit of 10 annas whereas for Swedish matches they have to pay Rs. 2-10-0 and make a profit of 8 annas by selling at Rs. 3-2-0.

President.—But if that is so why should they not sell more of your matches?

Mr. Bawaney.—What we have been trying to show is that although we are trying our utmost to push our sales by giving better terms to the dealers—and it is cheaper for the consumer too—the consumers are prejudiced in favour of foreign matches and they are prepared to pay a little more just now.

Mr. Mathias.—Is it prejudice in favour of the label?

Mr. Bawaney.—Not only label. Even if the label be unknown to them but has merely got "made in Sweden" printed on it, they will buy that.

Mr. Mathias.—But 90 per cent. of the people cannot read?

Mr. Bawaney.—That is so, but the dealers themselves are prejudiced in favour of Swedish matches.

Mr. Mathias.—I take it that the more you reduce your prices the more advantage you give to the various retailers without giving any advantage to the consumers, because the consumer cannot really buy his matches at less than a quarter of an anna so any further reduction is likely to be of advantage to the retailer.

Mr. Bawaney.—That is so if the reduction is small, but if there is considerable reduction then the consumer will get three boxes for 2 pice or if the reduction is still more he will get 4 boxes for 2 pice.

Mr. Mathias.—But it has to be a very large reduction.

President.—I think the difficulty can be got over in this way; they will buy half a pice worth of *pan* and half a pice worth of matches and pay him quarter of an anna!

Mr. Bawaney.—That is quite true, but so long as the present conditions prevail if we sell it at a lower price we shall have to close down our factory.

Dr. Matthai.—In answer to Question 51 you say " Import from Europe at that time was on a very small scale." Do you mean only to Burma?

Mr. Bawaney.—Yes.

President.—You give three prices in answer to Question 53. When the duty was 5 per cent. the price was 14 annas per gross; when it was 12 annas per gross the price went up to Rs. 1-10-0, that is it went up precisely by 12 annas; and in the next period with the duty at Rs. 1-8-0 per gross, or when the duty went up by another 12 annas the price rose by one rupee. You can't say that the duty has not been transferred to the consumer?

Mr. Bawaney.—It is only those people who are prejudiced in favour of foreign matches have to pay the duty, but others get the matches cheaper. If the duty had not been imposed they would not have been able to get matches at the rate of one pice per box. All would have to pay half an anna per box.

Mr. Mathias.—Why?

Mr. Bawaney.—All the markets would be in the hands of the foreign manufacturers and they would command any price.

Mr. Mathias.—I don't see that that follows exactly. When the duty was 5 per cent. matches were selling at Annas 14 per gross.

President.—What we really want to know is what is the price in Japan itself and in Sweden for these matches.

Mr. Bawaney.—I don't know.

President.—Of course we can get it from the Swedish match factory or independently. There would be no difficulty about that. Until we know that matches are being sold in this country cheaper than they are sold in Sweden or Japan this point is not established.

Mr. Bawaney.—I am not in a position to give the rates prevailing in Sweden and Japan.

Dr. Matthai.—These prices that you give here in answer to Question 53, are these current prices?

Mr. Bawaney.—Yes.

President.—Are these wholesale prices?

Mr. Bawaney.—Yes.

President.—Are these Japanese?

Mr. Bawaney.—They are Swedish.

President.—But have you not got any figures for Japanese matches?

Mr. Bawaney.—No.

President.—Do you know whether there is any Japanese firm manufacturing matches in India?

Mr. Bawaney.—I have heard that there is one factory somewhere at Calcutta in which Mitsui Bushan Kaisha and some other Japanese firm are interested. I don't know of any other factory.

President.—So that we cannot really compare the prices of matches manufactured by Japanese firms in India as compared to yours.

Mr. Bawaney.—No.

President.—As regards the Swedes, you have already told us that you get a better price than they.

Mr. Bawaney.—Yes.

President.—In the bazaar for instance for how much would they be sold?

Mr. Bawaney.—Their rate was Rs. 11 for 8½ gross. I hear two or three days ago they have reduced it to Rs. 10. Their matches are manufactured in Burma out of Burma wood.

Mr. Mathias.—Your price is Rs. 1-8-0.

Mr. Bawaney.—Yes.

President.—Yesterday we heard that these matches made out of Japanese aspen wood were selling at about Rs. 1-9-0.

Mr. Bawaney.—In the whole Mandalay District there are still lying tins which have been sold at Rs 11 to my customers.

President.—That of course may be as regards the old stock.

Mr. Bawaney.—I don't know. It is Burma made matches.

Dr. Matthai.—In Mandalay? How long ago was it?

Mr. Bawaney.—Since three or four months ago at Rs. 11 a tin of 8½ gross.

President.—I was trying to point out to you that the matches made out of Japanese wood apparently fetch a higher price than your matches made out of indigenous wood.

Mr. Bawaney.—No.

President.—They don't fetch any higher price than yours?

Mr. Bawaney.—Not at all. Six months before they were getting Re. 1 more per tin. Now I find the prices are the same. Now if the matches are made out of Japanese aspen wood here, they don't command a better price than those made by us out of indigenous wood.

Dr. Matthai.—It is not worth while at all to make matches out of Japanese wood.

Mr. Bawaney.—No.

President.—The real thing is to get the Japanese label to get a higher price, I suppose?

Mr. Bawaney.—If we get a Japanese label we can get the same price as they would get.

President.—If you get the Swedish label you would get the same price as they would get.

Mr. Bawaney.—Yes.

President.—You have not understood the meaning of this question 54. What we wanted you to show is to what extent you were at a disadvantage. Would it be correct to say that your machinery erected in India would cost about 20 per cent. or 25 or 30 per cent. more than the same machinery erected in Europe including the duty?

Mr. Bawaney.—About 25 per cent. more.

President.—In the case of stores, it would be the same thing more or less.

Mr. Bawaney.—Yes.

President.—Except that you would pay 15 per cent. duty.

Mr. Bawaney.—Yes.

President.—Then as regards freight on finished goods you would not have any great disadvantage as compared to the foreign manufacturer.

Mr. Bawaney.—As regards the local market, we are better situated regarding freight, but if we have to send matches from here to Madras or other ports, sometimes we have to pay more freight than the foreigner has to pay. From Kobe (Japan) to Rangoon the freight is Rs. 11-9-0 and from Rangoon to Madras we have to pay Rs. 14. When the foreign manufacturer sends goods to any port in India except Rangoon, he has to pay less freight than we have to pay to such ports.

President.—Take the Swedes themselves. They manufacture matches here in the country. They have to pay more for their plant and machinery, stores and everything.

Mr. Bawaney.—Yes.

President.—So far as those items go you are no worse off than the Swedish manufacturer.

Mr. Bawaney.—No.

President.—As regards the foreign manufacturer you would be at a disadvantage in respect of machinery and stores.

Mr. Bawaney.—Yes.

President.—But as regards the other items you are not at such a very great disadvantage.

Mr. Bawaney.—As regards the freight we are at a disadvaantage and when compared to the Swedish Trust we are very much at a disadvantage because they manufacture their own paper, chemicals, etc. Whatever they require in connection with the Match Industry, they manufacture themselves.

Dr. Matthai.—What about the supply of wood? Most of their factories get wood from elsewhere. In that respect you will be in a position of advantage.

Mr. Bawaney.—Provided we use indigenous wood, we are better situated in that respect.

President.—As regards Japanese prices, would you be able to give us f.o.b. prices up to 1923-24?

Mr. Bawaney.—We always purchased at c.i.f. prices.

Mr. Mathias.—You say in answer to Question 54 (*g*) that you have to keep other materials to last for at least six months in stock.

Mr. Bawaney.—We cannot get in India these chemicals at a moment's notice. All factories, whether financed by foreigners or by Indians, have to keep a certain amount of stock.

Mr. Mathias.—For how long?

Mr. Bawaney.—I do not know for what length of time they keep stock but we keep for six months because we cannot get these chemicals in India. Transport also takes time. Sometimes, it takes two months for the chemicals to arrive after the date of shipment.

Continued on Friday, 25th March 1927.

Plant.

President.—As regards equipment, you say that in your opinion 700 gross of boxes per day would be the smallest unit of production which can be operated economically. How do you work out 700 gross of boxes? Will you have to work everything by machinery or partly by machinery and partly by manual labour?

Mr. Bawaney.—By machinery only.

Dr. Matthai.—I take it that you took this figure of 700 gross from Mr. Troup's book.

Mr. Bawaney.—We had discussion on this matter with the expert often and even with the Roller's representative. Their opinion is that the minimum production should be 700 gross per day to do it economically and that it should be done by machinery. We will have to have at least one peeling machine and one peeling machine would turn out 700 gross and if our production is less, that machine would be lying idle for part of the time.

Dr. Matthai.—One of the reasons why Mr. Troup suggested 700 gross was that as the then latest machine known as the "continuous machine" was capable of producing 350 gross, it would be an advantage to have an outturn of some multiple of 350.

Mr. Bawaney.—Even if you did it by automatic machine, one machine would do 700 gross a day.

President.—May I take it that your machinery consists of multiples of 10 machines or 5 machines, each set producing 700 gross of boxes.

Mr. Bawaney.—Yes, but we have also some spare machines so that replacements can be made in case of any breakdown. About 10 to 15 per cent. we have got spare machinery.

President.—How many peeling machines have you got?

Mr. Bawaney.—We have 10 peeling machines. On the basis of 700 gross per machine, they would produce 7,000 gross but we are calculating on the basis of 6,000 gross only.

President.—May I take it that really speaking you have 10 units of manufacture?

Mr. Bawaney.—Yes.

Economical Production.

Dr. Matthai.—What you really mean by economical production is that under present conditions, that is to say so long as the price of your full size box per gross is Rs. 1-8-0, then a factory producing 700 gross a day would be able to make a fair profit.

Mr. Bawaney.—Yes, if the labour is efficient and if the production is by the latest machinery.

Dr. Matthai.—On a production of 700 gross a day, they would make a fair profit.

Mr. Bawaney.—Yes.

***Mr. Mathias.*—By fair profit do you mean 12 per cent. on your capital?**

Mr. Bawaney.—Yes, about that.

***Dr. Matthai.*—Apparently, people who are not using machinery to the extent you do, *viz.*, the Muslim Match Factory or the Rangoon Match Works, are able, in your opinion, to make a fair profit.**

Mr. Bawaney.—Yes, on account of the cheap labour. In India at present it is cheaper to do most of the work by hand but manual labour has one disadvantage and that is that you cannot have a large production. Further, if the work is done by hand, the quality won't be uniform. Whereas if you do it by machinery, the quality will be uniform. In Calcutta there are some people who do everything by hand. Even the cutting they do by hand. They are able to sell cheaper than others and still make a fair profit.

President.—If the work is done by hand, it will be very difficult to get a uniform quality.

Mr. Bawaney.—That is so.

Mr. Mathias.—You said that the output, if done by hand, would be limited. What would be the limit?

Mr. Bawaney.—Now in our factory by employing 1,500 hands we can turn out 6,000 gross but if all the work were to be done by hand—I have not gone into the figures carefully—I think that a very much larger number of hands would be required.

Mr. Mathias.—Then the production would be limited by the amount of labour.

Mr. Bawaney.—Yes.

President.—Even if you have twice the number of men, it is not a very large number in a big population.

Mr. Bawaney.—That is so.

President.—Of course there is some reason in that. Already there is a lot of prejudice against Indian matches and if more matches were produced in the country by hand and if the quality was not maintained, it may be still more difficult for the Indian industry to establish itself. That is one of the drawbacks of manual labour.

Mr. Bawaney.—If the workmen were properly trained they would be able to maintain a uniform quality after a time. The Japanese manufacturers are producing matches mostly by manual labour. The quality is not bad, nor does it vary very much. If the labourers are properly trained, there will not be so much difficulty. In the beginning, the Japanese manufacturers also must have experienced difficulties.

Dr. Matthai.—Partly it is a question of your labour being sufficiently trained and partly the question of uniform quality will be determined by the kind of supervision that you can provide.

Mr. Bawaney.—Take for instance the work of pasting. If the workmen are not properly trained there would be too much of paste sometimes. If they had not much practice, they would not be able to paste the paper exactly parallel to the edges. In the case of inner containers, the same difficulty would be experienced. The corners may not stick properly. But if the labourers take up match making as their profession, if they have to depend for their livelihood on match making, they would train themselves up to proper efficiency in the matter. I am more encouraged to say this because in India though they found much difficulty in the beginning, they are now doing nearly all right.

Dr. Matthai.—Speaking as a large manufacturer of matches in India, do you think that your interests would suffer to any extent by the fact that there are large numbers of small factories in India producing matches of indifferent quality.

Mr. Bawaney.—No, I don't think so.

Dr. Matthai.—Supposing, for example, you are exporting a fairly considerable quantity of matches to India and if two or three smaller factories send matches of inferior quality and finish to the same markets, then people in the Indian market will say " all these matches are coming from Burma and therefore you cannot depend on the quality of Burmese matches." What have you got to say to that?

Mr. Bawaney.—I don't think we would experience any difficulty unless the labels of the other manufacturers were confused with our labels. When their labels are quite distinct from ours we would not suffer as a result of the inferior quality of their matches. Swedish matches are recognized by the people by their labels so our labels are quite distinct and the consumers distinguish our matches by the labels.

President.—What I want to be sure about is this. You can make 700 gross boxes out of machinery.

Mr. Bawaney.—Yes, conveniently.

President.—So can you more or less by manual labour chiefly. For machinery you have simply to use the peeling and the chopping machines in that case that is all.

Mr. Bawaney.—Yes, it can be done.

President.—In the latter case so long as labour is cheap it is really a more economical unit than one worked by machinery.

Mr. Bawaney.—That is quite true. I have already stated that if you can get sufficient labour who will take it up as a profession, it would be cheaper to do the work by manual labour, so long as labour remains cheap.

President.—For a long time to come until labour is fully trained, the prices in the country will be governed by hand made matches practically because they will sell them cheaper than machine made matches?

Mr. Bawaney.—Yes. Then of course we too will be compelled to do by hand.

President.—Then the quality of the whole production of Indian matches will deteriorate until labour is properly trained?

Mr. Bawaney.—I have already told you that if the labour is trained and they can make uniform quality of matches then it will be cheaper to do by hand, as they are doing in Japan.

Mr. Mathias.—It would not pay you to keep all your machinery idle and employ manual labour?

Mr. Bawaney.—We will only have to discard the box making machinery because we will require the peeling and the chopping machines all the same. Manual labour can compete with machinery only in box making—outer and inner—and labelling, and these machines do not lock up much capital.

Mr. Mathias.—The only thing you will have to show is that you can eventually compete with the hand made matches.

Mr. Bawaney.—We do not require to compete with the hand made matches at all. We can discard our box machine in that case and employ manual labour.

Mr. Mathias.—You will also have to do the filling by hand?

Mr. Bawaney.—Machine filling will be cheaper than hand filling.

President.—Then what is the point in having merely the boxes made by hand? You can have everything done by machinery in that case?

Mr. Bawaney.—When it becomes cheaper to have boxes done by manual labour we can discard the box making machine.

Mr. Mathias.—Would not that also apply to your filling machine and the wrapping machine?

Mr. Bawaney.—Wrapping machine and the box making machine are the same. Box filling is cheaper by machine than by manual labour if you do it by the Simplex automatic machine.

Mr. Mathias.—What about box packeting and gross packeting?

Mr. Bawaney.—Box packeting is also cheaper by machinery than by hand gross. Packeting of course has to be done by hand because there is no machinery for that.

The Capital of the Company.

President.—In answer to Question 57 you say " Approximately 30 per cent. of our total capital outlay invested in our match business has been incurred on plant and machinery." I think you rather misunderstood the question. In that capital invested in your match business you include the working capital, don't you?

Mr. Bawaney.—We have not got any separate account for working capital and capital.

President.—What we wanted to know was whether we were to treat working capital as separate for this purpose.

Mr. Bawaney.—This includes all the capital locked up by the Company in the match business.

Dr. Matthai.—Does it include your stock of stores, stock of finished goods and everything else?

Mr. Bawaney.—Yes.

President.—What we meant was the fixed capital which would include buildings, land concession and other things but not the working capital. I will take the two Questions 57 and 62 together. What does this item (*c*) in answer to Question 62 include?

Mr. Bawaney.—Outstandings, Stock of matches, Raw materials, Advance to contractors and others, and cash.

President.—That is to say this is a sort of floating capital?

Mr. Bawaney.—Yes.

President.—Then the remainder is invested in land, buildings and machinery?

Mr. Bawaney.—Yes.

President.—That comes to about Rs. 10 lakhs out of which about Rs. 9·50 lakhs is plant and machinery?

Mr. Bawaney.—Rs. 16 lakhs up to 30th June 1926; since then we have imported the Simplex and other machinery at a cost of about Rs. 1,50,000.

Dr. Matthai.—What you are suggesting is that this item (*d*) Rs. 9,62,709 is not included in the machinery that you have bought since 1926.

Mr. Bawaney.—That is correct.

Dr. Matthai.—If you look to the summary of your total cost of machinery, the total purchases,including your local purchases from 1923-26 comes to Rs. 8,95,890, and what you have done here is to include only the purchases up to the end of June 1926. You have excluded the purchases that you have made more recently, say in January or February.

President.—How much have you spent altogether up to date on machinery?

Mr. Bawaney.—About Rs. 11,22,000.

President.—These figures about land and buildings, are they correct or have you any alterations to suggest?

Mr. Bawaney.—No.

President.—Then your total fixed capital comes to about Rs. 17·76 lakhs, or we will call it Rs. 18 lakhs. You take your capacity as 6,000 gross a day?

Mr. Bawaney.—Yes.

President.—That comes to 18 lakhs annually, and therefore the capitalization comes to one rupee a gross.

Mr. Bawaney.—Yes.

President.—But you say in another part of your replies that you have got extra machinery to make another 3,000 boxes?

Mr. Bawaney.—Yes, but these are machines which we have not begun working yet.

Dr. Matthai.—That is included in the Rs. 11 lakhs, is it?

Mr. Bawaney.—Yes. That is Japanese machinery which cost about Rs. 70,000.

President.—That would give you 3,000 extra gross per day?

Mr. Bawaney.—It can, but the working expenses are higher and therefore it is not economical to work the machinery.

President.—That is the only spare machinery that you have got?

Mr. Bawaney.—Yes.

President.—So we will call it Rs. 17 lakhs instead of Rs. 18 lakhs, so that the capitalization comes to just under a rupee a gross.

Mr. Bawaney.—That is so.

Mr. Mathias.—You don't intend to use this Japanese machinery?

Mr. Bawaney.—Not at present.

Mr. Mathias.—Then why did you buy it if it is uneconomical to work?

Mr. Bawaney.—When we bought this machinery we thought the prices of matches would remain at the higher level, but unfortunately prices have gone down and it won't pay us now to work this machine.

Mr. Mathias.—It was really a gamble. Your idea was that if the prices kept up you would be able to get a good return and also part of your capital cost back.

Mr. Bawaney.—At that time the Swedish Trust had not arrived here and we had not to fear the competition from them. We had not even heard that they were going to come here.

President.—Now you say you brought into use this machinery in 1924, but you purchased the machinery in 1922.

Mr. Bawaney.—Yes.

President.—Since then the price of machinery has dropped.

Mr. Bawaney.—Yes.

President.—What do you consider the difference would be?

Mr. Bawaney.—About 30 per cent.

Dr. Matthai.—You bought all these machinery from Germany.

Mr. Bawaney.—Yes.

Dr. Matthai.—You practically got Rs. 7 lakhs worth out of your total Rs. 9 lakhs before the end of 1923.

Mr. Bawaney.—Yes.

Dr. Matthai.—The German exchange was stabilised about the end of 1923. Practically the whole of your purchase was made when the German exchange was distinctly in your favour.

Mr. Bawaney.—We bought at sterling prices.

Dr. Matthai.—That does not matter. What I am trying to get at is this. The President was asking you about the present value of the machinery which you bought. Since you made your purchases, the German prices of machinery in Germany have gone down, but the German exchange has gone up and the rupee exchange has gone up. Have you considered all these factors? Taking all those factors into account at present could you land in India machinery of the kind that you have bought at lower prices than in 1923?

Mr. Bawaney.—We have gone into the matter and we find that we can get it at 30 per cent. cheaper than before.

Mr. Mathias.—What was your depreciation?

Mr. Bawaney.—One year we have written off Rs. 75,000 and another year Rs. 60,000 including building and machinery.

Mr. Mathias.—Altogether you have written off Rs. 1,35,000.

Mr. Bawaney.—Yes.

Mr. Mathias.—Do you consider that your buildings are cheaper to erect now than before?

Mr. Bawaney.—No.

Mr. Mathias.—In your buildings have you used steel?

Mr. Bawaney.—We have only used timber. We have used very little steel.

Dr. Matthai.—Have you got recent evidence about the current prices of machinery as landed in India?

Mr. Bawaney.—Our figures are about 11 months old.

President.—Have you ordered any machinery recently of the same type as you purchased in 1924?

Mr. Bawaney.—Not in 1926.

Dr. Matthai.—Your simplex machine was purchased in February, 1926.

Mr. Bawaney.—This is the first time that we have ordered this machinery.

President.—We can get some idea if you can show that a certain machine was purchased in 1917 at a certain price and in 1926 or later at such and such a price.

Mr. Bawaney.—20 inner drawer machines arrived in January, 1926.

President.—You have got those two purchases. What was the price you paid earlier?

Mr. Bawaney.—We ordered for those machines in 1925 and they arrived in 1926.

President.—Can you give us some more information as to recent prices?

Mr. Bawaney.—If you would like we could send a telegram to Rollers and get you the quotation.

President.—We should like to have that information.

Mr. Bawaney.—Yes. We will supply you with the information.*

President.—As regards your other miscellaneous assets you have given Rs. 18,12,000. That does seem to me a very high figure. Even if we assume that your total works cost were Rs. 15,00,000 a year, it is really on a 15 months turnover.

Mr. Bawaney.—We have got six months stock of chemicals. We always keep a stock worth Rs. 3,00,000.

President.—What credit on sales have you got to give?

Mr. Bawaney.—We give 4½ months credit and every month we turn out Rs. 1,75,000 worth of goods. Our stock of matches is worth Rs. 5,00,000.

Mr. Mathias.—How do you pay your bills? Do you draw a 30 day bill?

Mr. Bawaney.—We pay cash. When we issue letters of credit for all the goods we import from Europe we find that we can buy cheaper.

President.—If your total works cost comes to Rs. 15,00,000, your capital engaged in this business is Rs. 18,00,000. It takes 15 months for a complete turnover. In 12 months you spend Rs. 15 lakhs on the works cost. In order to get that you have to get back Rs. 18,00,000. It means for 14 or 15 months you must go on manufacturing in order to recover your Rs. 18,00,000.

Mr. Bawaney.—We will have Rs. 3,00,000 worth of raw materials on hand. This money doesn't circulate, because as soon as some of the stocks are used up, we have to replace them. We have Rs. 5,00,000 worth of finished matches.

Mr. Mathias.—You say your outurn is 1¾ lakhs a month.

Mr. Bawaney.—Yes.

Mr. Mathias.—In 1925-26 your total cost was Rs. 15,00,000.

Mr. Bawaney.—Yes.

Mr. Mathias.—You say generally these costs do not represent your present-day costs. Therefore for calculating 1925-26 costs would you take the working capital as Rs. 8,00,000. I shall show you how I have suggested that figure.

	Rs.
For stores	3,00,000
Cost of 4 months production	5,30,000

The total comes to Rs. 8·3 lakhs. That was approximately your working capital during the year 1925-26.

Mr. Bawaney.—You have omitted certain figures. Even then we have to keep a stock of all matches which you have not taken into consideration.

Mr. Mathias.—In addition to the outstandings.

Mr. Bawaney.—Yes.

---

* Supplementary Statement No.

Mr. Mathias.—How much would that be?

Mr. Bawaney.—Rs. 4 to 5 lakhs in stock.

Mr. Mathias.—I think you said in answer to a question yesterday that you have more demand than production.

Mr. Bawaney.—We have to maintain a stock to meet all demands. We deliver from stock which is replenished by our daily production.

Mr. Mathias.—Taking your own figures they will come to Rs. 12,00,000 (Rs. 5 lakhs *plus* Rs. 4 lakhs *plus* Rs. 3 lakhs).

Mr. Bawaney.—At the time our outstandings were Rs. 7½ lakhs.

Mr. Mathias.—There must be a limit to the outstandings. What is the trade usage as regards credit in the Match Industry?

Mr. Bawaney.—We take promissory notes and sell on a credit of 3 months but we generally recover the money on an average after 4½ months.

Mr. Mathias.—In the Steel enquiry we only took 30 days credit. In your case, three months credit is what should be taken for the purpose of calculation.

Mr. Bawaney.—Nominally it is 3 months.

Mr. Mathias.—When you take a promissory note, do you not discount it?

Mr. Bawaney.—We don't get any bill of exchange. We get only a promissory note which we don't discount. We simply keep it with us. We are not doing business on borrowed capital. We do business with our own money. The understanding is that we are not to charge any interest. Although it is nominally three months, we give some facilities to our traders. We don't press them for payment as soon as the period of three months expires. They come and make payment according to their convenience. So, on an average, our money comes in after 4½ months.

Dr. Matthai.—The promissory note is simply a documentary evidence of the debt and nothing more.

Mr. Bawaney.—Yes.

Mr. Mathias.—To return to these figures, if you take 4½ months, the working capital will come to Rs. 12 lakhs, *viz.*, Rs. 3 lakhs for raw materials Rs. 4 lakhs for finished matches and Rs. 5 lakhs for outstandings.

Mr. Bawaney.—At that time our outstandings were Rs. 7½ lakhs. Theoretically, of course, it comes to the figure you quote.

Dr. Matthai.—Suppose you had to borrow your working capital, what interest would you have to pay?

Mr. Bawaney.—One per cent. above the current rate of the Imperial Bank of India.

President.—That is, when your credit is first rate.

Mr. Bawaney.—Yes.

Mr. Mathias.—When you say one per cent. above the Imperial Bank rate, do you mean the official rate or the local rate?

Mr. Bawaney.—I mean the Calcutta rate.

President.—What interest can you get on a fixed deposit from the Chetties?

Mr. Bawaney.—Twelve to fourteen annas per month per hundred. But they lend money at Rs. 1-2-0 per month per hundred.

President.—On a secured loan, they would charge a little less.

Mr. Bawaney.—Yes.

President.—What does the Bank rate work out at on an average, I am talking of the Rangoon rate.

Mr. Bawaney.—Between 7 and 8 per cent. per annum.

President.—They will charge you one per cent. above the average rate.

Mr. Bawaney.—The Bank would charge us one per cent. more than the current rate.

President.—They would take some sort of security from you, I take it. Will you have to get somebody to sign with you?

Mr. Bawaney.—No.

President.—You get an overdraft at 1 per cent. more than the current rate.

Return on Capital.

Mr. Bawaney.—Yes.

President.—As regards the return on capital, your proposal is that a return of 12 per cent. would attract capital.

Mr. Bawaney.—Yes.

President.—That is rather a high rate

Mr. Bawaney.—From industrial concerns, people expect to get this rate, especially when there are other concerns which give this amount. For instance, the Indo-Burma Petroleum Company pays about 12 per cent. The same is the case with Jute Companies.

Mr. Mathias.—Do the Jute Companies give so much as 12 per cent.?

Mr. Bawaney.—Yes, on an average.

President.—If it is 10 per cent. it is free of income-tax.

Mr. Bawaney.—Yes.

President.—Do you think that under 12 per cent. no capital will be attracted into the business?

Mr. Bawaney.—No.

Mr. Mathias.—You place debentures as high as 9 per cent. Can you justify the rates by quotations from the market?

Mr. Bawaney.—I can't give you any figures.

President.—In the town area, that is what we call the *pucca* area, where the property is freehold, what is the mortgage rate of interest which is usually charged?

Mr. Bawaney.—1 per cent. per annum.

President.—On security in the town area?

Mr. Bawaney.—Yes.

President.—People like Balthazar's who do this business on a large scale probably will charge less.

Mr. Bawaney.—Perhaps they may charge 11 per cent. but never less than 10 per cent. and that would be on very good security. The amount of the loan would be 50 per cent. of the value of the property.

Dr. Matthai.—You have experience both of India and of Burma. Is money generally dearer in Burma than in India?

Mr. Bawaney.—Yes, it is.

Dr. Matthai.—By how much would you put it?

Mr. Bawaney.—Seven to eight annas per month.

Dr. Matthai.—Higher in Rangoon than in Calcutta.

Mr. Bawaney.—Higher than the prevailing rate in Bombay by 7 to 8 annas per month per hundred.

President.—What is the rate between Chetties?

Mr. Bawaney.—Fourteen annas, on an average. We get about 14 annas from the Chetties.

Dr. Matthai.—You get about 10½ per cent.

Mr. Bawaney.—Yes.

President.—Do you get one anna below the Chetty rate?

Mr. Bawaney.—We get the same rate.

President.—You have given us the prospectus of the Assam Match Company in which they put down their working capital at Rs. 1,76,000; that is on an output of 360,000 gross per year. That is 8 annas per gross.

Mr. Bawaney.—They may have to borrow again. In our cost statement you won't find that. You won't find the item of interest anywhere because we do business with our own money. If you have not got your own money you will have to borrow.

President.—According to their calculation it works out to a turnover of 4 months.

Mr. Bawaney.—Yes.

President.—But yours is 15 months nearly.

Mr. Bawaney.—They are selling mostly in India on a cash basis but there is a system of longer credits in Burma.

President.—Why should you not be able to do business on a cash basis?

Mr. Bawaney.—This system is peculiar to Burma and has prevailed for a long time.

President.—We cannot make two different kinds of proposals, one for India and another for Burma.

Mr. Bawaney.—We have to state what our actual position is.

Works Costs.

President.—I now want to go on to your Works costs. As regards depreciation you claim 12½ per cent. on machinery. This is rather too high. 12½ per cent. means 8 years life.

Mr. Bawaney.—The reason why we ask 12½ per cent. is that the match making machinery is too delicate. It has got to be kept up to the mark and must turn out the best quality of matches. If there is any defect in the machine the appearance of the matches will suffer and the quality also will suffer, so the match machinery cannot continue to work with efficiency for as many years as any other machinery would.

Mr. Mathias.—Up to the present time have you taken the depreciation every year out of your profits at 12½ per cent.?

Mr. Bawaney.—The Income-tax department does not allow us to take so much for depreciation. We put the depreciation in our books as much as they allow us—6¼ per cent. on machinery and 2½ per cent. on buildings.

Mr. Mathias.—Actually if you consider that the machinery is depreciating at the rate of 12½ per cent. it would be wise to make provision out of your profits because if the machinery deteriorates you won't be able to make profits.

Mr. Bawaney.—What you say is quite correct.

President.—You consider 12½ per cent. ought to be the percentage.

Mr. Bawaney.—Yes, I consider that as reasonable for match machinery.

President.—But that can't be reasonable for the whole machinery surely?

Mr. Bawaney.—It may not apply to the peeling machinery but for others it is reasonable.

President.—In the workshop, the chemical department, label printing department do you want so much?

Mr. Bawaney.—They are all delicate machines. Except the peeling machine and the sawing machine they are like toys; they are extremely delicate.

Dr. Matthai.—You would consider 8 years as the life of your machinery?

Mr. Bawaney.—Yes. If you come over to our works you will see that the Frame filling, Levelling and Drying machines are made of wood and

they get worn out in three or four years. In the polishing machine the Drums are all wood.

President.—As regards your works costs you told us yesterday that you would like to treat them as confidential. Do you really wish us to do that? You see, your rivals know what it costs to manufacture matches. You are one of the biggest match manufacturers in India and I think we would be at a very great disadvantage if we cannot disclose the costs. We must have the materials.

Mr. Bawaney.—If you can't help it we have no objection.

President.—Thank you. It makes our work easier. We will first take the statement showing works cost per gross. In the total cost you have shown a great improvement between 1924 and 1925. It has come down from Rs. 1-11-0 to Rs. 1-6-0.

Dr. Matthai.—How many months did you work in 1924-25?

Mr. Bawaney.—The whole year.

President.—Your output nearly doubled in the interval.

Mr. Bawaney.—Yes.

Materials.

President.—You have given the cost of wood for splints and veneer As. 5-3. It is rather a high figure. What price did you take the wood at in that case?

Mr. Bawaney.—We had some Russian wood in stock which is included in this.

President.—It comes to Rs. 51 a ton.

Mr. Bawaney.—Russian wood coming from Japan cost us from Rs. 127 to Rs. 130 a ton.

President.—I think we might take it at 4 annas a gross approximately.

Mr. Bawaney.—No, because it does not include the cost of case, because for four or five months in the beginning we were not sending matches to India and therefore we were not giving cases but in the end of 1926 there are some which included cases.

President.—If you reduce the cost of wood for splints and veneers we have to add 25 c.ft. for boxes so that it will come to very much the same thing.

Mr. Bawaney.—It will come to about 6 annas per gross because it will take half a cubic foot of wood and calculating at 12 annas per c.ft. at the rate of Rs. 35-8-0 a ton it comes to six annas.

President.—Have you got the figures that I asked for about quantities and prices?

Mr. Bawaney.—The figures for 1924 and 1927 are not ready.

President.—What is the last month for which you have got complete accounts?

Mr. Bawaney.—We go into the figures at the end of every year. We cannot prepare this before the 30th June.

Mr. Mathias.—As regards this cost of wood you have told us that in the year 1925-26 owing to the inexperience of the workmen a good number of splints and veneers were spoilt. I think it came to about 40 per cent. in 1925 and it has been since reduced to 15 per cent.

Mr. Bawaney.—These figures for 1925-26 are figures for the whole of 1925-26 from 1st July 1925 to 30th June 1926.

Mr. Mathias.—Since 1st July 1925 there has been considerable improvement.

Mr. Bawaney.—That is so.

Mr. Mathias.—So that quite a considerable proportion of the splints and veneers which were previously spoilt are now turned out in a satisfactory condition?

Mr. Bawaney.—We have not gone into the exact figures but there has been considerable improvement.

Mr. Mathias.—And that would of course affect the cost of wood if you make more splints and veneers, would it not?

Mr. Bawaney.—Yes, there would be a certain reduction in cost.

Mr. Mathias.—Might we put it somewhere about 9 pies?

Mr. Bawaney.—From 3 pies to 6 pies. I can't give exact figures, I am afraid.

Mr. Mathias.—But this 6 annas that you have given is an average figure, is it not?

Mr. Bawaney.—Yes.

Mr. Mathias.—In 1925, at any rate in part of it, almost half of the wood which was used for veneers was spoilt?

Mr. Bawaney.—In the beginning it was 40 per cent.; there has been great improvement since then.

Mr. Mathias.—At present it is about 15 per cent., is it?

Mr. Bawaney.—At present we are losing about 25 per cent.

Mr. Mathias.—I understand you expect in the future to be able when your workmen become more experienced to reduce that to about 5 per cent.

Mr. Bawaney.—When the workmen become efficient it is possible that the wastage would be reduced to 5 per cent.

Mr. Mathias.—Not at present, but in the future when your workmen are fully trained—not necessarily working in your factory, but in some other factory—is it possible to reduce this figure of annas 6 and if so by how much?

Mr. Bawaney.—About 20 per cent.

Mr. Mathias.—That will be a reduction from annas 6 to annas 4 pies 6.

Mr. Bawaney.—A little more than 4½ annas.

Mr. Mathias.—We may take it at 4½ annas roughly.

Mr. Bawaney.—Yes, if the price of wood remains about the same.

Dr. Matthai.—This reduction in the cost of wood from 1924-25 to 1925-26 is partly the result of improvement in the efficiency of your labour and partly the result of reduction in the cost of labour.

Mr. Bawaney.—Yes.

Dr. Matthai.—You said in reply to Mr. Mathias that you expect in the future a reduction to somewhere about 20 per cent. on account of the improvement in the quality of labour.

Mr. Bawaney.—Yes.

Dr. Matthai.—Did that 20 per cent. occur as between 1924-25 and 1925-26?

Mr. Bawaney.—Yes.

President.—As regards the cost of papers for labels and wrappers, I want to ask you a general question. You have made this Table II by simply dividing the number of boxes.

Mr. Bawaney.—Yes.

President.—How do you keep your works cost sheets?

Mr. Bawaney.—We don't maintain cost sheets.

President.—If you don't keep your works cost separately, how can you check the progress in the works?

Mr. Bawaney.—We are considering the matter and thinking of introducing the system of cost sheets.

President.—In a very big factory like yours, it is important that you should have cost sheets.

Mr. Bawaney.—We are going to overhaul our account system altogether. We will analyse every year the costs under each head.

President.—For instance take the case of chemicals. You would not know whether any chemicals are wasted or not if you don't keep cost accounts.

Mr. Bawaney.—That is so.

Mr. Mathias.—If you don't know your cost, you would not know how much you would be able to reduce your rates.

Mr. Bawaney.—Quite true.

Mr. Mathias.—With regard to the cost of papers for labels and wrappers, when your workmen become efficient I suggest that in future it might be possible for you or to some other factory to reduce from one anna to 9 pies.

Mr. Bawaney.—I don't think it would make much difference in the cost of wrapper. There is not much wastage in paper.

Mr. Mathias.—I say not so much in your factory but in big factories, sometimes the machine jumps and 4 or 5 boxes get spoilt with the paper on them. That also happens in your factory, I take it.

Mr. Bawaney.—If we are making 11 lakhs of boxes in a day, and if during the day 5,000 boxes are spoilt, it would not amount to a great percentage. Sometimes when boxes are spoilt, they can be repaired.

Mr. Mathias.—The amount of wastage was very considerable in the beginning.

Mr. Bawaney.—We were then spoiling a lot of boxes, but not paper.

Mr. Mathias.—In future even when your own works and similar works would reduce the rejected boxes to 10 per cent., the cost would still stand at one anna for labels.

Mr. Bawaney.—There would not be much difference. As regards paper even in 1924-25 and 1925-26 it remained the same.

President.—As regards the cost of chemicals, you have brought down the cost from annas 3 pies 3 to annas 2 pies 6. What is that saving due to?

Mr. Bawaney.—Formerly we were using most of the chemicals from Japan. Now we are importing from Germany and elsewhere and we get better purity and consequently use less chemicals. We have reduced the proportion of some of the costlier chemicals and use the cheaper ones which will do for our purpose We are going into the matter. The more we understand the business the more we can see the direction in which it is possible to reduce our cost.

President.—Do you expect any further reduction in the cost of chemicals when your output increases?

Mr. Bawaney.—I don't think there would be any reduction in the cost of chemicals, because the quantity required would be in proportion to the matches produced.

President.—You can get more out of the same quantity when you are making larger quantities.

Mr. Bawaney.—There is no wastage in chemicals. At the most we may be able to improve the cost by a pie or two pies.

Dr. Matthai.—You don't think as a result of further experiments in your factory, you can economise still more in the use of costlier chemicals.

Mr. Bawaney.—We don't think there will be any such improvement, because so far we have done all the experimenting work that was to be done.

Dr. Matthai.—These chemicals that you are now getting from Germany, are they more expensive than the chemicals you used to get from Japan?

Mr. Bawaney.—The Japanese chemicals were cheaper in price but the purity of the German chemicals is higher. We get more percentage of the constituent. Although apparently it costs more, it is cheaper.

Dr. Matthai.—Quality for quality German chemicals are less expensive.

Mr. Bawaney.—Quality for quality the German chemicals are cheaper, but quantity for quantity the Japanese chemicals are cheaper. It is quite possi-

ble that the cost of chemicals may go up by a pie or two when we try to make these more damp proof than they are at present.

President.—Impregnating may also increase.

Mr. Bawaney.—Yes.

President.—It may remain more or less in the neighbourhood of these figures.

Mr. Bawaney.—Yes.

President.—What are these other raw materials in which there is a substantial reduction from annas 3 pies 3 to anna 1 pies 7?

Mr. Bawaney.—Soldering hoops, nails, etc.

Mr. Mathias.—Do you include zinc sheet in that?

Mr. Bawaney.—Yes.

Dr. Matthai.—Do you call glue a chemical?

Mr. Bawaney.—Yes.

Mr. Mathias.—And wax?

Mr. Bawaney.—Yes.

Mr. Mathias.—Is match paper, blue and green, included in the cost of other raw materials?

Mr. Bawney.—The cost of paper, labelling, printing paper and wrapping paper is included in the cost of other raw materials.

Dr. Matthai.—Glass powder.

Mr. Bawaney.—In chemicals.

Mr. Mathias.—All paper is included in item No. 2.

Mr. Bawaney.—Yes.

President.—Does printing ink come under chemicals or what?

Mr. Mathias.—May we take it that item No. 4 "Cost of other raw materials" practically represents the cost of zinc sheets?

Mr. Bawaney.—Under other raw materials are included zinc sheets, labels and printing ink. Formerly we were importing labels, but now we have a printing machine. It is not cheaper to print the labels here but the advantage is that we have not to keep a large stock of labels. If we get them printed in other countries, we have to keep a large stock of labels. When we print labels ourselves, we have not to keep a large stock of labels of different kinds, so there would not be any improvement in the cost of labels.

President.—You get certain paper from Sweden and certain paper from Japan.

Mr. Bawaney.—We buy label printing paper from Japan and all the rest through our agent in Europe. He buys for us from whichever place he gets cheapest.

Labour.

President.—The biggest item in this list is labour which is higher than I should have expected. The smaller factories say that their costs come to about four annas.

Mr. Mathias.—Does your labour include supervision?

Mr. Bawaney.—It includes the Manager.

President.—It is a big item and I should look forward to a large economy in that.

Mr. Bawaney.—It comprises 31 sub-heads.

President.—You have not given us any charge for general supervision.

Mr. Bawaney.—All that is included in labour.

President.—The total expenditure under factory labour comes to Rs. 5½ lakhs. How much of that would you assign for supervision?

Mr. Bawaney.—About Rs. 50,000, for Manager, Engineer, Chemist, and experts.

President.—What experts?

Mr. Bawaney.—The machinery experts.

President.—The rest (Rs. 5½ lakhs minus Rs. 50,000) comes under ordinary factory labour.

Mr. Bawaney.—Yes.

President.—In 1924-25 your factory labour came to about Rs. 3,10,000 and your output was 5,00,000 gross. Then your output went up to nearly 10,87,150 gross—about double—and the wages did not go up in the same proportion.

Mr. Bawaney.—At the end of 1924, we were using inner and outer boxes imported ready made from Japan. In October 1924, we started our peeling machine. So from June to October, this expense was not necessary.

President.—Under what head did that come?

Mr. Bawaney.—From July to October, all the labour charges on box making were saved because we were using ready made boxes imported from Japan.

President.—Under what head have you put it?

Mr. Bawaney.—Under heading No. (4) Cost of other raw materials. You will see that there is a reduction in that.

President.—The increase may be taken more or less in the same proportion as the increase in the output. What I am trying to point out to you is that factory labour in 1924-25 included the cost of boxes.

Mr. Bawaney.—Yes, for three months.

President.—It was included in the cost of other raw materials.

Mr. Bawaney.—Yes.

President.—How much did you save in that way?

Mr. Bawaney.—About Rs. 12,000.

President.—That would come to Rs. 3,20,000.

Mr. Bawaney.—Yes.

President.—Then, the labour went up to Rs. 5,50,261.

Mr. Bawaney.—Yes, when the output was nearly doubled.

President.—When your output goes up to 18 lakhs from 10 lakhs, what saving do you expect? By how much would you have to increase your labour charges?

Mr. Bawaney.—We think that there would be a saving of 10 to 15 per cent. in labour charges.

President.—It should be more. The reduction as compared with 1924-25 is more than that already.

Mr. Bawaney.—In 1924-25, our labour was absolutely raw.

President.—In spite of that you saved Rs. 97,000.

Mr. Bawaney.—In 1924-25, the labourers were absolutely raw hands. So, there was a saving when they improved in 1925-26. Now we cannot make a very great saving as compared with 1925-26.

Dr. Matthai.—Has there been any change in the rate of wages?

Mr. Bawaney.—No.

Mr. Mathias.—Even if your output increases to 18 lakhs you will employ no more labour.

Mr. Bawaney.—Not in certain processes. For instance, for carrying splints, we will require more labour.

Mr. Mathias.—Your labour on the peeling machines and chopping machines would be the same.

Mr. Bawaney.—Yes, but in the case of frame filling and other machines, we will have to pay more in the form of bonus

President.—Take the Simplex machine. It is cheaper than frame filling.

Mr. Bawaney.—We are still doubtful about the Simplex machine. We are not sure whether we would be able to work it successfully or not. The difficulty about the Simplex machine is that if anything goes wrong, the whole thing will have to be stopped.

President.—If the machine is a good one, it must lead to a reduction in the operating cost.

Mr. Bawaney.—If we are able to work the Simplex machine successfully, then there would be a little reduction but not much.

President.—In your case there is no reason at all—unless of course the cottage factories are sweating their labour—why your labour should cost as much as eight annas when their costs are only about 4½ annas.

Mr. Bawaney.—I have already explained to you that it must cost us more for our factory labour than a cottage industry.

Mr. Mathias.—Do you pay the same piece rate as the cottage industry?

Mr. Bawaney.—We pay the same rate for box filling.

President.—When you adopt machine filling, would it not cost you less?

Mr. Bawaney.—Yes, only if we employ all the Simplex machines.

President.—Can you give me a comparison between the costs of working on the Simplex machine, that is doing everything by machinery, and the costs of working by hand labour. In the case of the Simplex machine, everything would be done by machinery right up to despatch really speaking.

Mr. Bawaney.—Yes.

President.—If you work under those conditions, I should like to know whether there would be any reduction from eight annas to about four annas.

Mr. Bawaney.—No it cannot be reduced from 8 annas to 4 annas, but there will be some reduction because salaries include all expenditure on supervision, stationery, telegrams, and everything else.

President.—What I want you to do is to separate the actual factory labour from the other factory charges. Can you give me a separate list?

Mr. Bawaney.—Yes.

President.—What is the salaried establishment?

Mr. Bawaney.—Rs. 3,34,655 including office staff and manager.

President.—In that establishment would there be a proportionate increase if your output went up from 11 lakhs to 18 lakhs? You are not going to have any more machinery; your factory is equipped to produce 6000 gross a day, is it not?

Mr Bawaney.—Yes.

President.—Of course when the output increases there will be more materials to fetch and more materials to remove and so on, but I don't see why you should have any other increase?

Mr. Bawaney.—Those persons who are removing the materials are salaried workmen, but to people making boxes we pay a bonus, a fixed salary *plus* a bonus for increased output.

President.—Can you give me the amount of the total bonus in the year?

Mr. Bawaney.—Rs. 28,246 for 1925-26.

President.—You may say that the bonus may be doubled. You have given me the number of salaried men and there will be an increase in the salaried men if you are to remove more materials, but as regards the rest there should not be any great increase. What I mean to say is that for half the expenditure that you now incur there won't be a large increase, but as regards the other half there may be an increase in the same proportion as the increase in output. Taking it that way can you give me an estimate of how much you can reduce?

Mr. Bawaney.—At the most 12½ per cent. All the higher salaried men are included in this 8 annas, also bonus, overtime and things of that sort. There cannot be much reduction.

President.—If you say that the industry is not going to make any progress at all you are weakening your case. I want to satisfy myself that you are going to make some progress, but if you are going to keep your cost as it is now you are weakening your case. I am not talking of the present moment, but say four or five years hence you ought to be able to show some progress. If you keep your costs at that you won't be able to show that you can do without protection.

Mr. Bawaney.—As I explained before, when our men become more efficient we won't require these experts whom we now employ and that will mean a saving of Rs. 25,000 a year. Then again we can reduce the salaried staff.

President.—Under the head "ordinary current repairs" you have got a big charge of Rs. 1,12,000. It is more than your depreciation. It is rather a heavy charge?

Mr. Bawaney.—The figures for 1924-25 were not debited in that year so they have been included in 1925-26.

President.—What should we take per gross on the total output?

Mr. Bawaney.—It would be about an anna.

Power and Fuel.

Dr. Matthai.—What do you include in your power and fuel? Is it entirely electricity?

Mr. Bawaney.—In 1924-25 we had to use fuel in addition to the electric current, now we are not using fuel.

Dr. Matthai.—In 1925-26 the price that you include here, does that mean both electricity and fuel?

Mr. Bawaney.—Yes, electricity as well as fuel.

Dr. Matthai.—In your written statement you have told us that the cost of electricity per 100 gross was Rs. 2-12-0. That works out to 5 pies per gross. That I take it would be your future cost for your power, that is to say you can reduce this 10 pies to 5 pies?

Mr. Bawaney.—I think in future it would come to about 9 pies.

Dr. Matthai.—I thought you got this figure of Rs. 2-12-0 on your recent experience?

Mr. Bawaney.—Our electricity bill consists of two parts, so much per H. P. and so much per unit. The figure we have given of Rs. 2-12-0 is only approximate. I think if we keep it at 9 pies it would be a fair charge.

Mr. Mathias.—This Rs. 2-12-0 includes both horse power and unit charges? Why should you say 9 pies is a fair charge?

Mr. Bawaney.—We have worked it out on the basis of so many working days a month and dividing it on that basis we have arrived at what it would come to per gross.

Mr. Mathias.—Then Rs. 2-12-0 is not an exact estimate at all?

Mr. Bawaney.—It is only approximate.

Current Repairs.

Mr. Mathias.—What is included in this item "ordinary current repairs"?

Mr. Bawaney.—Reclamation, that is levelling of the lands, etc., repairs to the walls, boiler repairs and so on.

Mr. Mathias.—What is the biggest item in this?

Mr. Bawaney.—General stores and machinery parts.

Mr. Mathias.—General stores are not current repairs?

Mr. Bawaney.—Belting, oil, bolts and nuts and things of that sort that are used in repairs we have included in current repairs.

Mr. Mathias.—Do you mean to say you used all these bolts in a year?

Mr. Bawaney.—Yes.

Mr. Mathias.—The other big items are stores, repairs and improvements. What exactly are the stores?

Mr. Bawaney.—Oil, bolts and nuts, belting, soldering, etc. There are about 200 items.

Mr. Mathias.—Instead of putting oil under a separate head and so on you have lumped together these minor items.

Mr. Bawaney.—Yes.

Mr. Mathias.—You do not include oil under a separate heading nor under miscellaneous.

Mr. Bawaney.—No.

Miscellaneous charges.

President.—What is included under miscellaneous?

Mr. Bawaney.—Commission to our European agent, commission to the Japanese agent, Municipal tax, land revenue tax, godown rent, fire insurance.

President.—All these expenses would not go up when the output increases.

Mr. Bawaney.—Only insurance might go up.

Mr. Mathias.—Why has it gone up from anna 1 pie 1 in 1924-25 to anna 1 pies 4 in 1925-26?

Mr. Bawaney.—Insurance and godown rent have gone up.

Mr. Mathias.—It doesn't include any allowance for bad debts.

Mr. Bawaney.—No.

President.—You have bad debts along with depreciation.

Mr. Bawaney.—Yes.

President.—How much do you include for bad debts?

Mr. Bawaney.—Rs. 30,000.

President.—As much as that.

Mr. Bawaney.—At that time we had Rs. 7 lakhs outstanding.

President.—That is a big percentage.

Mr. Bawaney.—On an average we must have Rs. 35,000 as bad debts. We are doing about Rs. 20 lakhs business in a year. All are on credit.

President.—In these costs that you have given, where have you entered the commission that you have to allow to your agents? Has it gone in here?

Mr. Bawaney.—No.

President.—Do you have to add the commission to this?

Mr. Bawaney.—It will have to be added. It comes to about anna 1¼.

Total costs.

President.—Let us take your figures for the present. It is just now Re. 1-6-2. To that you have to add anna 1 pies 6 commission which brings it up to Re. 1-7-8. Now you have got to add to that depreciation, interest on capital, is it not so?

Mr. Bawaney.—Yes.

President.—Now you want 6¼ per cent. depreciation on machinery. You gave the value of your machinery at Rs. 11 lakhs.

Mr. Bawaney.—Yes.

President.—6¼ per cent. of that is Rs. 66,000.

Mr. Bawaney.—Yes.

President.—We will have to take your full output as 18,00,000 of gross boxes. It comes to pies 7 per gross.

Mr. Bawaney.—About that.

President.—Your total investment comes to Rs. 35,00,000 roughly.

Mr. Bawaney.—Yes.

President.—12 per cent. on Rs. 35 lakhs comes to Rs. 4,20,000, so it would be about annas 3 pies 8.

Mr. Bawaney.—About that.

President.—That comes to Re. 1-12-0.

Mr. Bawaney.—Yes, on the basis of Re. 1-6-2 as cost.

President.—The import price is now Re. 1-4-0 so that you have got to reduce your cost by at least annas 8 to do without protection.

Mr. Bawaney.—Yes.

Mr. Mathias.—Assuming that there is no prejudice in favour of the foreign matches.

Mr. Bawaney.—Yes.

President.—You must show that you can reduce your costs by this amount.

Mr. Bawaney.—When the matches become better known and the prejudice is gone, we won't have to sell on as long a credit as we do now. There will be a saving of interest on Rs. 7,00,000. When the demand increases, we won't have to keep a big stock. As we produce we will supply direct from the factory to the trader. Perhaps we would have some orders on hand which we would take sometime to supply. Thus we will have a saving of interest on Rs. 5,00,000. That would make a reduction of Rs. 12,00,000 in the capital account. As our workmen become more efficient and as our daily output increases, we will be able to reduce our piece rate.

President.—About annas 4 to annas 6 when the industry is on a good footing, when the prejudice is gone and when you are able to organise your sales better.

Mr. Bawaney.—Yes.

Selling price.

President.—The present position is this: Matches are being sold at about Re. 1-6-0 to Re. 1-8-0 in the country. If there were no matches manufactured in the country and even if we took the average import price of foreign matches, they would sell at Rs. 2-12-0 after paying the duty.

Mr. Bawaney.—About that.

President.—At present you require Re. 1-12-0. Is there any reason—supposing the Government wanted revenue—why the price of matches in the country should not be raised to Rs. 2-8-0 by levying an excise?

Mr. Bawaney.—This can be done when the Government totally stops the importation of foreign matches.

President.—Annas 12 or Re. 1 excise is put on and the duty is also raised to Rs. 2-4-0 or Rs. 2-8-0.

Mr. Bawaney.—At present the difference between the two rates is Re. 1-12.

President.—Re. 1 excise and Re. 1 extra duty would leave you where you are.

Mr. Bawaney.—Foreign matches will command 50 per cent. of the sales.

President.—Why should they? Their price will go up by Re. 1.

Mr. Bawaney.—Both the prices will go up. If this excise duty is levied now and an addition is made in the import duty, we will be left where we are. The position will remain the same.

Mr. Mathias.—Except that the imported matches will be so much more expensive that the people who at present use them may not be prepared to pay so much for them and may be prepared to take your matches.

Mr. Bawaney.—The public won't be affected much. The man who pays one and a half pice will have to pay 2 pice and he will be prepared to pay if he has the prejudice.

President.—Does there not come a stage when the consumer will say, however prejudiced he may be, "if the prices are pushed up I cannot pay so much, I will buy the Indian match for 1½ pice."

Mr. Bawaney.—So far, our experience has been that people prefer to buy the Swedish matches even though their costs are 50 to 100 per cent. higher than ours.

Mr. Mathias.—That is at your present price. If the prices are put up it would be very much more expensive to buy foreign matches.

Mr. Bawaney.—It is not such a dear commodity that people would hesitate to buy at 2¼ pice per box.

Dr. Matthai.—The imported matches are selling at Rs. 2-12-0 per gross. Add another Re. 1-8-0 to that and make it Rs. 4-4-0. Do you mean to say that there would be the same demand for imported matches at Rs. 4-4-0 per gross as there would be at Rs. 2-12-0 per gross?

Mr. Bawaney.—If the prices of our matches remained stationary, then of course the demand for foreign matches would fall off considerably.

Dr. Matthai.—The way I look at it is this. There are people who buy imported matches and they say "it will be worth while to buy these matches at Rs. 2-12-0 per gross but as the price has gone up to Rs. 4-4-0 I am not prepared to pay so much. I would rather buy locally made matches which I can get at somewhere about Rs. 2-8-0 per gross which will serve my purpose equally well."

Mr. Bawaney.—If the consumers were to think on those lines, they would undoubtedly stop buying foreign matches.

President.—A man may buy foreign matches at Rs. 2-12-0 per gross but may not buy them at Rs. 4-4-0 per gross.

Mr. Bawaney.—So far as my belief goes, I think that if our prices are also raised and if the Swedish matches cost only 50 per cent. or so more as they are doing now, the sales of foreign matches won't fall off.

President.—You are not asking for any increase in the duty. You only want the same duty to be retained. By not raising the duty, how will you be able to push out the Swedish matches from the country?

Mr. Bawaney.—If no excise duty be levied on indigenous matches and if the duty be increased by eight annas on foreign matches, the sales of foreign matches will fall off. That is the only way. We are afraid that if the duty of Re. 1-8-0 were to be reduced, the Swedish matches would command even more sales than they are doing now. So, we say that to maintain the present position, the duty should not be reduced. But if the Indian matches are to command a bigger sale, then the duty should be increased by eight annas.

Mr. Mathias.—I say that your sales will steadily increase as the quality of your matches becomes known.

Mr. Bawaney.—But that will take time.

Mr. Mathias.—The import figures indicate that that process is fairly rapid. The imports have been reduced by one half in three years.

Mr. Bawaney.—Hereafter the reduction won't be so rapid because we are not able to make much more headway amongst those poor customers who have to buy the cheapest kind they can get. They are already buying our matches. The rest are people who can afford to buy matches at a higher price. To make them buy our matches would take a long time. They could only be

converted gradually. So, we cannot go on the basis of the figures of the last four years.

Mr. Mathias.—The reduction in the import of matches has been greater. You cater for poor people. You expect that the reduction would be more rapid in the beginning.

Mr. Bawaney.—In the beginning, the poor bought our matches because they were cheap. But the quality was then bad and they became prejudiced and stopped buying. Again when the quality improved, they began to buy. They are buying again as they appreciate our quality.

Mr. Mathias.—I suggest that the rich people will also buy your matches as soon as the quality becomes generally known.

Mr. Bawaney.—I admit that but what I say is that it will take time. I also think that the rich also will be converted gradually as they come to realise our quality. Their conversion will not be so rapid.

Mr. Mathias.—I understand that you have no difficulty in selling your matches.

Mr. Bawaney.—At present we experience no difficulty.

Mr. Mathias.—You are selling your matches at remunerative rates.

Mr. Bawaney.—I don't think that we are making any profit at present.

President.—We will take these figures which you have given for the sake of argument. Supposing to-day there is a prejudice in their favour of about fourteen annas, part of it may be due to the difference in quality and the money value of the prejudice may be ten or twelve annas. Supposing the duty was raised to Rs. 2 (Rs. 2-12-0 per gross *plus* 0-8-0) then their price will go up to Rs. 3-4-0. If we put on an excise duty of one rupee, then the duty will have to be raised to Rs. 3, so that their price will go up to (Rs. 3-4-0 ***plus*** Re. 1) Rs. 4-4-0. Supposing your fair selling price is Re. 1-12-0, then your price would come to Rs. 2-12-0. That would give you an advantage over the foreign article to the extent of Re. 1-8-0 (Rs. 4-4-0 *minus* Rs. 2-12-0).

Mr. Bawaney.—Then we would be able to cover the ground at present covered by them.

President.—And the Government revenue will be what it was before more or less.

Mr. Bawaney.—It would be more.

President.—It is now Re. 1-8-0 on the imports. There would be one rupee excise and Rs. 3 on the imports.

Mr. Bawaney.—Government will gain in other ways also. Government will get additional revenue in the shape of Customs duty on the materials imported by us. They will get royalty on the wood consumed by us and they will get additional income-tax.

President.—In order to leave the Government where it would have been, if there had been no manufacture of matches in India, it might be necessary to increase the import duty by Re. 1-8-0 and to impose an excise duty of one rupee per gross. Then, there is the Swedish Company in the country itself. What about that?

Mr. Bawaney.—That requires deep consideration.

Conditions of extracting timber.

Mr. Mathias.—In your reply to question 99 (*a*) you say that efforts should be made by Government to grow suitable species of wood in India and Burma. You don't suggest, do you, that Government should undertake to plant these species even if they proved to be unremunerative?

Mr. Bawaney.—No, we don't want the Government to be a loser by doing it, but I don't think they will lose.

Mr. Mathias.—In reply to question 99 (*b*), you say that in Burma instead of inviting tenders for leasing forests Government should fix the minimum

rate of royalty. Would not that give rise to complaints that one company is being favoured at the expense of another? We have heard the same suggestion from the Muslim Match Factory. They also thought that there would be some difficulty. But their point of view is that Government should fix a small royalty and that Government should give the right of extracting wood to the small factories who employ hand labour.

Mr. Bawaney.—But the forests of Burma would be able to supply all the requirements. If, instead of asking for tenders, Government were to fix a reasonable royalty and allot to the various manufacturers forests sufficient for their requirements, the big manufacturers won't be able to shut out the small manufacturers. Suppose there are two factories each requiring 5,000 tons; one has got forest sufficient for its requirement and then Government calls for tenders for another forest which yields 5,000 tons. The other factory which has already got a forest may tender for this one at a higher rate and the other factory won't be able to get the forest.

Mr. Mathias.—Just so. Consider what would happen in the case of fixing a minimum royalty. Your suggestion is that Government should divide up the forests and give one to one factory, one to another and so on. Now, you have got these two forests. I gather from the evidence which was tendered by the other match factories that they would like very much to have the forests which you hold. If the royalty had been fixed how was Government to decide which of those match factories should have a particular block.

Mr. Bawaney.—Government could allot to them in proportion to their requirements.

Mr. Mathias.—My point is this. Your answer overlooks the most important thing, namely that if one factory gets a forest which is more conveniently situated for cheap extraction, then the other will complain that this factory has been given preference; they will say "it is just the forest we wanted."

Mr. Bawaney.—But there is another disadvantage in calling for tenders. The forest department has not as yet made a complete investigation into the matter of the supply of match wood. Suppose a factory sends its own men and finds a convenient forest, it will approach Government and say "this is the forest we want." Then Government calls for tenders and another person tenders at a rupee higher than what he offers. Then the latter will get the forest and all the trouble taken by the factory will be wasted. One man takes the trouble and the other man gets the benefit. If Government does not have enquiries made about suitable forests the match manufacturers also won't do it and then things will remain the same.

Sea freight.

Mr. Mathias.—I am afraid that does not answer my question. Then in answer to question 99 (*d*) you say "The freight by sea on matches exported from Burma to India is high at present and should be reduced." That is a matter of arrangement between match companies and shipping companies, is it not?

Mr. Bawaney.—We are merely placing our difficulties before Government so that if there is anything that can possibly be done, they might do it.

Import duties on Chemicals, etc.

Mr. Mathias.—The same thing applies to chemicals and papers, etc., when you suggest in answer to (*e*) that the import duty on chemicals, papers, etc., should be reduced. Having regard to what the President told you the other day regarding the scope of this enquiry and the need of suggesting means by which Government can recoup the revenue lost by the decrease in the import of matches, you would hardly suggest that further reductions should be made. Then in (*f*) you say "The rates of municipal taxes are too high at present and should be reduced." You would not really suggest that this Board should take up the whole question of municipal taxes with reference to the match enquiry?

Excise on factories run by foreign capital.

President.—Let us revert now to the question of excise. If we increased the duty to, say, Rs. 3 and levied an excise of one rupee, it will give to the Indian manufacturer an advantage of at least Re. 1-6-0. If the costs go down by 4 annas or 6 annas it will give him still greater advantage. In that case the Swedish company here will also get the benefit and it will be able to compete better against you. In such a case what would you propose?

Mr. Bawaney.—We propose that if an excise of one rupee be levied on us then on companies with foreign capital the excise duty should be higher.

President.—Don't you see they do not come here as a Swedish company, they call this an Indian company. They are trying to get round the law or get round the prejudice whatever you like to call it, in the country. They come here, they stand behind Indian names; they raise Indian rupee capital and call it an Indian company.

Mr. Bawaney.—Their aim is to control the match business all over the world and if they can find any loophole they will take advantage of it and therefore it is the business of Government to see that they cannot get a loophole, and can't come into India.

President.—If it is a *bonâ fide* Indian company it is a different matter, but if the Government came to the conclusion that it was a Trust which was to the prejudice of the country, then they might declare any Trust illegal and in that way something may be done, but short of that, if it called itself an Indian company, you cannot suggest that discriminating excise should be levied?

Mr. Bawaney.—From the prospectus you will be able to see what is their aim. There is another way in which they would act. Formally they would start an Indian company and then they would go on suffering losses so that the Indian shareholders will get tired. Then they would get hold of these shares and control the whole thing. In this way they will make the Indians lose their capital for their own benefit. We are afraid that unless there is some provision these people will crush the industry some day and will have all the Indian match business in their own hands as they have done in other parts of the world.

President.—That is just the point; if what you say is true what methods would you suggest to prevent this?

Dr. Matthai.—When Government grant bounties to Indian companies, they say the company must be registered in India, the capital must be on a rupee basis, it must have a certain number of Indian directors and it must give training to Indians. Suppose all these points are satisfied by this company, how are we to proceed?

Mr. Bawaney.—They are certainly not of such a charitable nature that they will train up Indians so that the industry of their own country might suffer.

Mr. Mathias.—The point is this: all these conditions may be imposed, but having imposed them it will be extremely difficult to enforce any sort of discriminating excise, one amount on the Indian firms and another amount on the foreign firms, because there is no means of discriminating between the two.

Mr. Bawaney.—It would be quite easy to find out whether the financing is done by the Swedish Trust.

Mr. Mathias.—I think it is extremely difficult to find out. It may raise all the capital in India and there may be Indian directors?

Mr. Bawaney.—Government may have a penal clause for such underhand tricks.

Mr. Mathias.—You have got to prove an offence first.

President.—The point is this, supposing first of all, as I pointed out to you, the existence of the Trust was established it must be shown that it was working to the prejudice of the country. When both these things have been estab-

lished then we have got to consider whether there are any practicable remedies to be applied. Now, as regards the Trust what evidence have you got that it is a Trust?

Mr. Bawaney.—I have got their balance sheet of 1924 which will show that it is a Trust (handed in).

President.—It does appear that it is their intention apparently to establish themselves in as many countries as possible. We shall examine the Swedish Company on these points. We have also other documents in our possession. I do not wish to examine you on these points. So far as you are concerned did they make any attempt to acquire your business?

Mr. Bawaney.—They did.

President.—When was this?

Mr. Bawaney.—March, 1925.

President.—That was after they issued their new capital in England in 1924.

Mr. Bawaney.—Yes.

President.—What was the proposal made to you?

Mr. Bawaney.—They told us that their idea was to control the match industry all over the world and that we would not be able to compete against them and make a profit and that if we wanted to sell our factory, they would buy it up at whatever it cost us.

President.—Did they offer you the cost price? There was not anything wrong in that. It was a business transaction.

Mr. Bawaney.—At that time the price of machinery had fallen down, but they said that they would reimburse us by paying whatever it had cost us. They informed us that they had 80 years' experience of this business; they were manufacturing their own paper, the machinery and also the chemicals; and that in these circumstances it would not be possible for us to compete with them successfully. They asked us to consider all these things over well. They also said that it was a golden opportunity for us and that we should not let it go. If we sold our factory we would get back our money and we would not get such an opportunity afterwards.

President.—Have you got a written document to prove it?

Mr. Bawaney.—This is the copy of a letter dated 16th April, 1925, from Mr. Littorin (handed in).* This was written after the negotiations had fallen through.

President.—Here they suggested as though they wanted to do business with you.

Mr. Bawaney.—We replied that we would not sell the factory. In any case we wanted to keep the factory. Then they proposed that we should do business jointly. They said that if we let them have the management of our factory on account of the long experience they would be able to do everything well and cheaply as if it was a Swedish factory.

President.—What interest did they offer you in this partnership?

Mr. Bawaney.—They offered us 40 per cent. and they wanted to take 60 per cent.

President.—They wanted that in order to have control?

Mr. Bawaney.—Yes. There was a condition that in three or four years' time if we were not making a profit, they would give us 6¼ per cent. on our 40 per cent. and buy up our 40 per cent.

President.—They insured themselves by 6¼ per cent.?

Mr. Bawaney.—Yes and we thought that their policy was to make us lose, to get us tired and after buying up our share to have full control.

Mr. Mathias.—Exactly what does the proposal amount to? If, in three or four years' time, you made no profits, they should have the option of paying you 6¼ per cent.

---

* Supplementary Statement No. 3.

Mr. Bawaney.—We would have the option. We would ask them 25 per cent. more on this as interest and hand over the factory to them.

Mr. Mathias.—There was nothing binding on you. It was left entirely to you.

Mr. Bawaney.—That is true. If they are going to make us lose every year about 20 per cent. instead of incurring that, we would prefer to get 105 per cent. by selling our interest.

President.—Your case is that they were insuring themselves in this way so that they might get control of the whole business after 4 years by paying 6¼ per cent. on your share.

Mr. Bawaney.—We didn't agree to that, because Mr. Adamjee wanted to see this industry established here and under his own control.

President.—Then what happened?

Mr. Bawaney.—Mr. Littorin when going said "Mr. Adamjee, you are letting a golden opportunity slip by and you will remember me later on and you will be sorry."

Mr. Mathias.—Have you had any reason to feel sorry for refusing the offer?

Mr. Bawaney.—Not up till now, but then there is the future to consider. We do not know what will happen then. We find from the prospectus of their Company that their capital is Rs. 16 crores and they have got a reserve fund of Rs. 8 crores and they are making a profit of Rs. 2 crores a year. They can get much financial assistance at a very low rate of interest. It would not matter anything to them to lose Rs. 5 to Rs. 10 lakhs in the business in India out of their profit of Rs. 2 crores.

President.—Did anything else happen between you and them?

Suits filed against the Company re labels.

Mr. Bawaney.—They filed 11 suits against us without giving us any notice in connection with labels. For each label they filed 3 cases. In the police court they filed one criminal case and in the High Court they filed one injunction suit and a civil suit.

President.—But you lost one of the cases.

Mr. Bawaney.—It has now gone on appeal.

Mr. Mathias.—They are all expensive cases.

Mr. Bawaney.—Yes. We have spent about Rs. 70,000 on that one case on the original side and not on the appellate side. One suit alone took three months.

Dr. Matthai.—How long did the whole litigation take?

Mr. Bawaney.—One suit on the civil side took three months.

Dr. Matthai.—That was on the original side.

Mr. Bawaney.—Yes.

Dr. Matthai.—There was also a police case.

Mr. Bawaney.—Yes three police cases. They also got tired and withdrew all the other cases. We settled the other suits on our terms. Each suit whichever party lost it would go on appeal. The matter would go up to the Privy Council. That would take Rs. 1½ to Rs. 2 lakhs. If there were 10 suits you could calculate how much it would cost.

Dr. Matthai.—How much have you spent so far?

Mr. Bawaney.—Rs. 70,000.

Mr. Mathias.—Does that suggest they wished to interfere with your business? It seems to me that—having these enormous resources you say they have—if they really wished to smash your business, they would go on with the 12 cases.

Mr. Bawaney.—They took a very wise step in what they did. They thought instead of wasting Rs. 20 lakhs in the courts they would spend it in the business to harass us.

Dr. Matthai.—When did this litigation start?

Mr. Bawaney.—25th November, 1925. These cases were very peculiar. One case was in connection with a label which was not even their own label. It was a Japanese label. They filed suits and alleged in their plaint that millions of boxes were imported by them.

President.—We don't want to go into these cases in detail. Your contention is that they filed suits against you in order to harass you.

Mr. Bawaney.—Yes.

President.—They subsequently withdrew some of the cases?

Mr. Bawaney.—Yes.

Dr. Matthai.—There is no outstanding litigation.

Mr. Bawaney.—No, except the matter on appeal.

Price cutting.

President.—Now in regard to this competition to push you out, I don't think you have said how they began to reduce the prices both of the imported Swedish matches as well as of their Indian matches. Now they sell at Rs. 2-10-0.

Mr. Bawaney.—Before March, 1925, only one brand of Swedish matches (elephant brand) used to be imported. Mostly foreign matches used to come from Japan.

President.—What about their own matches? Have they been cutting the prices?

Mr. Bawaney.—Yes, but not to any considerable extent in Burma. In India their Calcutta factory has taken a leading part in reducing the rates. They are cutting the rates day by day and the Bombay factory has also taken a leading part in this direction. When you take evidence in those localities you would be able to get all the particulars.

Mr. Mathias.—Have you any reason to suggest why, if they have adopted the policy of price cutting in India, they have not similarly followed the same policy in Burma?

Mr. Bawaney.—In Burma, even now, they are able to meet 40 per cent. of Burma's requirements by selling the Swedish matches. They are also selling their locally made matches in small quantities.

Mr. Mathias.—Do you suggest that if they reduced their prices in Burma, they would not only not be able to affect your sales very much but would reduce the sales of imported Swedish matches?

Mr. Bawaney.—Yes.

Anti-trust legislation.

President.—You have given evidence on these two points, *viz.*, the existence of a trust in India and that it is operating to a certain extent in competition against Indian concerns. As regards the third point, supposing we are satisfied for the sake of argument that that was so, what about the remedy?

Mr. Bawaney.—This is not a matter in which I can give an opinion offhand. It requires deep consideration. I cannot say anything just now. But I can say this much that if they get any loophole they will certainly hide themselves behind the law. They will do all they can to get a footing in the country.

President.—Do you know of any country where they have two different scales of duty, one for foreign capitalists and one for local capitalists?

Mr. Bawaney.—This is not a mere question of foreign trader as against Indian trader but a question of trust which tries to crush the other competitors in the field in order that it may put up its price later.

President.—Whether the capital is Indian or British, if it acts as a trust whose object is eventually to get a monopoly and to raise the price of a domes-

tic article, then you contend that every Government has the right to interfere.

Mr. Bawaney.—Yes.

Mr. Mathias.—Your suggestion is anti-trust legislation.

Mr. Bawaney.—Yes.

Mr. Mathias.—If there is to be an anti-trust legislation, I take it that you will not press the point regarding discriminating excise.

Mr. Bawaney.—We will not press it.

Mr. Mathias.—Do you consider that small cottage industries which can be started where the supply of wood is limited, constitute some protection against an attempt by the trust to corner the match market?

Mr. Bawaney.—It is a very good thing if small cottage industries can be started but I am afraid that the trust would sell its matches at such a low rate that people who would do this as a cottage industry would not be able to compete.

Mr. Mathias.—The cottage industry is very easily started.

Mr. Bawaney.—Yes.

Mr. Mathias.—The cottage industry does not require much in the way of a plant.

Mr. Bawaney.—No.

Mr. Mathias.—It can be started in places where the supply of match wood is comparatively limited and where no big factory can be started.

Mr. Bawaney.—Yes.

Mr. Mathias.—Supposing this Trust has got control over the Indian market and forced up the price to something very high, would not the natural consequence be that a number of cottage industries would be started which would be able to undersell matches produced by the trust.

Mr. Bawaney.—When once the industry is dead, it takes a long time to revive it.

Mr. Mathias.—My point is this. The price which a monopoly can charge for its product is limited by the fear of competition.

Mr. Bawaney.—Yes.

Mr. Mathias.—Therefore if a number of cottage industries can be started, it would naturally limit the price which a monopoly would ask for its matches in India.

Mr. Bawaney.—What is the guarantee that matches manufactured by the cottage industries will be able to supply the market against these people? What is the guarantee that the cottage industries themselves would not be crushed? If anybody started a cottage industry in one place, the Trust people will begin to undersell him at that place.

Mr. Mathias.—My point is slightly different. A well managed monopoly will always sell at a price which is sufficiently remunerative and will not arouse excessive competition and thereby limit its sales.

Mr. Bawaney.—Because the Swedish Trust has obtained a monopoly at Peru, a match box containing 40 sticks is sold as high as two annas there.

Mr. Mathias.—The possibility of a competitor in the form of cottage industries would limit the price which the Swedish Trust would demand. To that extent, the cottage industry might be considered a good thing.

Mr. Bawaney.—The cottage industries cannot progress when they have to compete with the Trust. Supposing they are started, the Trust people would sell their matches at such a low price that they would be crushed.

Mr. Mathias.—I want your opinion whether it would be worth while encouraging the establishment of cottage industries as a means of limiting the operation of any possible trust.

Mr. Bawaney.—Yes, it would be to a certain extent.

The Swedish Match Company in Japan.

President.—You have got representatives in Japan.

Mr. Bawaney.—Yes.

President.—Have you any information to give us as to what the Swedish Company is doing in Japan?

Mr. Bawaney.—Yes.

President.—What is your information?

Mr. Bawaney.—This is the latest information we have about the Swedish Trust from Japan. This letter is dated 1st March, 1927, and is from our business friend in Japan.

"We have received to-day a cable from our Bombay friends stating that the New Duty question is finally decided to-day and remains unchanged. This will mean the Match Factories in India will have the identical year as that of last year, regarding the Duty question.

"We understand that the Swedish Match Co. (Wimco) people are dumping the matches into your market at a ridiculously cheap rate, which of course is intended to stamp out the manufacturing of matches in your market. These people are very independent and they try to ruin the market of every place in India. They have factories in Calcutta and Bombay, and they are competing desperately in these markets also.

"We hear that they intend to have a factory in Rangoon and Madras, and it may be perhaps they are now trying to dump the goods in your market with the intention to aim for a purchase of some factory at your district, who may become tired of making further matches.

"This kind of motive they always use when they aim for their want. They have come to Japan and have amalgamated in shares with three large people of match makers, and to-day our Japanese people are losing more money than what they were doing alone. They probably wish to govern the whole world in match field. Our Japanese people are now worried why they have not sold everything to the Swedish concern, instead of reserving half share in business. This for your information."

President.—These people have got a half share in the Japanese business.

Mr. Bawaney.—Yes.

President.—Now the Japanese partners find that they are losing money?

Mr. Bawaney.—They are sorry why they did not sell away their other half share also.

President.—They have formed a combine for the purchase of raw materials?

Mr. Bawaney.—Yes. Those that have not joined the trust have formed themselves into an association and combined themselves to buy raw materials in one lot which they divide amongst themselves afterwards.

Mr. Mathias.—Is it a combine of the cottage industries?

Mr. Bawaney.—Yes. There were six factories of which three of the biggest have amalgamated with the Swedish Trust. These people are sorry now that they have amalgamated with the Trust.

Dr. Matthai.—What exactly is the position in Japan? The Trust has combined with three large factories and there are other large factories which have formed an association of their own.

Mr. Bawaney.—Yes, and the small factories also.

Dr. Matthai.—Therefore there are two associations in Japan. Are they working on some understanding?

Mr. Bawaney.—They are still fighting. The association which is outside the trust combines to buy chemicals, etc., in one lot.

Mr. Mathias.—It is some sort of co-operative society.

Mr. Bawaney.—Yes.

Dr. Matthai.—I thought that there was some understanding between the two associations with regard to the distribution of markets.

In Germany.

Mr. Bawaney.—I have not heard about that. The Swedish Trust has got about 70 per cent. shares in Germany.

President.—What is your source of information?

Mr. Bawaney.—One of my German friends has written to me on this subject. He says "Since 1920, the Svenska has taken interest in the German match industry by gradually buying shares of the leading factories. At the present day they have 65 per cent. of the total production. It must be however understood that all the employees are Germans and one cannot speak of a monopoly."

Mr. Mathias.—That is to say they have got 60 or 70 per cent. of the share capital in Germany?

In Poland.

Mr. Bawaney.—Yes. This is the American branch of the Swedish International Match Corporation. Then about Poland the position is as follows:—"The Internal Match Corporation (American branch of the Svenska) has got the right to manufacture and sell matches in Poland from 1st October 1925. This agreement is running for 20 years. In return the I. M. C. is granting Poland a loan of 6 million dollars bearing 7 per cent. interest, redeemable within 20 years. The I. M. C. is paying a yearly monopoly rent of 5 million Goldzloty (about £125,000). On the other hand the Government is getting 12 per cent. of the nett profits of the monopoly. It is however very interesting to note that the then Minister President Grabaki is now accused of concluding the above agreement against the law and Poland is suffering enormous losses and proceedings will be taken against him."

In France.

Dr. Matthai.—What about France?

Mr. Bawaney.—They are just now negotiating with France. Then the position in Peru is as follows:—

In Peru.

"There the Trust has concluded an agreement for 20 years from 1st February, 1926. The existing match factories have been closed down and the whole requirements are imported from Sweden. The price of one match box containing about 40 matches is now 2 annas. The yearly monopoly rent is 3·6 million Swedish kronen. The nett profit for the Trust is estimated at about 1·5 million Swedish kronen per year."

In Greece.

Then about Greece—

"An agreement has been concluded for 28 years. The Trust is granting the Greece Government a loan of one million pound sterling at 8½ per cent. interest redeemable within 28 years."

In Chili.

Mr. Mathias.—Have you any information about Chili?

Mr. Bawaney.—Not at present but I think I can get it. I think they have also got monopoly in Egypt. There is another rival match factory at Chili too I think.

In America.

Mr. Mathias.—And in America?

Mr. Bawaney.—In America probably they are alone.

System of Excise.

President.—I want to ask you about this excise. We have got the excise system here in some cases. When is there a Government monopoly? In this case supposing there was no question of Government monopoly but an excise duty was levied, how do you suggest it should be done? In some parts of Europe and other places they put on labels; each match box or each unit in which the article is sold to the buyer bears a Government label as a sort of stamp. Do you think there would be any difficulty if it were done in that way? Supposing you were manufacturing matches, you manufacture one million gross a year, and you go to Government and buy one million labels and on every match box you put these labels and no match box which does not bear this label is allowed to be sold, would there be any difficulty?

Mr. Bawaney.—In that case we will make more than 700,000 boxes every day and to put labels on 700,000 boxes will be an expensive job.

President.—Otherwise you will have to put them in bond?

Mr. Bawaney.—The proposal will require more serious consideration; I am afraid I cannot give my opinion offhand.

President.—I am suggesting to you whether it would not be the easier way. Any man who has got a match factory comes to the post office or some other office and buys these labels and any match box which is sold in the bazar without this label showing that the duty has been paid will be confiscated, in addition to other penalties which may present that would be a possible method, would it not?

Mr. Bawaney.—If we cannot hit upon any better or easier method we can adopt this one.

Dr. Matthai.—You can have a stamping machine. You can buy the stamps as you buy labels and then put them into the machine which does the sticking. This can be done along with the match labels.

President.—That method appears to be the simplest for the manufacturer as well as the consumer. People have simply to go and inspect the places where matches are sold and can prosecute persons who are selling matches without stamps. Otherwise you must have inspectors, you must have proper accounts and when boxes are made outside it is very difficult to keep a check.

Mr. Bawaney.—At present it appears an easy matter but there may be trouble in working it. If we can think out of any other method we will let you know.

President.—In the woven textiles they do not have an excise duty because it is very difficult, but here in this industry if you exempt all cottage match industries, then a very large percentage of matches will be produced in these small factories and it will be a serious problem.

Dr. Matthai.—Do you think it would be difficult for the small factories to send in their returns of manufacture to the Collector of Customs or the Director of Industries or whoever it might be?

Mr. Bawaney.—They will be illiterate most of them.

Dr. Matthai.—And it will always be impossible for a responsible officer to check them?

Mr. Bawaney.—That is so.

Dr. Matthai.—But it will be possible if he fixes a stamp?

Mr. Bawaney.—Yes, that can be done, but the costs will be increased.

Dr. Matthai.—They may be gummed just as labels are.

The Rangoon Match Works, Rangoon.

Letter dated 21st March 1927.

1. The firm was established in January 1924 and is unregistered.

2. All the Capital invested is held by Indians. Only three Japanese are employed as workers in the Factory.

3. The firm undertakes the whole process of making matches.

4. Originally we started our work in the month of February 1924 at No. 24, Lower Kemmendine Road, but there was a fire in May 1926, after which we closed there and started work again in July 1926 at the present site No. 6, A. V. Joseph's Godown, Mahlwagon.

5. Present equipment is capable to produce 1,000 gross per day.

6. Our Full size Match box measures $2{\cdot}2'' \times 1{\cdot}4'' \times 0{\cdot}6''$ and contains about 90 splints while the $\frac{3}{4}$ size measures $1{\cdot}9'' \times 1{\cdot}1'' \times 0{\cdot}45''$ and contains about 65 splints.

7. Until May 1926 the actual output was 1,500 gross per day but since July 1926 it is about 600 gross per day.

8. The factory is situated on the bank of the creek with a railway siding at No. 6, A. V. Joseph's Godown, Mahlwagon, and we consider it is advantageously situated in all the respects (*a*), (*b*), (*c*), (*d*).

9. (*a*) They are inferior in point of spirits, which are easily breakable and also much less white in colour than the foreign matches.

(*b*) In particular markets people prefer the foreign matches as they consider them dependable throughout the year from the past experience, while the local matches are on the market for a very short period only but as time passes the people come to know the local makes and the prejudice will disappear.

(*c*) It is rather difficult to give difference in price sufficient to overcome the prejudice against Indian Matches but As. 12 to As. 14 would represent a fair measurement of the difference in quality.

Raw Materials.

10. It is not necessary to import wood from foreign countries but in the beginning we imported wood for splints only from Japan. The c.i.f. price of this Aspen Wood comes to Yen 90 to Yen 95 per ton of 50 c.ft. (Present Exchange Rate is Yens 100=Rs. 136). Duty is paid at 15 per cent. on the c.i.f. value and the landing and transportation charges come to Rs. 8 to Rs. 10 per ton.

11. We use Sawbya (Botanical name we are not sure) and Maulettansho (Botanical name Duabanga sonneratioides) for splints and Pine from Kalaw for veneers.

We do not make packing cases.

12. Indian wood is not as satisfactory as the Aspen wood as the latter make stronger and very white sticks. The amount of wastage also in the Indian Woods is very heavy.

13. At the present rate of output, we would require about 1,200 tons per year while according to the rate of output equivalent to the full capacity of the plant, we shall require about 2,500 tons a year.

14. About 30 c.ft. will be required to make 100 gross boxes of matches.

15. We do not require packing cases as the matches are sold in tins throughout Burma.

16. We get our supplies of wood from Kalaw, a distance of about 370 miles from the Factory; Toungoo about 166 miles away and Swegyin about 175 miles away.

17. We get our supply of wood through local contractors, who got the trees felled by manual labour and transported to the railway station by bullocks or from Shwegyin by River to Rangoon.

18. We hear in some places they pay Rs. 4 while at other places they have to pay Rs. 6 to Rs. 8 per ton.

19. We buy Sawbya at Rs. 38 to Rs. 40 per ton delivered at our works while Manlettanshe at ⅓ Rs. cheaper. Kalwa Pine costs Rs. 50 per ton.

20. We have no concessions for the extraction, etc.

21. We have not found any appreciable changes in the quality of the woods.

22. We are not aware of the exact places from where the contractors are drawing the supplies.

23. We have not yet found necessary to draw supplies from new areas.

24. We think we are assured of sufficient supply for the next 10 years at least at the present rates. We have not taken any measures to plant trees suitable for Match-making.

25. No special concessions in the matter of freight by rail, river or sea for wood are given to us. We consider the present rates of freight on the Burma Railways are very high for carriage of the wood and/or for the finished matches.

Other Raw Materials.

26. Besides wood, we require Match Wax, Chemicals, Paper, Zinc sheets, Glue and Tapicka Flour or Potato Starch.

27. A separate list will be submitted of these.

28. All these are imported from foreign countries. 28A. (*a*), (*b*), (*c*), (*d*), (*e*), (*f*), will be given separately while the customs duty on all these articles is 15 per cent. except Sulphur which is free.

The following are the c.i.f. prices of the different materials:—

Article.	Price per cwt. c.i.f.		Country of origin.
	Rs.	A.	
Potassium Chlorate	24	0	Germany.
Amorphous Phosphorous	168	0	Sweden and Japan.
Manganese Dioxide	15	0	Japan.
Sulphur	15	0	,,
Red Lead	42	0	,,
Antimony Sulphide	30	0	,,
Glass Powder	8	0	,,
Infusorial Earth	6	0	,,
Glue	55	0	,,
Match Wax	25	0	U. S. A. also Burma Oil Co.
Paper for bundling	3	8 per ream.	Japan.
Zinc Sheets	35	0	Belgium.

The Customs duty on all these except Sulphur is 15 per cent. and the landing and transportation charges 3 to 4 per cent.

29. We think many of these except perhaps Potassium Chlorate are likely to be manufactured in India as the Industry makes progress.

Labour.

30. We do not think there is any difficulty in securing sufficient labour for the extraction.

31. We employ one expert Chemist, one Engineer and one General Supervisor having special knowledge of box-making. These were necessary in the beginning but within short time they can be replaced by Indians.

32. The Chemist is paid Rs. 300 per month, the Engineer Rs. 400 per month and the General Supervisor Rs. 500 per month with free boarding and lodging and return passage.

33. We have employed young Indians as assistants and they have learnt now much of the work.

34. We employ on the premises about 100 males and 60 females, the former getting Rs. 1-2 to Rs. 1-10 per day while the latter As. 12 to As. 15 per day.

35. The Indian labour is drawn from the vicinity of the factory.

36. The Indian labourer does improve with training as we find in some departments such as frame-filling, frames emptying and the box-filling and packing.

37. No arrangements are made by the factory for the labourers.

Power.

38. We use Crude Oil Engine of 15 B. H. P.

39, 40, 41. Do not arise.

42. We buy the liquid fuel from the local agents of the Indo-Burma Petroleum Co., Ld., which cost us As. 9-6 per gallon delivered at the factory.

43.

Market.

44. The average total consumption of Burma can be taken at about 3,000 cases of 50 gross each per month or about 150,000 gross.

45. The demand is steady but likely to increase in proportion to the natural increase in the population.

46. We sell our matches mostly in Burma and sometimes export to Madras, Coconada and Akyab.

47. No.

48. (*a*) Nearly half of the Burma market is served by the imported matches from Japan and Sweden.

(*b*) There appear still some illicit importation of foreign matches on the frontiers of Burma.

Competition.

49. The competition is keenest both from Japan and Sweden but now-a-days more from the latter.

50. In point of sales the imported matches compete with both Indian matches made from indigenous woods and imported woods.

51. We do not know exactly the prices during 1918-22, those in 1922-26 were Rs. 3-6 per gross to Rs. 3-2 depending upon the quality and the brands.

(2) We realised for matches made from local wood Rs. 1-12 to Rs. 1-14.

(3) And for matches made from imported wood Rs. 2 to Rs. 2-3. We know about the Japanese matches, which are imported at Rs. 45 to Rs. 50 per case of 50 gross on which they pay Rs. 75, *i.e.*, at the rate of Rs. 1-8 per gross as customs duty and about Re. 1 per case as the landing charges.

52. From the importing houses and the customs statistics.

53. In Japan the present prices at which the matches are sold for export are unremunerative and are below the lowest prices current in the home markets.

54. The Indian manufacturers will be temporarily at a disadvantage in respects a to j for the next say 5/6 years. The customs duties, however, on the imported raw materials could be easily set aside if the Government so decide.

Equipment.

56. Yes, our present factory is an economic unit of production. In our opinion a mill with a daily output of 600 gross can make an economic unit.

57. About 30 per cent. of the total capital outlay has been incurred on plant and machinery.

58. (*a*) We have got following machines: —

One Splints Peeling Machine.
One Splints Chopping Machine.
Two Veneers Peeling Machines.
Three Lines Pressing Machines.
Two Veneers Chopping Machines
Two Splints Levelling Machines.
Eight Frames Filling Machines.
Three Frames Emptying Machines.
One Chemicals Dipping Apparatus.

All these are Japanese Makes and we began to use them since July 1926 though they were in use for sometime before.

(*b*) There are no special arrangements with the suppliers of machines in foreign countries.

59. Though the plant is not an up to date one as commonly understood on the Continent, it is quite efficient to enable us compete successfully with the foreign manufacturers.

(*b*) All our match boxes are made by the females in their homes we supplying them with cut veneers of the proper size and cut pieces of paper, while in the factory excepting the splints and veneers Peeling and Chopping, everything else is carried on by manual labour.

60. No.

61. Sundry repairs are carried on locally.

Capital Account.

62. The block value for the Plant and Machinery stands at Rs. 32,000 while Rs. 70,000 under other miscellaneous assets.

63, 64, 65, 66, 67, 68, 69, 70, 71, 72, 73, 74. *Nil.*

Works cost.

75. We give below the average cost of making 6 tins containing 50 gross.

	Rs.	A.	P.
Wood for splints and boxes 15 c.ft. at Rs. 60 including wastage	18	0	0
Labour for making splints, veneers and boxes	10	8	0
Cost of Cut Paper for the boxes	2	4	0
Cost of chemicals including wax	12	0	0
Cost of small, big and tin labels	2	6	0
Cost of packing paper	0	8	0
Cost of Zinc Sheets	4	8	0
Cost of Power, lubricating oils, etc.	0	12	0
Labour for frame-filling, emptying, box-filling, packing, tinning, side-painting and other fixed salaried labour including the foreigners	14	0	0
Miscellaneous including rent, insurance, office, repairs, travelling, advertising, etc.	8	0	0
Depreciation of the machinery	1	0	0
TOTAL	73	14	0

76. It has increased since the less than full capacity production as the rent for the factory premises, the foreign staffs salaries and the office expenses are fixed items and the fuller the production, the cheaper the fixed items cost.

77. No.

78. No.

79 and 80. *Nil.*

81. About Rs. 100,000.

82. Not necessary to borrow any capital.

83. If at all forced to borrow, the interest payable will have to be paid from 12 to 15 per cent.

84. *Nil.*

85. Presently stocks worth about Rs. 45,000 are held but formerly about Rs. 25,000 to Rs. 30,000. Between 60 to 90 days elapse before the payment is obtained from the buyers.

86. No.

87. No.

88, 89, 90. No.

91. A divident of about 12 per cent. per year.

92. No.

93. 12 per cent.

94. All the three conditions laid down by the Fiscal Commission are fully satisfied in the case of this Industry. (A). There is abundant supply of wood in the forests of Burma and India too and there is any amount of labour while the home market is undoubtedly a very large market indeed.

(B) As can be very easily seen the present growth of the Match Factories in India and Burma owes mainly to the Customs Duties of Rs. 1-8 per gross introduced since 1923 while before that period although people tried here and there to establish match factories, they did not grow on account of the heavy foreign competition. So for some time to come until the labourers become skilfull in the new work, this industry requires protection.

(C.) Eventually the industry will be able to face world competition.

95. Both the conditions are satisfied.

96. The box making can be very easily carried on on the cottage industry lines, thus giving additional work to the women folk of the villages without forcing them out of their houses in search of work.

97. The Protection received at present owing to (*a*) and (*b*) is to a very great extent counter-acted by the higher cost of manufacture, the industry being quite in its infancy but as time passes, it has got every chance of reducing the cost of production and the present duties will give good protection.

98 and 99. No. The existing duties will suffice.

THE RANGOON MATCH WORKS.

Evidence of Mr. D. G. BHAGWAT, recorded at Rangoon, on Wednesday, the 23rd March 1927.

Introductory.

President.—Mr. Bhagwat, are you the General Manager of the Rangoon Match Works?

Mr. Bhagwat.—Yes.

President.—You are in charge of the works?

Mr. Bhagwat.—I am in charge of both sales and works.

President.—Who are the proprietors?

Mr. Bhagwat.—Messrs. M. H. Hirjee and Company.

President.—Are they local residents?

Mr. Bhagwat.—No, they are from Bombay.

President.—Don't they live here?

Mr. Bhagwat.—No. They were doing business with another firm in partnership here and they are doing their own business in Japan in export and import including matches.

President.—They import Japanese matches into the country?

Mr. Bhagwat.—They were exporting from Japan to other agents in Bombay and Rangoon.

President.—Do they do that still?

Mr. Bhagwat.—Yes, to a certain extent.

President.—Do they not find it rather difficult to combine the agency with their own business?

Mr. Bhagwat.—No.

President.—It is rather odd when you have got your own matches to push.

Mr. Bhagwat.—There are certain brands of Japanese matches that are desired by the people and they export those brands only. For example, there is a brand similar to our "Tiger" which is required by Akyab merchants. Practically there was very little export of these matches during the last six months; they exported about 100 cases only, that is all.

President.—To Burma?

Mr. Bhagwat.—Yes.

Mr. Mathias.—When you say the consumer desires a particular type do you refer to the actual consumers of matches or rather the retailers who for some reason or other consider it desirable to push the sales of certain types because it is possible they may get more commission?

Mr. Bhagwat.—I don't think so, because people who desire that particular brand have been buying from us these matches for a very long time, nearly six years.

Mr. Mathias.—But it depends more on the opinion of the retailer than of the consumer because the consumer has no expert knowledge, and will probably buy anything the retailer passes on to him?

Mr. Bhagwat.—He is accustomed to buy a particular brand for a long time, the "Tiger" for instance, and he is just satisfied with that particular brand that is all.

Dr. Matthai.—You make only two sizes of matches here?

Mr. Bhagwat.—Yes.

Dr. Matthai.—These two sizes that you make here are not imported from Japan?

Mr. Bhagwat.—No.

Dr. Matthai.—You sell a particular brand of a particular size, do you?

Mr. Bhagwat.—These Akyab people want half size matches with "Tiger" while we manufacture full and $\frac{1}{8}$th sizes.

President.—How many different varieties of labels have you got?

Mr. Bhagwat.—About 13 to 14 varieties.

Mr. Mathias.—Every match works manufactures tiger brand safety matches, and I suppose that the products of different factories so labelled have approximately the same sale.

Mr. Bhagwat.—That is so.

Dr. Matthai.—Then you see for the Akyab people all that you have got to do is to import the labels?

Mr. Bhagwat.—Ours is not of the size that are imported.

Manager's Qualifications.

President.—What is your own experience of manufacture of matches?

Mr. Bhagwat.—I had studied up to the B.Sc. with Chemistry as my subject so I know something about general chemistry. Then I had entered a match factory in Karhad near Poona where I worked for one year; it was in 1915. It was however closed down about 10 months after my joining the factory because they could not get chemicals from the Continent. Then I left that place and went over to Japan and there I joined this Company and I used to visit some of the match merchants and later on came into closer contact with match manufacturers.

President.—Did you visit any factories?

Mr. Bhagwat.—Yes.

President.—Did you get any practical training?

Mr. Bhagwat.—No.

President.—Did you visit these factories frequently?

Mr. Bhagwat.—I visited many times and I got various data from these people there about manufacture.

Dr. Matthai.—How long were you in Japan?

Mr. Bhagwat.—From 1917 to 1922.

Match-making in Japan.

President.—Is manufacture in Japan carried on in large scale factories or in small factories?

Mr. Bhagwat.—There are large scale factories and small factories too, but even large scale factories do not produce their own boxes and splints in the factory itself. They get these from merchants dealing in boxes and splints.

President.—That is to say there is specialization there in splints?

Mr. Bhagwat.—Yes. One firm would deal with splints, another with box only and the third people would dip the splints in the chemical composition and then do side painting, packetting and that sort of thing.

President.—Do they sell the veneers for boxes or is it ready made boxes that they sell?

Mr. Bhagwat.—The firm dealing in boxes sell them ready made, but they themselves would make the veneers and distribute them to the workers at home to have boxes made by hand.

President.—Then they would supply them to the man who dips the splints?

Mr. Bhagwat.—Yes.

President.—So that it is divided into three main processes?

Mr. Bhagwat.—That is so.

President.—And they are carried on in different factories?

Mr. Bhagwat.—Yes.

Dr. Matthai.—Are you suggesting that this is the normal way in which production of matches is carried on in Japan?

Mr. Bhagwat.—Yes.

Dr. Matthai.—They do it in three different factories?

Mr. Bhagwat.—Yes.

Mr. Mathias.—Is dipping done by contract, that is to say after the splints have been made in one factory are they then handed over to the second factory for box making and then to the third factory for dipping at so much per gross?

Mr. Bhagwat.—No. The dipping man buys the splints from the splint maker and his boxes from the box maker.

President.—I suppose he is the final seller?

Mr. Bhagwat.—Yes.

President.—He confines his attention to the dipping only?

Mr. Bhagwat.—Yes, and also box filling, packeting and so on.

President.—As regards dipping, is it done by machinery or by hand?

Mr. Bhagwat.—In many places it is done by hand.

President.—In the same way as you do it with the hand machine?

Mr. Bhagwat.—Yes.

Dr. Matthai.—The only thing that is done by power driven machines is peeling and chopping?

Mr. Bhagwat.—Yes, sometimes they also do the frame filling, which is done in our factory by hand.

Dr. Matthai.—All the others are done either by hand or hand driven machinery. Am I right?

Mr. Bhagwat.—Yes.

President.—When you say they do the frame filling, do you mean they sell the splints in frames?

Mr. Bhagwat.—There are frames in which the splints drop from boxes. These splints are sold in bundles and these are broken open in the factory and thrown on the levelling machine which sets the splints in one line and then they are taken to the frame filling machine where the frames are filled with these splints. Then these frames are sent to the paraffin apparatus.

President.—They have not got power driven machines?

Mr. Bhagwat.—No.

President.—Not even in large factories?

Mr. Bhagwat.—No. In the big factory they produce about 20,000 cases per month of 50 gross each, that is 800 cases or 40,000 gross a day.

President.—Do they make the whole of it in that way?

Mr. Bhagwat.—Yes. Of course the process is multiplied many times in their factory. In our factory one apparatus is sufficient whereas in their factory they require perhaps 10.

President.—I see. They confine themselves only to one process instead of two or three processes and that is why they are able to produce a bigger outturn.

Mr. Mathias.—The brands of the Japanese matches which you import are the products of a cottage industry, aren't they?

Mr. Bhagwat.—That is so.

President.—I take it that the splints have to be fresh in this sense that if you keep them very long they would get dry?

Mr. Bhagwat.—What they do is this. Aspen wood splints are tied together with grass in bundles so that they do not get bent and then 400 such bundles are packed in one bale and sold in such bales.

President.—How long can you keep them before dipping?

Mr. Bhagwat.—It can be kept for a long time, even three or four years, they would not be spoilt or bent.

President.—But you cannot do that with Indian wood, can you?

Mr. Bhagwat.—No we can't. We have not tried as a matter of fact.

President.—The reason why I am asking you is this. My impression was that you could not manufacture all your splints, say, in the monsoon and keep them for the dry weather when it is difficult to get logs. My impression is that you cannot keep Indian splints for even five or six months.

Mr. Bhagwat.—One difficulty with *letpan* would be that after keeping them for three or four months some small insects make holes in them but that does not happen with aspen.

President.—They get mouldy too?

Mr. Bhagwat.—Yes.

President.—What would happen if you used *sawbya* or *bonmeza*?

Mr. Bhagwat.—*Sawbya* we can keep perhaps.

President.—Supposing it was found that in certain parts of India there was no wood available in large quantities but the wood was available in Burma, would it be possible to manufacture the splints in Burma and export them to India as they do in Japan and dip them?

Mr. Bhagwat.—I think we can do that with *Sawbya* but of course it will cost a little more for keeping them in cases making them into bundles and so on.

President.—The cost would otherwise be reduced if you export them in splints instead of in logs.

Mr. Bhagwat.—That is so.

Dr. Matthai.—Does that apply also to *maulettanshe*?

Mr. Bhagwat.—We have tried *sawbya* and *maulettanshe*.

President.—Have you any experience of this?

Mr. Bhagwat.—Last year we kept these for about four months.

President.—Did you find any deterioration?

Mr. Bhagwat.—No.

President.—Were they all *sawbya* and *maulettanshe*?

Mr. Bhagwat.—Mostly *sawbya*.

President.—What about veneers for the boxes; will that keep?

Mr. Bhagwat.—Yes.

President.—Now, if the boxes were to be made separately, then it would be better to export the veneer for boxes because it will take less space than boxes. But veneer, after it has been peeled, will it keep to the same extent as splints or will it get brittle?

Mr. Bhagwat.—It will be brittle, but for making boxes by hand it will do, only we will have to wet it again. As a matter of fact we got some veneer from the Sunderbund Match Factory of Calcutta and we wetted these veneers again here and gave them to the women for making boxes and we got boxes made out of them. But the only trouble was that this wood was not quite so good as we get here.

President.—What wood was that?

Mr. Bhagwat.—*Genwa*.

President.—To come back to the manufacture in Japan, the man who dips performs the final process, does he?

Mr. Bhagwat.—Yes.

President.—Does he sell matches direct or does he do it through other firms dealing in matches?

Mr. Bhagwat.—He is considered to be the match manufacturer and he goes to the exporter and sells his stuff to him.

President.—Can you give me some idea as to how many of these factories are working in Japan in that way?

Mr. Bhagwat.—About 50 but formerly it was more than 120.

President.—In different parts of Japan?

Mr. Bhagwat.—Mostly they are round about Tokyo and Osaka.

President.—At the ports chiefly, are they?

Mr. Bhagwat.—Yes.

President.—They don't manufacture them in the interior.

Mr. Bhagwat.—Very little compared to the production in these two ports.

Dr. Matthai.—The Japanese industry gets most of its wood from outside.

Mr. Bhagwat.—They get it from Siberia, Vladivostock.

Dr. Matthai.—What exactly is the reason why a man chooses to specialise in splints? I can understand a man specialising in splints who happens to be near the source of wood supply.

Mr. Bhagwat.—In former days about 25 or 30 years ago there was wood supply near about in Japan and they might have started making the splints then. They have specialised in that particular department and they are continuing.

President.—That is to say Japanese have really evolved a method of mass production by dividing the processes.

Mr. Bhagwat.—Yes.

Mr. Mathias.—What is Japanese aspen, is that grown in Japan?

Mr. Bhagwat.—Yes.

Mr. Mathias.—Why do Japanese rely on Russian aspen?

Mr. Bhagwat.—Now-a-days much of it has been utilised for matches at these ports and now they have to go to Hokkaido to get it. I think there are fewer transport facilities between Hokkaido and these ports than between Siberia and Osaka.

Mr. Mathias.—The forest resources of aspen in Japan have deteriorated to some extent.

Mr. Bhagwat.—Yes.

Hand driven and power driven machinery.

Dr. Matthai.—Do you think that there is any advantage in having a system of hand driven machinery instead of power driven machinery? Is the wastage less, is the quality better or are you able to give better attention?

Mr. Bhagwat.—We can give better attention in the former case.

Dr. Matthai.—Is there less wastage?

Mr. Bhagwat.—The thing is just now the Indian labour is not intelligent nor is it skilled to work on the power machines. It cannot be immediately trained.

Dr. Matthai.—Leaving that question of training alone, taking the question of wastage, do you think that you are able to do with less wastage?

Mr. Bhagwat.—I can't say.

President.—We were told yesterday that you had to do the filling by hand where dipping had been done by hand because dipping was not good and uniform when done by hand and if they filled the boxes by machinery the edges would break and other things would happen. Is it for that reason that in Japan the whole thing is done by hand?

Mr. Bhagwat.—I think if the dipping is done by hand, it is rather difficult to transfer those dipped splints on to the box filling machines.

President.—Why?

Mr. Bhagwat.—Because these are collected in trays of five or six rows and they have again to be gathered together and put in one tray just as we do after the levelling machine. They are put into one tray and that tray has to be transferred to the box filling machine, so that this further trouble is there and perhaps to save that it is done.

President.—Do you consider that hand dipping is as good as machine dipping?

Mr. Bhagwat.—Quite good. Perhaps it is more uniform than the machine dipping, because in hand dipping they could see quite correctly whether the chemicals are there well spread or evenly spread.

Mr. Mathias.—So far as chemicals are concerned for making 50 gross matches would you use more chemicals if you did the dipping by hand instead of by a machine?

Mr. Bhagwat.—No.

Mr. Mathias.—Have you any personal experience?

Mr. Bhagwat.—I cannot say, but I don't think they will require more chemicals for hand dipping.

Dr. Matthai.—What I should like you to explain to me is this. You are in charge of a factory in which most of the work is done by manual labour. I find from what Messrs. Adamjee Hajee Dawood and Company told us yesterday that the cost of power in a power driven machinery is after all a very small part of the cost of matches. If the power driven machinery is not more expensive, why is it that in Japan and in other big factories they do not resort to the power driven machinery and do away with the hand driven machinery. There must be some advantage.

Mr. Bhagwat.—In Japan the industry dates as far back as 1890. For a long time people are accustomed to make matches. At that time in Japan labour was cheap. With the cheap labour it was much cheaper to manufacture these matches even by hand.

Dr. Matthai.—And most of that work is done by women.

Mr. Bhagwat.—Box making, filling and packing are done by women.

Dr. Matthai.—When you introduce power driven machinery and when you have got to employ skilled labour, labour becomes more expensive, but if it is a hand driven machinery, practically all the work could be done by women whom you can employ on a lower rate of wages. That might be the explanation.

Mr. Bhagwat.—As a matter of fact in Japan boxes that are prepared by hand are very cheap compared to machine made boxes.

President.—Have you got any recent prices of the different things, splints, boxes, etc., in Japan?

Mr. Bhagwat.—I have not got actual figures, but I can give you a rough idea about that.

President.—That means that at every stage the manufacturer has got to make some profit.

Mr. Bhagwat.—In summer the prices are cheaper for boxes and accordingly they calculate their cost for the finished product.

Finance of the Company.

President.—Has any Japanese capitalist any interest in your works?

Mr. Bhagwat.—No.

President.—None at all.

Mr. Bhagwat.—No.

President.—Is the machinery supplied by the Japanese firm?

Mr. Bhagwat.—We imported machinery from them. That was in our former factory. We got it from one Japanese manufacturer from whom we were getting matches before.

President.—He has no direct interest of any kind.

Mr. Bhagwat.—No.

President.—It is not financed in any indirect way by any Japanese firm.

Mr. Bhagwat.—It is financed by M. H. Hirjee and Company.

President.—Can you swear that it is so? So far as you are concerned it is financed by the proprietor.

Mr. Bhagwat.—Yes.

Quality of Indian made matches.

President.—Now as regards the difference in quality you mention two defects in Indian matches. The colour is not as white as that of the foreign matches and they are easily breakable.

Mr. Bhagwat.—Yes.

President.—That colour doesn't interfere with the lighting quality of the match, does it?

Mr. Bhagwat.—No.

President.—Its appearance more or less is a question of taste so far as the consumer is concerned and that taste must have been very largely developed by the importer of foreign matches in the country.

Mr. Bhagwat.—Yes.

President.—Because the foreign matches happen to have a whiter colour.

Mr. Bhagwat.—Yes.

President.—Now as regards the matches being breakable, what do you exactly mean? When do they break? Do they break in lighting?

Mr. Bhagwat.—At the time of striking. If we make thinner sticks like these (sample boxes shown) out of the local wood at the time of striking on the surface they break.

President.—Is that Japanese?

Mr. Bhagwat.—This is Japanese.

President.—Made in Japan.

Mr. Bhagwat.—Yes, the wood is aspen.

President.—All your matches are made of aspen wood.

Mr. Bhagwat.—Some are made of *maulettanshe.*

Mr. Mathias.—In your reply to question 10 you say it is not necessary to import wood from foreign countries. That is not correct. You still import aspen wood.

Mr. Bhagwat.—This was imported last year.

Mr. Mathias.—You are using that.

Mr. Bhagwat.—Yes.

President.—But there are other defects; on striking for instance they glow.

Mr. Bhagwat.—The Japanese matches also glow.

President.—Is there any explosion?

Mr. Bhagwat.—That depends on the composition of the chemicals. We can make it less noisy or more noisy.

President.—I have been trying several matches of yours. They all strike with a little explosion.

Mr. Bhagwat.—Some Chinese merchants prefer striking with a little explosion instead of smooth striking.

President.—Do you deliberately make your heads in order that they should strike with explosion?

Mr. Bhagwat.—We do it. We can make it strike without noise.

President.—Your customers rather fancy noise.

Mr. Bhagwat.—We just make them on the Japanese fashion.

Mr. Mathias.—The imported matches also make some noise.

Mr. Bhagwat.—The Swedish matches do not make so much noise as the Japanese matches.

Mr. Mathias.—When you say that the Indian wood is easily breakable, is that your experience?

Mr. Bhagwat.—Yes.

Mr. Mathias.—It seems to me that some classes of wood are very much less breakable than aspen.

President.—Is it not rather an old idea about Indian matches? Recently they have been able to find better wood and they make better quality matches. This description doesn't apply now.

Mr. Bhagwat.—Better quality matches are now being made.

President.—With reference to your point of Indian matches being breakable that does not seem to have so much force now as it had four years ago.

Mr. Bhagwat.—There is still that blackish colour.

President.—There is not very much difference between aspen and *maulettanshe.*

Mr. Bhagwat.—If we go to the wholesale dealers, they will still say so.

Mr. Mathias.—I take it the whole question is not a question of the consumer's preference, but of the preference of the wholesale dealer. If matches are made of Indian wood, the dealer will offer a lower price. The imported matches have trade marks which are well known and therefore they command a ready sale. It will take sometime for Indian matches to become popular with the consumers. The wholesaler or retailer in the meantime takes advantage of the fact that the colour of Indian matches is rather darker to offer a lower price to the manufacturer.

Mr. Bhagwat.—Yes.

President.—What do you mean by this that the foreign matches are considered dependable throughout the year?

Mr. Bhagwat.—People have got an idea that these are thoroughly damp proof matches and they can use them during the rainy season also.

President.—What is your experience as regards your own matches first of all? Can you make them sufficiently damp proof?

Mr. Bhagwat.—Even the foreign matches are not thoroughly damp proof. Our matches approach to a great extent the foreign matches.

Mr. Mathias.—I take it that no safety match immersed in water would strike.

Mr. Bhagwat.—No. But in a damp climate you can use all matches for lighting.

Mr. Mathias.—All matches are susceptible to dampness.

Mr. Bhagwat.—Yes.

Mr. Mathias.—Only to a greater or less degree.

Mr. Bhagwat.—Yes.

Dr. Matthai.—If people in a market prefer foreign matches, in the same market would they be satisfied if you gave them Indian matches out of imported wood?

Mr. Bhagwat.—They want the whole thing imported.

Mr. Mathias.—You don't get a better price for matches made out of aspen.

Mr. Bhagwat.—Yes, we do.

Price of imported and Indian made matches.

President.—As regards the last point about the money value of the prejudice, I take it what you mean is that foreign matches will always sell for twelve to fourteen annas more than your own matches. Do you mean that you will have to sell your matches for twelve to fourteen annas less than the foreign matches?

Mr. Bhagwat.—Those are the present conditions. At this difference, matches are being sold. If we put up our price, people won't buy our matches.

Mr. Mathias.—If you put up your price and the foreign importer puts up his price.....

Mr. Bhagwat.—If the foreign importer puts up his price first, then only we may get an increased price.

Mr. Mathias.—Is the market governed by your price or the price of the importer of foreign matches?

Mr. Bhagwat.—The foreign manufacturers' price will be the standard. If they reduce their price, people will ask us also to reduce our price.

President.—The point is that they are getting to-day twelve to fourteen annas more than you are getting.

Mr. Bhagwat.—Yes.

President.—Then the price is really fixed by the Indian manufacturer of matches. According to this statement the prejudice in favour of the foreign matches induces the consumer to pay twelve to fourteen annas more. If there is no prejudice in his favour, the foreign manufacturer will have to sell also at Rs. 1-8-0, that is what it comes to. Supposing the Indian consumer has no prejudice in favour of the imported article, then you can also get twelve to fourteen annas more or he will have to sell at the same price as you do.

Mr. Bhagwat.—If there is no prejudice in favour of the foreign article we will get a better price, I mean the same price will prevail for both locally made and imported matches.

President.—The imported matches will have to come down to your price. Your price won't be raised to the level of foreign matches because there is so much competition. How will you be able to get a higher price? He gets the higher price because to-day there is a prejudice in his favour. Supposing the prejudice disappears, he will have to sell his matches more or less at the same price as you do, so that the governing factor is the local price.

Mr. Bhagwat.—He has got a certain price of his own. Taking the cost of production, freight, etc., the foreign manufacturer will arrive at a certain price in Rangoon.

President.—He is now able to recover all that because the Indian consumer thinks that his matches are better and therefore he is able to get twelve to fourteen annas more. Supposing the consumer is a little more intelligent and says "I do not find any difference between our matches and imported matches. Why should I pay more?", then the foreign matches will always sell at the same price or not sell at all.

Mr. Bhagwat.—Quite so.

President.—In such a case how can you raise the price of Indian matches?

Mr. Bhagwat.—That will depend upon the demand and supply.

Dr. Matthai.—In Burma, is there a lot of competition amongst Indian producers?

Mr. Bhagwat.—There is more production.

Dr. Matthai.—There is no kind of understanding among your people as to price.

Mr. Bhagwat.—None at all.

Mr. Mathias.—Have you any experience as to the classes of customers to whom foreign matches are sold? Are the Indian matches sold to the poor people and the foreign matches to the more well-to-do?

Mr. Bhagwat.—It is not like that.

Mr. Mathias.—There is no sharp line between the two. There is no such thing as the rural market in which Indian matches are sold and the urban market in which foreign matches are sold. For instance, do you sell your matches in Rangoon itself?

Mr. Bhagwat.—Yes, in Rangoon and up-country. Through Rangoon merchants, we sell.

Mr. Mathias.—Are your matches sold in Rangoon or are they all sent up-country?

Mr. Bhagwat.—Much of our production is sold in Rangoon.

Mr. Mathias.—If I go to the bazar, I can buy your matches.

Mr. Bhagwat.—Yes.

President.—During the war, the Swedish matches went out of the country here.

Mr. Bhagwat.—Yes.

Quality of Japanese matches.

President.—The Japanese matches began to come in but they are not as good as Swedish matches.

Mr. Bhagwat.—Some of their brands are quite good.

President.—Do you consider them as good as Swedish matches?

Mr. Bhagwat.—Yes.

President.—In India, will the Japanese match fetch the same price as the Swedish match? Will it get twelve to fourteen annas more than the Indian match?

Mr. Bhagwat.—It is getting now.

President.—Are you sure?

Mr. Bhagwat.—Yes.

Mr. Mathias.—Have you any samples of Japanese matches?

Mr. Bhagwat.—I haven't. I can get them for you. The match with the best label on is being sold at a higher price.

Mr. Mathias.—To-day there is the same prejudice in favour of the Japanese match as there is in favour of the Swedish match and the Japanese match on the whole realises twelve to fourteen annas more than the Indian match.

Mr. Bhagwat.—It is only the better quality match of Japanese manufacture that fetches that price.

Dr. Matthai.—There is also an inferior quality of Japanese matches coming in.

Mr. Bhagwat.—Now-a-days only the best quality comes in.

President.—That is because of the Swedish competition.

Mr. Bhagwat.—Yes, and also because locally made matches are being sold.

President.—Are the Indian matches better than the ordinary Japanese matches?

Mr. Bhagwat.—They are slightly better.

President.—Will they fetch a better price than the ordinary Japanese matches or will people still pay a little more for the Japanese matches?

Mr. Bhagwat.—There is the idea of the people that the Japanese matches are damp proof.

President.—This idea must have been created by the importer.

Mr. Bhagwat.—People have been using Japanese matches for a long time. Further those people who started early in this line in India were not able to produce matches as good as they are doing now.

President.—Do you mean in the earlier stages?

Mr. Bhagwat.—Yes, so the prejudice has got confirmed.

Mr. Mathias.—It is also true that the Japanese matches exported to India were not damp proof.

Mr. Bhagwat.—Some of them were not.

Mr. Mathias.—In fact, the quality of those matches was inferior. Notwithstanding that, the Japanese reputation for matches seems to have survived.

Mr. Bhagwat.—During the war, that was the only country which supplied matches to India.

Mr. Mathias.—During the war, the quality of Japanese matches deteriorated very much indeed. They were not damp proof and they fell into disrepute. After the war, the quality is said to have much improved and their matches now command a premium over the Indian matches. Is not the position exactly similar as regards Indian matches? At the beginning they were not damp proof and were of inferior quality. Now that the quality has improved, should they not command the same price as the others in two or three years' time?

Mr. Bhagwat.—In Japan, during the war time, the matches were produced of an inferior type. There was huge production. That was the only country to supply matches to China, Java and India. Even the smallest manufacturers were over-worked. They produced inferior matches and sent out to India.

Dr. Matthai.—You have not noticed any prejudice against the Japanese matches in India.

Mr. Bhagwat.—No.

President.—Which is the best brand of the Japanese matches?

Mr. Bhagwat.—Eagle brand, bamboo shoot brand, label with the word best printed in black colour and the elephant brand, with a rising sun behind.

Dr. Matthai.—There are different kinds of Swedish matches coming into the country at different prices. They are not all of the same kind.

Mr. Bhagwat.—In quality, size or what?

Dr. Matthai.—Some of them fetch higher prices than others.

Mr. Bhagwat.—That depends only on the liking of the people.

Dr. Matthai.—If there are five different prices for Swedish matches for various brands, the difference in price is due to the size of the match box and not due to any quality or chemical composition.

Mr. Bhagwat.—It depends on the size. It is also due to the popularity of the particular label.

Dr. Matthai.—Why is a particular brand popular?

Mr. Bhagwat.—Of their matches, the Tiger Brand is very popular.

Dr. Matthai.—But that is not an old one. How long has that brand been in the Burma market?

Mr. Bhagwat.—Since 1924.

Dr. Matthai.—Now it is a very popular brand.

Mr. Bhagwat.—Yes. The Japanese tiger has been in Burma for a long time.

President.—How long has your 'tiger' been in the market?

Mr. Bhagwat.—Since we started our factory.

Mr. Mathias.—Do you get for your 'tiger' brand any better price than for others?

Mr. Bhagwat.—We are getting a better price for that brand.

Selling arrangements.

President.—Is there any propaganda carried on by the Indian manufacturers to push the Indian matches? Do you allow the same people to sell your matches who sell Swedish matches?

Mr. Bhagwat.—There is no particular propaganda carried on.

President.—If a man is accustomed to sell foreign matches and you want him to sell Indian matches, he can sell larger quantities of foreign matches and get more commission than by selling your matches. Therefore if he is to push your matches, either he has got to give up that bigger commission or he has to get a much bigger commission from you. That is one of your difficulties.

Mr. Bhagwat.—Yes.

President.—People who sell foreign matches are the persons who sell Indian matches.

Mr. Bhagwat.—Yes.

Mr. Mathias.—As regards the label, you say that the tiger brand fetches a better price than any other. Though the match is the same, yet on account of the label, you get a better price.

Mr. Bhagwat.—Formerly the tiger brand was coming from Japan.

Mr. Mathias.—That shows that the actual consumer of your match does not really judge your manufacture. He simply buys what is pushed on to him.

Mr. Bhagwat.—During the rainy season, he comes to know which is better and which is not.

Mr. Mathias.—You say that all your matches are better, so that the tiger brand is as good as the other brands. If the consumer takes trouble to enquire he will see that he is paying more for the label than for the match. So, it depends on the effort made by the wholesaler than on the judgment of the consumer.

Mr. Bhagwat.—Yes.

Dr. Matthai.—Is there a home rule brand?

Mr. Bhagwat.—That brand is prevalent in Bombay.

Dr. Matthai.—Is it very popular?

Mr. Bhagwat.—I cannot say. I know nothing of Bombay.

President.—Apart from the question of prejudice, owing to your labour not being trained and other things, the quality generally speaking may be inferior. You have hand dipping. It may be uneven. That affects the quality of matches. A consumer may say that these matches must be inferior " look at the boxes and the painting on the sides." The Japanese matches I take it would be better.

Mr. Bhagwat.—Yes.

President.—Twelve to fourteen annas difference is not entirely due to prejudice. Part of that is to be explained by inferiority in the finish or quality.

Mr. Bhagwat.—Very little. I think the other people are making good boxes by machine.

President.—But hand painting cannot be really as good as machine painting.

Mr. Bhagwat.—It can be.

President.—It is not. You cannot have the same uniformity with hand painting as you would have if it were done by a machine. I am just trying to point out that a good deal of it may be explained by prejudice but not all.

Mr. Bhagwat.—Quite so.

President.—The prejudice you may be able to get over. As regards the difference in quality, you may be able to get over when your labour is better trained.

Mr. Bhagwat.—Yes.

President.—The Indian manufacturer does not take care to see that inferior matches are not put in the market. He put into the market formerly any kind of match—no matter how bad it was.

Mr. Bhagwat.—Yes.

Dr. Matthai.—Is it your experience that since 1922 the difference between Indian matches and imported matches in price has always been between twelve and fourteen annas.

Mr. Bhagwat.—It was higher but it is less now.

Dr. Matthai.—Because your quality has improved and the market is getting more and more used to it.

Mr. Bhagwat.—Yes.

Mr. Mathias.—Before the duty of Rs. 1-8-0 was imposed there was no margin for such a big difference, was there?

Mr. Bhagwat.—At that time very inferior Japanese matches used to come.

Mr. Mathias.—Before the war when the duty was 5 per cent. matches were so cheap then that there was no room for any such difference as annas 12 between Indian and Japanese matches.

Mr. Bhagwat.—At that time there was a difference of annas 4 per gross, Indian matches being offered at about 8 to 9 annas while the foreign were sold at 13 to 14 annas.

Mr. Mathias.—As the duty increased so this margin increased so that this difference in the price between Indian and foreign matches has increased in proportion to the price?

Mr. Bhagwat.—That is so.

Raw Materials—Timber.

President.—As regards imported wood you give the price of imported wood as 90 to 95 yen per ton c.i.f. and you give the exchange at 100 yen=Rs. 136.

Mr. Bhagwat.—At present it is so.

President.—That means that you get the wood at Rs. 123 per ton c.i.f. and to that you have got to add 15 per cent. or Rs. 18. That brings it to Rs. 141; to that you have got to add Rs. 8 to 10 per ton, the total coming to Rs. 150 per ton. Is that the present price? That is, about five times as much as the price of Indian wood?

Mr. Bhagwat.—Yes.

President.—You use about two-thirds of a ton for a gross of matches?

Mr. Bhagwat.—Yes.

President.—That would include veneers and splints both?

Mr. Bhagwat.—Yes.

President.—So that it will come to Rs. 100 per 100 gross?

Mr. Bhagwat.—Yes.

President.—You have to pay Re. 1 for a gross?

Mr. Bhagwat.—We do not make veneers out of this wood.

President.—If you made both splints and veneers it would come to Rs. 100 for 100 gross, that is to say Re. 1 for this alone?

Mr. Bhagwat.—That is so.

President.—You say you only make splints. How many gross splints can you make out of one ton of aspen?

Mr. Bhagwat.—400 gross out of one ton, that is 8 gross per c.ft.

President.—That is to say, you want only 12½ cubic feet for 100 gross?

Mr. Bhagwat.—Yes, about that.

President.—Then for veneers how much would you require?

Mr. Bhagwat.—We would require 16 c.ft. of wood for 100 gross of box veneer.

President.—What wood would you use for veneer?

Mr. Bhagwat.—Pine wood.

President.—What is the cost of that?

Mr. Bhagwat.—Rs. 50 landed.

President.—And you use 16 c.ft. so that it would be about Rs. 16 per 100 gross.

Mr. Bhagwat.—Yes.

Mr. Mathias.—For splints 12½ c.ft.?

Mr. Bhagwat.—Yes.

President.—In that case you would require 28½ c.ft. for 100 gross?

Mr. Bhagwat.—Yes.

President.—Altogether the wood would cost you Rs. 53-8-0, that is more than 8 annas for wood alone per gross.

Mr. Bhagwat.—Yes, when we make out of aspen.

Dr. Matthai.—If you were using indigenous wood you would have to use more for splints. How much more would it be if you were taking *sawbya?*

Mr. Bhagwat.—About 15 c.ft.

President.—And the veneer will remain about the same?

Mr. Bhagwat.—Yes.

President.—So that the saving would only be 2½ to 3 c.ft.

Mr. Bhagwat.—But the difference in price would be very great.

That would be the actual c.ft. of *sawbya* we would require. There will be wastage also in the indigenous wood whereas in the aspen there is very little wastage.

Dr. Matthai.—When you say you require 30 c.ft. per 100 gross, what you mean is 30 c.ft. in the log. Taking your statement that 30 c.ft. is equal to 100 gross, that is to say 50 c.ft. will be about 166 gross, am I to understand that when your contractors deliver this wood at your factory, this 50 c.ft. would result in your factory in 166 gross or does it mean that after you have removed the bark and removed the spoilt part of the wood, you get 166 gross per 50 c.ft.?

Mr. Bhagwat.—It is with bark and everything on.

Mr. Mathias.—How do you arrive at the calculation?

Mr. Bhagwat.—When we get this aspen wood from Japan some allowance is made for the bark.

Mr. Mathias.—How would you allow for the wastage in the aspen or in the *sawbya* wood for instance?

Mr. Bhagwat.—We take, say, a particular quantity that has been consumed in one month and we just approximately calculate how many splints have been made out of that quantity, what has been consumed in the process of manufacture and what is the balance at the end of the month, and from that have a rough idea of how much wood has been consumed for producing that quantity of splints. Every month while taking stock if there is a big heap of splints lying there, the man incharge gives us an idea as to how much it can be.

Mr. Mathias.—Do you measure up all waste wood and all your bark?

Mr. Bhagwat.—We don't.

Mr. Mathias.—I can quite understand your saying at the end of the month we have received so much c.ft. in the log and we have produced so many splints and boxes, and therefore the production is so much per c.ft. That I can understand, but I cannot follow how by calculating at the end of the month the total amount of splints and boxes you can say how much the consumption is, excluding wastage and bark. It seems to me impossible.

President.—What I am really trying to find out is what this wastage amounts to. The log is 50 c.ft. That is by measurement. You cannot measure the splints and say it produces so many cubic feet of splint because it will be much more than 50 c.ft. What I wish to know what really the wastage is that can be ascertained by weight. Supposing you weigh a log before peeling and chopping and so on and then you collect the bark and the other wastage. Then

you would know that so much percentage actually represents the wastage. The thing would be to weigh the log first and then the splints after they have been dried : then the difference is the wastage. You don't do that, do you?

Mr. Bhagwat.—No.

Dr. Matthai.—May I ask you whether these figures that you have given us of production per cubic feet has been taken from Mr. Troup's book or any other work? Does it represent your actual calculations?

Mr. Bhagwat.—Our Japanese expert has got some idea of the wood consumed in Japan and also of wood that is consumed in our factory during the last five or six months.

President.—In Japan they would get the log with the bark and everything. How many cubic feet would they use per 100 gross of the wood in the log as it comes from the forest?

Mr. Bhagwat.—For 100 gross of splints they would consider 10 c.ft. sufficient in the log.

President.—Here you use 12½ c.ft. without the bark.

Mr. Bhagwat.—Yes. We require more here.

President.—Here without bark you require 12½ c.ft., do you not?

Mr. Bhagwat.—No. 12½ c.ft. in the bark.

President.—Then you get your logs in the bark, do you?

Mr. Bhagwat.—Yes.

President.—You have to use 2½ c.ft. more than they do in Japan? What is it due to?

Mr. Bhagwat.—By keeping the wood longer here in India—they are kept about 8 months—this wood gets very loose in texture.

President.—The wood deteriorates in the log if it is kept for a number of months, is that what you mean?

Mr. Bhagwat.—The wood comes to Japan from Russia and is stored there and then it comes here and is again stored. Our wood came here in the month of March and we had to use it in the month of September so it was kept here for about six months and it is quite possible they had been stored in Japan for quite a long period before being sent here, and that is why there was much deterioration.

President.—In order to preserve the log they apply something, don't they, to the ends?

Mr. Bhagwat.—No. But I have heard that in Europe they do it, but I have not seen anything being applied to the Japanese log.

Mr. Mathias.—You can't give us the production per 50 c.ft. in the log of Indian wood?

Mr. Bhagwat.—No.

Dr. Matthai.—When you take wastage in your cost statement I think you mean by wastage three things—loss in the bark, spoilt wood . . . . .

Mr. Bhagwat.—Loss of the bark we cannot take because we leave off the bark when measuring the logs.

Dr. Matthai.—When you say 12½ c.ft. per 100 gross it includes also the bark, does it not?

Mr. Bhagwat.—That is for Japanese.

Dr. Matthai.—But I mean you have no figures about Indian wood. I am taking your figure with regard to imported wood. 12½ c.ft. make 100 gross.

Mr. Bhagwat.—Yes.

Dr. Matthai.—Then you say there is wastage.

Mr. Bhagwat.—Yes.

Dr. Matthai.—That wastage occurs partly in the bark, partly in the spoiled wood and partly waste in the factory.

Mr. Bhagwat.—The middle portions are left out.

President.—You have been using *sawbya* and maulettanshe only recently.

Mr. Bhagwat.—Yes.

President.—Practically this year.

Mr. Bhagwat.—Since last year.

President.—Since 1926.

Mr. Bhagwat.—Since September or October, 1926.

President.—You practically buy wood from the dealers.

Mr. Bhagwat.—Yes.

President.—You havn't got forests of your own.

Mr. Bhagwat.—No.

President.—You get it at Rs. 35 to Rs. 40.

Mr. Bhagwat.—Yes.

President.—The difference you give between *sawbya* and maulettanshe is Rs. 2 to Rs. 3.

Mr. Bhagwat.—Yes.

President.—Maulettanshe is Rs. 3 cheaper.

Mr. Bhagwat.—Yes.

President.—It appears to be superior to *sawbya* in some respects.

Mr. Bhagwat.—It depends on the particular contractor. Some contractor will ask a higher price and some a lower.

President.—You get maulettanshe in smaller quantities than *sawbya*.

Mr. Bhagwat.—We are getting more *sawbya*.

President.—Because *sawbya* is more easily available than maulettanshe.

Mr. Bhagwat.—Yes.

President.—Or is it because the one comes from the Mahuya.

Mr. Bhagwat.—It comes from some distance.

President.—You get your pine wood from Kalaw or Toungoo.

Mr. Bhagwat.—We get Kalaw pine.

President.—When you say that you require 1,200 tons a year, that means about 700 tons for veneers. Is it not so?

Mr. Bhagwat.—Yes.

President.—That will be pine.

Mr. Bhagwat.—Yes.

President.—Because you use a little more for veneers and about 500 tons for the other. Those are your total requirements.

Mr. Bhagwat.—Yes.

President.—You say when you reach your full capacity which is about 1,000 gross per day, you would require 2,500 tons in the same proportion.

Mr. Bhagwat.—Yes.

Mr. Mathias.—1,000 gross a day.

Mr. Bhagwat.—Yes.

Mr. Mathias.—For 600 gross you require 1,200 tons. For 1,000 gross you don't require 2,500 tons.

Mr. Bhagwat.—We will require it in the same proportion.

President.—How many working days in a year do you work?

Mr. Bhagwat.—About 300 days.

Mr. Mathias.—That gives you 3 gross per c.ft.

Mr. Bhagwat.—30 c.ft. for 100 gross.

Mr. Mathias.—When you speak of wood here, 1,200 tons a year, you must be speaking of wood as you buy from the contractor in the log and not the wood without wastage and without bark. Am I correct in thinking that your calculation is something over 3 gross per c.ft. in the log?

Mr. Bhagwat.—Yes.

Mr. Mathias.—When you said it was just now 3 gross for one cubic foot, your figures are not correct.

Mr. Bhagwat.—30 c.ft. in the log will give 100 gross. That is correct.

President.—I take it you don't know really where this wood comes from. It is delivered at your factory by these people and you don't find any difficulty in procuring your supply.

Mr. Bhagwat.—No.

President.—When your requirements come up to 2,500 tons a year, do you anticipate any difficulty or would you still get wood at the same price as you are getting now?

Mr. Bhagwat.—At the same price I think we will be able to get.

Dr. Matthai.—These contractors deliver at your factory.

Mr. Bhagwat.—Yes.

Dr. Matthai.—They are small men dealing only in soft wood.

Mr. Bhagwat.—They are sometimes brokers in paddy and sometimes in timber also.

Dr. Matthai.—You say later on you were assured that you would get the wood. Where did you get this assurance from?

Mr. Bhagwat.—From the contractors.

Mr. Mathias.—You don't find any deterioration in the wood supplied by the contractor.

Mr. Bhagwat.—No.

Mr. Mathias.—It is landed in good condition ready to make splints.

Mr. Bhagwat.—Yes.

President.—Do you find that there is any difference in the quality of the wood of the same species. Is the quality consistent? Sometimes do you find *sawbya* giving you good results and at other times bad results?

Mr. Bhagwat.—Woods of the same species coming from different places are giving different results. As regards *sawbya*, there is white *sawbya* and grey *sawbya*, male and female trees giving different colours.

Mr. Mathias.—Is the difference appreciable?

Mr. Bhagwat.—Yes, there is considerable difference.

President.—Then what do you do?

Mr. Bhagwat.—We make the splints.

President.—Do you manufacture them separately?

Mr. Bhagwat.—We mix them up.

Mr. Mathias.—With regard to your pine, do you have to give your trees any preliminary treatment in order to prevent the logs from getting damaged?

Mr. Bhagwat.—No.

Mr. Mathias.—You find no difficulty about making veneers owing to knots.

Mr. Bhagwat.—Yes.

Dr. Matthai.—You generally boil your pine.

Mr. Bhagwat.—No.

President.—Have you tried to make splints out of the pine?

Mr. Bhagwat.—Yes.

President.—That is only recently.

Mr. Bhagwat.—Yes.

Dr. Matthai.—Is the pine splint more brittle than *sawbya* splint?

Mr. Bhagwat.—It is not.

President.—How long have you been experimenting with pine wood?

Mr. Bhagwat.—Only recently.

President.—But you said that you don't find any difficulty in pe chopping.

Mr. Bhagwat.—We think we might continue to make splints out of

President.—You think so.

Mr. Bhagwat.—Because they take a better finish. The splints ar cut.

President.—You will have the same wood for veneer and for splints.

Mr. Bhagwat.—Yes.

President.—But do you think that the supplies of pine in the Sha are quite satisfactory?

Mr. Bhagwat.—I don't know. I wish to go there, but I have not be so far.

Dr. Matthai.—Your pine costs you about Rs. 10 more than *sawbya*.

Mr. Bhagwat.—Yes.

President.—But you get pine all the year round because it comes and there won't be any difficulty about floating at all.

Mr. Bhagwat.—Quite.

President.—In answer to question 24 you say you are assured of a s supply for the next 10 years. What makes you think so?

Mr. Bhagwat.—The supplier who is a big man says that he can su quite a long time.

President.—I don't know what he says is true or not.

Mr. Mathias.—When you say you think that you are assured of a s supply for 10 years at least, you go on the supposition that no more factories would be started and that no more exports would be made t This is really a guess work.

Mr. Bhagwat.—Yes.

Dr. Matthai.—You have no idea as to what profit the contractor m that.

Mr. Bhagwat.—No.

Chemicals, etc.

President.—Now taking the other raw materials, you have not given figures to show what quantities you really use of these different chemic so on in the manufacture per 50 gross or 100 gross. We wanted to kn rather. Do you keep your cost accounts in such a way as to tell us don't keep any cost sheets.

Mr. Bhagwat.—No.

President.—How will you be able to find out what it is you use?

Mr. Bhagwat.—We will have to find out from the actual quantity.

President.—You use nearly all imported materials, chemicals and You don't get any Indian raw materials.

Mr. Bhagwat.—No.

Dr. Matthai.—You don't mention in your list blue match paper an match paper.

Mr. Bhagwat.—We only use one kind of match paper from Japan.

Mr. Mathias.—I see you get your wax from the Burma Oil Compar you find that satisfactory?

Mr. Bhagwat.—We give them an order to make for a lower melting

Mr. Mathias.—What is your melting point?

Mr. Bhagwat.—105, 106 and 108 degrees.

Mr. Mathias.—They make no allowance on account of the freight.

Mr. Bhagwat.—Sometimes the price here is higher. In the beginning they were quoting a higher price than the Standard Oil Company.

Mr. Mathias.—So far as economy is concerned, apart from sentiment, there is no particular object in getting your wax from the Burma Oil Company.

Mr. Bhagwat.—No.

Dr. Matthai.—Where do you get your printing done?

Mr. Bhagwat.—We get the labels printed from Japan.

Labour.

President.—The machinery is only used by you up to splint or veneer cutting.

Mr. Bhagwat.—Yes.

President.—After that you hand over the work to the manual labour.

Mr. Bhagwat.—Yes.

President.—I wish to know after you have made the splints, do you give them to be dipped on a contract system or do you get them dipped under your own management?

Mr. Bhagwat.—The frame filling work is done by contract.

President.—On what basis do you pay?

Mr. Bhagwat.—5 pice for one rack containing 30 frames.

President.—How many gross of splints would it contain?

Mr. Bhagwat.—5 gross.

President.—For 100 gross it comes to Rs. 1-9-0.

Mr. Bhagwat.—Yes.

President.—Then the dipping is done by you.

Mr. Bhagwat.—That is done by salaried people. After that the emptying work is done by contract people.

President.—How much you pay for emptying?

Mr. Bhagwat.—As. 12-6. Even for box filling we pay Rs. 7-8-0 per 100 gross.

President.—For the filling only.

Mr. Bhagwat.—Yes.

President.—Does the box filling mean labelling, etc.?

Mr. Bhagwat.—Only box filling.

President.—That finishes with splints.

Mr. Bhagwat.—Then there is side painting.

President.—What would be the cost of that?

Mr. Bhagwat.—Re. 0-7-6 for painting 100 gross.

President.—Is there anything else.

Mr. Bhagwat.—We pay Re. 1-1-6 for packing 100 gross. Then they are put into the tins. That work is done by salaried people.

President.—That is as regards splints. Now what about veneers?

Mr. Bhagwat.—We make the veneers but the box making is done by women. We pay one rupee per thousand boxes, inside and outside complete.

President.—It comes to Rs. 14-4-0 per 100 gross.

Mr. Bhagwat.—There is wastage. In order to provide for that, we must take it at Rs. 15.

President.—What about labelling?

Mr. Bhagwat.—That is also done by contract—about three pice per thousand or about Re. 0-10-6 per 100 gross.

President.—Is there any manual labour done by contract?

Mr. Bhagwat.—There is tinning. The zinc sheets come in long sheets and they have to be made into square tins.

President.—How much is that?

Mr. Bhagwat.—It will be one rupee for 12 tins containing 100 gross.

President.—The total comes to Rs. 28-1-0.

Mr. Bhagwat.—Yes.

President.—Then, there remains the peeling, cutting, chopping, etc. That is all fixed labour.

Mr. Bhagwat.—Yes.

President.—Can you give me any idea as to what that means? What is your total wages bill for the year?

Mr. Bhagwat.—I shall let you know later.

Dr. Matthai.—You say in answer to question 34 that you employ 100 males and 60 females. Are they all salaried employees?

Mr. Bhagwat.—All the females are engaged on a contract system.

Dr. Matthai.—How many salaried people do you have?

Mr. Bhagwat.—I shall send you that information later.

President.—Have you got any Japanese wages?

Mr. Bhagwat.—Yes.

President.—Can you give us any figures?

Mr. Bhagwat.—The frame filling is practically the same. The biggest difference comes in packeting, box filling, and box making.

President.—What would be the difference?

Mr. Bhagwat.—They will pay only Rs. 2-8-0 where we pay Rs. 7-8-0 for box filling.

President.—For box making?

Mr. Bhagwat.—They will pay Rs. 6 where we have to pay Rs. 15.

President.—You are paying Rs. 14 (Rs. 9 *plus* Rs. 5) more. That is just about double.

Mr. Bhagwat.—Yes.

Mr. Mathias.—Can you tell me how many boxes a man or woman can fill in a day working 10 hours?

Mr. Bhagwat.—One woman, after about 10 months' practice in our factory, can fill in 12½ gross per day?

Mr. Mathias.—She makes one rupee per day.

Mr. Bhagwat.—Yes.

Mr. Mathias.—As regards box making, how many can a woman do?

Mr. Bhagwat.—The peculiar thing about box making is that these boxes are done by women in their houses at their leisure. So, we cannot have any exact idea. I think that one woman will make about 700 to 800 boxes a day.

Mr. Mathias.—It comes to 5 or 6 gross a day.

Mr. Bhagwat.—Yes.

Mr. Mathias.—One or two women working at leisure can make about Rs. 1-8-0 a day.

Mr. Bhagwat.—Yes. The children also help in making boxes.

Mr. Mathias.—Is there much competition in box making?

Mr. Bhagwat.—Not much.

Mr. Mathias.—How are the rates fixed?

Mr. Bhagwat.—The women here by going to roll cigars in a cigar factory can get about ten to twelve annas a day. We thought that if we could give a little more than that, we would be able to attract labour.

Mr. Mathias.—Your rate is really determined by the rate given by the cigar and cigarette manufacturers and you give something more.

Mr. Bhagwat.—Yes. That is also the Burmese umbrella making.

Mr. Mathias.—Is it mostly Burmese women that you employ?

Mr. Bhagwat.—All Burmese.

Dr. Matthai.—You give the veneers paper, etc., to the women and they take them home and bring them back in the shape of boxes.

Mr. Bhagwat.—We give the veneers to one contractor. That contractor again subdivides amongst 5 or 6 women. We receive these boxes from the contractor twice a week.

Mr. Mathias.—You deal with a contractor.

Mr. Bhagwat.—Yes.

Mr. Mathias.—So that you do not know what the contractors pay.

Mr. Bhagwat.—The contractors make one anna per rupee. They get paid from us only on two days a week. But they will have to pay to the women when they hand over the boxes.

Mr. Mathias.—You don't think that it would be a better proposition to deal with labour direct, thereby eliminating the middleman?

Mr. Bhagwat.—The middleman has to do some other work. The women sometimes bring the boxes loose but the middleman when delivering the boxes will deliver them in bundles of so many boxes.

Mr. Mathias.—If you don't employ the contractors, you will probably have to keep one or two clerks to count the boxes.

Mr. Bhagwat.—Yes.

President.—Do you examine the boxes to see that they are properly made?

Mr. Bhagwat.—Yes.

President.—Do you have to condemn a large percentage of these?

Mr. Bhagwat.—In the beginning we did, but not now.

President.—Supposing some boxes are spoilt, what do you do? Do you fine them?

Mr. Bhagwat.—We pay at a less rate for that particular bundle.

President.—You say that you have got three experts, one chemist, one engineer and one general supervisor. Are they all Japanese?

Mr. Bhagwat.—Yes.

President.—The chemist is, I take it, in charge of the chemical composition and makes the formula for the head and the paint.

Mr. Bhagwat.—Yes.

President.—What does the engineer do? There is no large machinery to look after.

Mr. Bhagwat.—He is an expert in handling the match machinery that we have. If anything goes wrong in the peeling, or chopping machine, he will attend to that.

President.—How long has he been with you?

Mr. Bhagwat.—For the last 4 years.

President.—Are you training Indians now?

Mr. Bhagwat.—Yes.

Dr. Matthai.—Have these experts been appointed for any fixed term?

Mr. Bhagwat.—They were appointed for 3 years.

President.—They were taken from the Japanese match factory or from the machinery makers.

Mr. Bhagwat.—From the factory. They were working in a match factory there for a long time.

President.—In the factory itself where there is machinery, you employ chiefly Indian labour.

Mr. Bhagwat.—Yes. There are very few Burmans.

President.—They are paid by the month.

Mr. Bhagwat.—Yes.

President.—What is the average wage that you pay.

Mr. Bhagwat.—It will be a little over one rupee a day.

President.—Do you have any trouble with that class of labour? Do you get them here or do you have to get them direct from India?

Mr. Bhagwat.—We get it locally.

President.—As regards power, I don't wish to ask you any questions.

Market.

President.—As regards market, how do you get a total of 1,800,000 gross per year for Burma.

Mr. Bhagwat.—I took the import figures.

President.—Besides that, Adamjee's are manufacturing a million gross and you would be manufacturing about 200,000 gross. The Muslim Factory must be making about the same quantity as you do. In addition to that, there is the import of a million gross here.

Mr. Bhagwat.—Yes.

Mr. Mathias.—Is this 150,000 gross a month.

Mr. Bhagwat.—Yes.

Dr. Matthai.—If the price of matches comes down, still further, do you think that the market would increase considerably?

Mr. Bhagwat.—No.

Dr. Matthai.—You cannot stimulate consumption by lowering prices.

Mr. Bhagwat.—No.

Dr. Matthai.—What is the present retail or bazar price for a full size match of yours?

Mr. Bhagwat.—One pice per box.

President.—Is there much illicit importation of matches on the border?

Mr. Bhagwat.—Japanese or Hong Kong matches come up to Bangkok by sea and to Moulmein by land.

Competition.

President.—As regards competition you say " The competition is keenest both from Japan and Sweden but now-a-days more from the latter." It has been stated to us that there is a combine between the Japanese and Swedish manufacturers in Japan.

Mr. Bhagwat.—There are two or three factories which the Swedish have purchased from the Japanese people.

President.—So that competition is from Sweden to that extent is it not? Are these the people who export most of the matches to Burma?

Mr. Bhagwat.—There is one factory outside the combine and that is one of the biggest factories in Japan—the factory—who export the eagle and the bamboo shoot brands.

President.—You say " We do not know exactly the prices during 1918-22, those in 1922-26 were Rs. 2-6-0 per gross to Rs. 3-2-0 depending upon the quality and brands." Can you give us prices for each year separately?

Mr. Bhagwat.—No.

Mr. Mathias.—You were importing matches?

Mr. Bhagwat.—These are prices at which the Japanese are selling here. We are importing very small quantities in Rangoon.

Mr. Mathias.—Are these retail prices?

Mr. Bhagwat.—Wholesale.

President.—Can you give me prices of matches in Japan itself to-day for local use?

Mr. Bhagwat.—About 30 yen per 50 gross; that comes to about Rs. 40. That does not include any zinc sheet or case. These are all sold there in small bundles.

President.—What would be the cost to be added for the zinc sheet and the case?

Mr. Bhagwat.—Rs. 4 for the zinc sheet and Rs. 3-8-0 for the packing case.

President.—That will make it about Rs. 47-8-0. That is the price at which it is sold in Japan? Now you say it comes here c.i.f. landed at Rs. 50 per 50 gross.

Mr. Bhagwat.—These goods are sold in Japan at a higher price than the price at which they are sold in the export market.

President.—That means Rs. 50 c.i.f. Rangoon. What is the freight?

Mr. Bhagwat.—Rs. 4 per case of 50 gross; that makes Rs. 51-8-0. Then there will be some other charges too.

President.—Instead of that they send it out here at Rs. 50? What is the export price there if the local price is 30 yen?

Mr. Bhagwat.—For export they will accept much less; about 4 yen cheaper, that is about Rs. 5.

President.—You say they sell in Japan at 30 yen and for export they quote about 4 yen less, that is about Rs. 5 less. Then you have got to add other charges and at what price will they be sold in the bazar?

Mr. Bhagwat.—Rs. 2-10-0 a gross wholesale.

President.—And in retail how much would it be?

Mr. Bhagwat.—The retailers sell at Rs. 135 for six tins of 50 gross. Rs. 2-11-0 will be the retail price.

Mr. Mathias.—Rs. 2-11-0 will be retail price and Rs. 2-10-0 wholesale.

Mr. Bhagwat.—Yes.

President.—Can you give us the name of any importing house?

Mr. Bhagwat.—Messrs. Eng Hing Hwat Brothers.

President.—What price do you realise for local matches?

Mr. Bhagwat.—Rs. 1-12-0 to Rs. 1-14-0.

President.—That ought to give you a very good margin.

Mr. Bhagwat.—We realized this up to last year May but now it is Rs. 1-9-0.

President.—You have given the cost of 50 gross as Rs. 74 and therefore for 100 gross it comes to Rs. 148.

Mr. Bhagwat.—That is so.

President.—You sell at Rs. 1-9-0 a gross so you realize Rs. 156. You manufacture 600 gross a day or 180,000 a year so that you make about Rs. 15,000. Even if your capital was a lakh of rupees it would not be bad. It is not a bad return.

Mr. Bhagwat.—It ought to be more because of the credits we have to allow. It is too much.

President.—I mean to say that at Re. 1-9-0 you are not doing badly and it would pay you to continue your business.

Mr. Bhagwat.—Sales are slower now-a-days.

President.—Considering everything it is not bad. Now the point arises, in order to dispense with protection you have to bring your fair selling price down from Re. 1-9-0 to Re. 1. Supposing there was no duty, is there any chance of your being able to do so?

Mr. Bhagwat.—We can show economy only in labour. As this labour becomes more and more trained they should be able to produce more.

President.—How will you bring your costs down by 9 annas? In what direction can you show economy?

Dr. Matthai.—By cutting down the wages or reducing the number of labourers?

Mr. Bhagwat.—As they become more and more efficient they may accept less per 1,000 boxes.

Dr. Matthai.—Will you be able to lower the rates?

Mr. Bhagwat.—Yes. Only recently we have informed the box makers that we shall reduce the rate to 15 annas.

President.—Can you reduce it as much as 9 annas?

Mr. Bhagwat.—This will have to be done slowly; it cannot be done all at once.

Mr. Mathias.—If you so improved the quality of your matches that the prejudice against Indian matches disappeared, won't you be able to produce them in competition with imported matches even without the duty? I am not speaking of the present moment but in course of time.

Mr. Bhagwat.—Yes, it is possible.

Dr. Matthai.—You give us your working capital as Rs. 1,00,000. Do you require so much as that?

Mr. Mathias.—Won't you be able then to produce them in competition with the imported matches?

Mr. Bhagwat.—We shall be able to produce matches in competition.

Mr. Mathias.—The measure of prejudice is now As. 12 a gross. When that prejudice disappears, won't it be possible to compete with the foreign manufacturer even without the duty. I am not speaking of now.

Mr. Bhagwat.—Yes, in course of time it may be possible.

Working Capital.

Dr. Matthai.—You require at present Rs. 1,00,000 as your working capital. Do you require as much as that.

Mr. Bhagwat.—It is calculated like this. Customers are given 30 and 60 days credit. It is only recently we have to start the credit system.

Dr. Matthai.—When you give credit for short periods, have you ever had to raise loans for your working expenses?

Mr. Bhagwat.—No.

Dr. Matthai.—Now you require 1,200 tons a year. How much of that is in stock on an average?

Mr. Bhagwat.—We keep about a month's stock of wood.

Dr. Matthai.—The other imported materials.

Mr. Bhagwat.—About 2 months stock.

Mr. Mathias.—You state that working capital is about a lakh of rupees. Do you mean to say that it is the total capital or do you mean that the working capital is Rs. 1,00,000?

Mr. Bhagwat.—Everything together.

Mr. Mathias.—What I mean by working capital is the amount of capital which represents roughly the stock of raw materials, and the stock of finished goods which you have not disposed of. That amount would be very small. Your outturn is very quick.

Mr. Bhagwat.—Now-a-days it is not so very quick. We have to go on keeping stock.

President.—The point is this. You have to pay for your raw material and for your semi-finished and finished stock. That money you have got to find either by borrowing, in which case you will have to pay interest, or from your own pocket in which case you are losing interest. The point to ascertain is what is the fair charge on your working capital. Could you give us any idea as to the amount of money locked up in the way of stocks? Could we take for instance a rough figure like the value of one month's production or the value of three weeks production?

Mr. Bhagwat.—I think one month's production will be enough.

Costs.

Mr. Mathias.—In the second part of your answer to question 75 you have given your average costs of making six tins containing 50 gross. Are these actual costs taken from your accounts or mere estimates.

Mr. Bhagwat.—These are averages for about six months.

Mr. Mathias.—I see you have put down wood for splints and boxes at Rs. 60 a ton.

Mr. Bhagwat.—We get wood for splints at Rs. 40 and for boxes at Rs. 50.

Mr. Mathias.—The average between Rs. 40 and Rs. 50 is not Rs. 60.

Mr. Bhagwat.—I have taken into consideration the wastage.

Mr. Mathias.—Including wastage you have put down here 15 c. ft. of wood as producing 50 gross of matches. Yet you have charged the wood at Rs. 60 instead of Rs. 40 or Rs. 45. Rs. 60 rather seems to be high. Even your pine wood costs only Rs. 45. Your *sawbya* and maulettanshe cost about Rs. 30 to Rs. 35. Rs. 60 seems fairly high as an average. Your prices for chemicals seem to be rather on the high side. I find that the highest price that Adamjee's stated as having been paid for Amorphous phosphorous was £210 (about Rs. 2,800) a ton against your Rs. 3,360. Could you explain that difference?

Mr. Bhagwat.—There is a slight difference in this. Some people get phosphorous 96 to 98 per cent. and others what is commercially known as 99 and 100 per cent. pure. This 99 and 100 per cent. stuff is nicely powdered. That may be the reason.

Mr. Mathias.—I give you two other instances. For instance, your price for glue is Rs. 1,100 a ton as against Adamjee's Rs. 866.

Mr. Bhagwat.—We get glue in small quantities. We don't buy in big quantities. That may be Continental glue and ours is Japanese glue.

Mr. Mathias.—For sulphur your price is Rs. 300 as against Adamjee's Rs. 168.

Mr. Bhagwat.—These are based on the invoice prices.

Mr. Mathias.—Who sends out these chemicals to you from Japan?

Mr. Bhagwat.—We have our own proprietor there who sends out these things.

Mr. Mathias.—Is he an Indian?

Mr. Bhagwat.—Yes. He has got his export house there. I don't think he will charge us more.

Mr. Mathias.—Is he the proprietor of the match works?

Mr. Bhagwat.—Yes.

Mr. Mathias.—The money entirely belongs to him.

Mr. Bhagwat.—Yes.

Mr. Mathias.—There are no other shareholders.

Mr. Bhagwat.—No.

Mr. Mathias.—It does not belong to a Company.

Mr. Bhagwat.—No.

Mr. Mathias.—Are the chemicals produced in Japan?

Mr. Bhagwat.—Except phosphorous and chlorate most of them are produced there.

Mr. Mathias.—Where do you get phosphorous from?

Mr. Bhagwat.—We get it from Japan, but it is Swedish.

Mr. Mathias.—So far as phosphorous is concerned, would not that be a reason for the higher price?

Mr. Bhagwat.—We can't account for such a very big difference. The freight is not so high.

Mr. Mathias.—I suppose your proprietor dealing in these products would as a wholesale house charge commission to the works in the ordinary way.

Mr. Bhagwat.—Yes, but in Japan big dealers import on a pretty large scale for the Japanese match manufacturers and one can get at a good price there.

Mr. Mathias.—Does it not appear by dealing with your own proprietor's firm you are paying rather more than you would if you purchased your materials direct?

Mr. Bhagwat.—I made enquiries of English firms in England. They would not supply in small quantities. They will require one ton of phosphorus to be bought at one time. We can buy only 300 lbs. or 500 lbs. like that. Unless it is on a bigger scale probably it is not profitable.

Dr. Matthai.—I find that Messrs. Adamjee Hajee Dawood and Company gets phosphorus from Great Britain. Is that because they get it in large quantities?

Mr. Bhagwat.—Their phosphorus may be a little inferior in purity. There are two qualities 96, 98 and 99 and 100 per cent. If they are using a grinding mill for preparing the side composition, they can use 96 and 98 per cent. pure quality of phosphorus at a cheaper rate, whereas we grind it by hand and we require finely powdered stuff which is more costly.

Mr. Mathias.—Do you get your zinc sheets direct from Belgium?

Mr. Bhagwat.—I get them through a friend.

Mr. Mathias.—You don't get it through the proprietor.

Mr. Bhagwat.—No.

Mr. Mathias.—That seems to be the only article in which the price given by Adamjee's and your price agree.

Mr. Bhagwat.—Yes.

Mr. Mathias.—Where do you get your potassium chlorate from?

Mr. Bhagwat.—That I get it from Bullock Brothers here.

सत्यमेव जयते

The Muslim Match Factory.

Replies to questionnaire.

1. December 1925. Private unregistered firm.

2. Rs. 1,50,000 (Rs. one hundred and fifty thousand) invested by me. No Europeans are employed.

3. The whole process of manufacture is undertaken.

4. 11th December 1925. The factory was started by Memon Industrial Company in the beginning of 1924. They could not work it profitably and sold to the other party, who sold the same to me, in December 1925.

5. 75 tins of matches each containing 1,200 boxes per day of 10 hours.

6. Only full size box, the rough measurement is $2\frac{1}{4}'' \times 11\frac{5}{16}'' \times 1\frac{3}{8}''$. 75 splints in each box.

7. 57,941 gross for one year from March 1926 to February 1927 (6,953 tins of matches).

8. The factory is situated at 87, Prome Road, in Rangoon District. (*a*) Yes. (*b*) Yes. (*c*) Yes. (*d*) Yes.

(*a*), (*b*), (*c*), and (*d*) are some of the important factors in selecting a site for a Match Factory. Further the factory should be situated on a river bank where fresh water is abundantly available.

9. (*a*) Matches manufactured from Indian matchwoods are inferior to foreign matches as the Indian matchwoods are inferior to foreign matchwoods available in Poland and Siberia.

Indian matches manufactured from foreign matchwoods are not inferior to foreign matches. The Pine woods yield almost the same quality of box veneers as the Japanese Pine.

(*b*) No.

(*c*) The Swedish matches are selling at Rs. 21-12 per tin of 1,200 boxes whereas my matches sell at Rs. 11-8 to Rs. 12 per tin. The difference in price fairly represents the difference in quality.

Raw materials.

10. (*a*) No. (*b*) No. (*c*) No.

11. (*a*) Shawbye Mauletanshe (Sarcocephalus Cordatus). (*b*) Letpan (Bobax Malabaricum). Didok (Bobax Insigne).

(*c*) Same as (*b*).

The above mentioned woods are fairly satisfactory though the quality is inferior to foreign woods. The Siberian and Polish matchwoods are fine-grained and white whereas local timbers are not so much fine-grained and white.

13. Considering 50 tins of output of the present rate, the 75 tons of timbers are required per month, *i.e.*, 900 tons per year. 1,350 tons per year considering 75 tins for full capacity.

14. About 34 c. ft.

15. $3'3'' \times 2'2'' \times 2'$ (outside measurement) made of $\frac{3}{8}''$ thick plank. Each case requires about 2·26 c. ft. of timber. 50 gross boxes are packed in the case.

16. Wanetchaung, Thanachaung and Thugyi (Insein District), Moulmein District, Shan States and Myaunglebin.

17. Trees are cut by the saw, brought to the station by buffalo or elephant and carried by the railway wagons to the nearest station wherefrom they are carried to the factory.

18. Rs. 4 to Rs. 12-8 per ton. Royalty paid by the suppliers.

19. Rs. 35 to Rs. 42 per ton.

20. No.

21. Often the suppliers have to wait long owing to delay of the forest people to pass the timber and then again for want of timber wagons supply the timbers are delayed in the way. Owing to these reasons the timbers are often dried, cracks and becomes useless.

22. It has not been found necessary to draw supplies from greater and greater distances.

23.

24. Yes, I would suggest the Local Governments (Provincial) should undertake plantation of trees suitable for match industry so as to actively encourage the industry.

25. No. Yes.

26. Flour, Glue, Gum Senegal, Gum Tragacanth, Lamp-black, Potash Chlorate, Potash Bichromate, Sulphur, Antimony Trisulphate. Amorphous Phosphorus, Glass Powder, Infusorial Earth, Red Oxide, Amber, Caput Mortem. Manganese Dioxide, Litharge, Red lead, Zinc Oxide, Zinc sheets, labels, etc. Requirements will depend upon the output.

27. Different proportions of chemicals are used in different seasons. So the quantity can not be stated.

28. Almost all. Indian Glue, Gum Senegal, Burma Paraffin and Calcutta Glass powder are occasionally used. Imported articles are brought from England, Germany and other continents.

29. (*a*) All except Potash Chlorate. Raw materials for the manufacture are abundantly available.

30. No.

31. Engineer and chemist are necessary for further improvement.

32. No.

33. The labourers are trained by the Manager.

34. 80 men, 62 women and 6 children. Men are salaried whereas women and children are contract labourers. Men get 12 annas average, women 12 annas and children 6 annas.

35. Both.

36. Yes. Output gradually increasing.

37. I intend to improve the quarters of the labourers.

38. Steam.

39.

40. Fuel.

41. About Rs. 350 per month.

42. Within a distance of 5 miles.

43. No. No.

44. Can be obtained from the Custom's import list.

45. It may increase if the Government encourage the people in the direction of smoking cigars.

46. Burma. The factory is in the chief town.

48.

49. Sweden and Japan.

50. Both.

56. Yes. 75 tins of matches.

58. My machineries are German make (Maker.....A. Roller) and were originally bought from by the Illich Match Factory 15 years before.

59. (*a*) Yes. (*b*) About 100 outside girls earn their livelihood by making my boxes by hand. Box-filling, side-painting and packetting are also done

by hand. The total labour charge for these items will be about 14 annas per tin of 1,200 boxes. In case of using machineries cost will be less but on getting the labour properly trained, the rate may be made less.

60. (*a*) Yes. (*b*) Yes. I intend to fit a side painting machine.

61. Spare parts are made in local workshops according to order.

81. (*i*) 70,000, (*ii*) 100,000.

82. It is necessary to borrow.

94. Yes. (*b*) Yes. (*c*) After some years. Timber and fuel are abundant in India. The supply of labour is also abundant. For want of industrial developments, Indian labourers do not find scope for livelihood. Thus the match industry has been encouraged by the Japanese Government and many other Governments in Europe. The present nationalised Government of India should prove that it is so by protecting the Indian vested interest.

95. Yes. (*b*) Yes.

96. Very large number of people cannot get employment in India but if encouragement is given to this industry, many large number of them will get work for earning their livelihood. The Board should see the outside work of the labourers engaged in this industry. Large number of girls and boys are engaged in box making in their homes.

97. To large extent. (*b*) Not appreciable.

98. All chemicals and papers necessary for match manufacture should be free of duty to the manufacturers. Special concession rate should be given to the manufacturers of matches in case of railway and river transport in the coast transport.

M. C. ABOWATH.

सत्यमेव जयते

Rates of articles.

Name.	Per unit.	C.i.f. rate.	Exchange.	Rs.	Duty.	At Works rate.	Per unit.
					Per cent.	Rs. A. P.	
Litharge	1 Picul	Yen. 30·00	137	41 2 0	15	40 0 0	Per cwt.
Lamp Black	100 Lbs.	„ 42·00	137	57 8 0	15	74 0 0	„
Plaster of Paris	„	„ 9·40	137	12 14 0	15	15 8 0	„
Bichromate Potash	1 Ton.	£44 0 0	1/5 29/32	595 0 0	15	34 9 0	„
Powder Glue	„	£58 0 0	1/5 29/32	782 0 0	15	45 3 0	„
Powder Antimony	„	£57 0 0	1/6 1/32	760 0 0	15	44 4 0	„
Powder Glass	„	£ 7 4 9	1/6 1/32	96 5 0	15	5 12 0	„
Antimony Sulphide	100 Kins.	Yen. 25·0	134·0	40 5 0	15	38 0 0	„
Manganese Dioxide	1 Ton	£18 3 0	1/6 1/32	241 15 0	15	14 3 0	„
Chlorate of Potash	„	£30 10 0	1/6 1/32	411 0 0	15	24 0 0	„
Amorphous Phosphorus	„	£219 0 0	1/6 1/32	2,947 0 0	15	170 5 0	„
Infusorial Earth	100 Lbs.	Yen. 4·80	125·00	6 0 0	15	7 14 0	„
Timber	1 Picul	„ 7·8	125·00	9 12 0	15	9 4 0	„
Caput Mortem	1 Ton	£14 0 0	1/6 1/32	168 0 0	15	11 14 0	„
Potash Dextrine	2 Cwts.	£ 6 16 6	1/6	91 0 0	15	53 0 0	„
Sulphur Flowers	1 Ton	£15 4 0	1/6	198 12 0	*Nil*	10 4 0	„
Zinc Oxide	1 Cwt.	£ 2 12 0	1/6	34 8 0	15	39 6 0	„
Zinc Sheets	1 Ton	£51 0 0	1/6 1/32	680 3 0	15	39 3 0	„ (75 Pcs. and 150 Pcs.)
Labels Small	1,000	£ 0 0 2	1/6 1/32	...	15	14 0 0	10,000 Labels.
Labels Big	1,000	£ 0 0 3 3/4	1/6 1/32	...	15	37 0 0	100,000 „
Wrapping Papers	Ream	Yen. 5·60	134	7 2 0	15	8 3 0	Per ream.
Cut Papers	10,000	„ ·90	134	1 2 0	15	1 6 0	„ 10,000.

THE MUSLIM MATCH FACTORY.

Evidence of Mr. B. BANERJEE, M.Sc., Expert and Works-Manager, recorded at Rangoon on Wednesday, the 23rd March 1927.

Introductory.

President.—Are you appearing for the Muslim Match Factory?

Mr. Banerjee.—Yes.

President.—In what capacity do you appear?

Mr. Banerjee.—I am the Works-Manager.

President.—Are you in possession of all the information?

Mr. Banerjee.—Yes. All the works are done under my supervision.

President.—Who is the proprietor of the Muslim Match Factory?

Mr. Banerjee.—Mr. M. C. Abowath is the Proprietor of the factory.

President.—Does he know much of the business? Are you also in charge of sales?

Mr. Banerjee.—No, I am not in charge.

President.—That is rather unsatisfactory.

Mr. Banerjee.—But I can give you all information.

President.—Who is in charge of sales?

Mr. Banerjee.—Mr. Abowath himself.

President.—Have you had any special training in the manufacture of matches?

Mr. Banerjee.—I am in the match business for the last three years. I was chief chemist and Works-Manager of Mahlwagon Match Factory which had been bought by the Rangoon Match Works.

President.—Where did you learn?

Mr. Banerjee.—I am an industrial chemist.

President.—Where were you trained?

Mr. Banerjee.—In the Calcutta University.

President.—Have you had any special training?

Mr. Banerjee.—Practical work in Mahlwagon Match Factory.

President.—You learnt it here then?

Mr. Banerjee.—I was in various factories for a long time. I was in Quetta before.

President.—Is there a match factory in Quetta?

Mr. Banerjee.—There was a factory for the extraction of essential oils there. I was also in the Indo-Burma Petroleum Works. Afterwards I was the Manager in the Rangoon Soap Works, Kamayut.

President.—In Calcutta you did not work in any Match Factory?

Mr. Banerjee.—No.

President.—Then, you say that the factory was started in 1925.

Mr. Banerjee.—The factory was started before 1925 but it was bought by Mr. M. C. Abowath in 1925.

President.—But in a later paragraph in answer to question No. 58, you say that the machinery was bought originally by the Illichpur Match Factory.

Mr. Banerjee.—I was informed that this machinery was bought by the Illichpur Match Factory in India. Somehow or other that factory failed and the machinery came to Burma. Afterwards, it came into the possession of Mr. V. M. Ghanni who started this factory first in 1924, and finally it came into the hands of Mr. M. C. Abowath in December, 1925.

Dr. Matthai.—How old is the machinery now?

Mr. Banerjee.—About 15 years. The date is given in Mr. Troup's book.

Mr. Mathias.—It is only a dipping machinery, or have you got a peeling machinery also?

Mr. Banerjee.—Everything, peeling, box-making, frame-filling, etc.

Dr. Matthai.—Is it a complete set of machinery?

Mr. Banerjee.—The drying machineries are damaged; whereas the other machines are complete and in good condition.

President.—Your factory does not work on Fridays.

Mr. Banerjee.—No.

President.—Your labour is not Muhammadan, is it?

Mr. Banerjee.—Some labourers are Muhammadans and the factory was being closed on Fridays from the beginning being a special prayer day for the Muhammadans.

President.—Do you work on Sundays?

Mr. Banerjee.—Yes.

President.—Instead of closing the factory on Sunday, you close it on Friday.

Mr. Banerjee.—Yes.

Output.

President.—You have been manufacturing matches only for about a year.

Mr. Banerjee.—Yes, in this factory.

President.—Your output was very small last year.

Mr. Banerjee.—Yes.

President.—Your output was about 57,000 gross of boxes.

Mr. Banerjee.—That is right.

Dr. Matthai.—That comes to about 200 gross a day.

Mr. Banerjee.—Yes. **Now the outturn has increased to 50 tins daily, each tin containing 1,200 boxes.**

Dr. Matthai.—That is about 400 gross a day.

Mr. Banerjee.—Yes.

Dr. Matthai.—Your full capacity is about 800 gross of boxes a day.

Mr. Banerjee.—About 100 tins of matches, each containing 1,200 boxes per day of 10 hours.

Dr. Matthai.—That comes to about 800 gross a day.

Mr. Banerjee.—Yes.

Dr. Matthai.—How many days do you work in a year?

Mr. Banerjee.—26 days per month.

President.—Have you no holidays?

Mr. Banerjee.—We have a few holidays.

President.—300 days would be about correct.

Mr. Banerjee.—Yes.

Mr. Mathias.—Are you situated on a river bank?

Mr. Banerjee.—No. The factory is two miles off from the railway siding and 3 miles off from the river.

Timber supply.

Mr. Mathias.—Do you get your wood by train and then cart it?

Mr. Banerjee.—We get it by train and then cut it to the necessary size at a place near the railway station and then we take it by lorry to the factory.

President.—Do you cut it by hand there?

Mr. Banerjee.—Yes.

President.—Where do you get your wood from?

Mr. Banerjee.—We get it from different places of Burma.

President.—All your supplies come by rail?

Mr. Banerjee.—Yes.

President.—Do you get your wood from the traders?

Mr. Banerjee.—Yes.

President.—Have you a tank in your factory?

Mr. Banerjee.—No.

President.—You have got no tank for submerging your wood?

Mr. Banerjee.—No.

Mr. Mathias.—So that you cannot keep it for any length of time.

Mr. Banerjee.—No. We generally try to get fresh stock. We cannot keep any stock because it will dry up and crack.

Mr. Mathias.—Your factory is rather unsuitably situated.

Mr. Banerjee.—We find difficulty, it is true.

Dr. Matthai.—At a time how much wood do you buy?

Mr. Banerjee.—We want about 75 tons a month. We give contracts for 50 tons.

Dr. Matthai.—How much on an average do you have in stock?

Mr. Banerjee.—About 30 tons.

Dr. Matthai.—Where do you keep it?

Mr. Banerjee.—Near the Railway Station and at the Factory.

Varieties of wood.

President.—How many classes of wood do you use? You have mentioned Sawbya, Maulettanshe, Didu and Letpan.

Mr. Banerjee.—We use four kinds of wood.

President.—Sawbya and Maulettanshe you use for splints.

Mr. Banerjee.—Yes.

President.—Do you use them also for box veneers?

Mr. Banerjee.—Sawbya we use often for inside boxes and for the bottom but not for the outside.

President.—What do you do for the outside box?

Mr. Banerjee.—We use Letpan and Didu.

President.—Is there any difference in the price of wood?

Mr. Banerjee.—Yes. Sawbya and Maulettanshe are selling at Rs. 35 a ton delivered at the station.

President.—How much does it cost to take it to the factory from there?

Mr. Banerjee.—About Rs. 2 more.

President.—What is the price of the other two varieties?

Mr. Banerjee.—About Rs. 30 a ton. Sometimes the price will go up. I have given the price here as Rs. 35 to Rs. 41. For instance we have to pay more for pine.

President.—Do you use pine also?

Mr. Banerjee.—We formerly used it and we intend using it in future. The difficulty about pine is that it cannot be used for box veneers on the

German machine. It has to be boiled for a long time before it can be used for box veneers on the German machine. But in the case of the Japanese machine, the veneer comes out at first and then the pieces of veneer are put into the grooving machine and they are grooved. In such a way boiling is not necessary.

President.—Is it one process?

Mr. Banerjee.—In the German machine, it is one process; whereas in the case of the Japanese machine, grooving is done separately.

Mr. Mathias.—What is the exact difficulty in using the pine on the German machine?

Mr. Banerjee.—The difficulty is that the grooves are not made properly. In the case of the German machine, the knives are in the horizontal position and in the Japanese machine, they are at an angle of about 45° with the horizontal plane. In the former case, the knife heads get clogged.

Mr. Mathias.—Do the knots in the pine wood make any difference?

Mr. Banerjee.—No difference.

Mr. Mathias.—The difficulty that you feel in regard to the pine wood in the making of veneers, does that difficulty arise in the case of Japanese pine wood? Have you any knowledge of that wood?

Mr. Banerjee.—When I was in the other factory, I used the Japanese pine wood. It is not so hard grained. Further there is no difficulty in the case of the Japanese machine. The difficulty comes in only in the case of the German machine.

Mr. Mathias.—In the case of the Japanese machinery, there are two processes.

Mr. Banerjee.—Yes.

Mr. Mathias.—And the processes are separate.

Mr. Banerjee.—Yes.

Dr. Matthai.—Have you used Letpan at all for making splints?

Mr. Banerjee.—I have tried it. The splints become reddish after a time.

Dr. Matthai.—What about Didu?

Mr. Banerjee.—We have not found it suitable. There is another difficulty with regard to these two varieties. They do not absorb paraffin properly. The head composition too does not stick so consistently as in the other kinds.

Mr. Mathias.—Are your matches damp-proof?

Mr. Banerjee.—They are sufficiently damp proof.

Mr. Mathias.—The top splints might be a little difficult to strike but those which are a little lower down in the box might strike easily.

Mr. Banerjee.—All of them strike easily.

President.—How many brands have you got?

Mr. Banerjee.—6.

Dr. Matthai.—How many sizes do you make?

Mr. Banerjee.—Only one size.

Dr. Matthai.—Is it full size?

Mr. Banerjee.—Yes.

Dr. Matthai.—How many splints are there in a box?

Mr. Banerjee.—80 to 85.

Process of manufacture.

President.—Have you got any box-making machine?

Mr. Banerjee.—These (samples) are all hand made. But we have box-making machines.

President.—How much do you do by hand and how much is done by the machine?

Mr. Banerjee.—We do mostly by hand. The box-making machines have been fitted recently and the work is under trial.

President.—Is the dipping also done by hand?

Mr. Banerjee.—Yes.

Mr. Mathias.—Are these matches soaked in paraffin?

Mr. Banerjee.—Yes.

President.—Do you follow the same system as they do in the Rangoon Match Works? They make the splints and the veneers by machine and everything else is done by hand.

Mr. Banerjee.—Yes.

President.—You have not given us any costs at all.

Mr. Banerjee.—I have got them with me now (hands in a list).

Dr. Matthai.—You have left a blank against Swedish matches?

Mr. Banerjee.—It is Rs. 21-12-0.

President.—How much is that per gross?

Mr. Banerji.—A little less than Rs. 2-10-0.

President.—You are selling yours at Rs. 1-6-0.

Mr. Banerjee.—Yes.

Mr. Mathias.—When you complain in answer to question 21 that "suppliers have to wait long owing to delay of the forest officers to pass the timber and then again for want of wagon supply the timbers are delayed on the way and owing to these reasons the timbers are often dried up, and they crack and become useless," what I understand from what you say is that this is mainly due to the disadvantageous situation of the factory?

Mr. Banerjee.—Not that. We do not cut the trees but place orders with the suppliers who cut them and bring them down to the nearest station.

Mr. Mathias.—You have to bring them down to the railway station and then you have to carry them from the station to the factory and you have no place to stock them?

Mr. Banerjee.—We have place to stock them but as the Factory is away from river we cannot keep in tank with regular water supply. We can keep stock as it is without much damage for 15 days.

Mr. Mathias.—You are living from hand to mouth if you have only 10 to 15 days' supply? If you were more advantageously situated you would not have so much trouble.

Mr. Banerjee.—That is true. What the contractors inform us is that they find difficulty in getting the timber passed by the forest people.

Costs.

President.—What is your total cost per 100 gross?

Mr. Banerjee.—Rs. 10-10-0 for 8⅓ gross.

President.—That is Rs. 1-4-3 per gross. That includes all your costs?

Mr. Banerjee.—Yes.

President.—Does that include depreciation and interest on working capital that you had to borrow?

Mr. Banerjee.—No.

President.—Does it include office charges?

Mr. Banerjee.—Yes.

President.—Does it include any profits?

Mr. Banerjee.—No.

President.—Have you got the figures under separate headings?

Mr. Banerjee.—Yes. They are as follows:—

	Rs.	A.	P.
Timber	1	12	0
Chemicals and paraffin	2	0	0
Outside and inside wrapping paper	0	8	0
Packing paper	0	3	0
Small label	0	3	0
Big label	0	0	9
Flour	0	0	6
Zinc sheet	0	12	0
Box-making labour	1	4	0
Box-filling labour	0	10	0
Side painting	0	1	6
Packeting	0	1	6
Soldering	0	1	5
Salaried labour	3	0	0
Depreciation and interest on capital should be added to this, say	0	6	0
TOTAL	11	0	0

Mr. Mathias.—That is per tin of 8½ gross?

Mr. Banerjee.—Yes. I may mention that I made some experiment with Kamayut timber. It was very fresh and the cost for one tin of splints came to Re. 1. I mention this only to show that in case fresh timber is available there is not so much wastage.

President.—You have told us that you can reduce costs still further? How will you do it?

Mr. Banerjee.—If the splint and box veneer making industry is transferred to the forests.

President.—That is rather a different idea. I thought in your own factory you could do it.

Mr. Banerjee.—I don't think I can do that in my own factory.

President.—If you got sufficient stock?

Mr. Banerjee.—With fresh stock only economy can be effected. It can be effected by dividing the establishment also.

Dr. Matthai.—But by dividing your establishment and so on you increase your charges?

Mr. Banerjee.—But there will be saving in the freight and in other directions, and wastage will be less.

President.—I do not see that this is of much advantage. What I want to know is whether in your own factory you can suggest anything by which the costs can come down.

Mr. Banerjee.—I am afraid no reduction is possible in our factory because it is far away from the station siding and from the river and we have not got a suitable tank to keep timber in good condition.

President.—Why was it started at Kamayut?

Mr. Banerjee.—I can't say: that was not done in my time. The reason so far as I am aware was that Messrs. Memon Industrial Company who originally bought the machinery is Managing Agent of a soap factory there and when they bought the machinery they had not sufficient capital at their disposal to start a match factory at a better place so they fitted the factory thereby the side of soap factory.

President.—Is Mr. Abowath interested in the soap factory?

Mr. Banerjee.—No.

President.—Your costs appear to be lower than any we have so far examined.

Mr. Banerjee.—Because our establishment charges are low. The manufacture is managed by me entirely with the help of labourers.

President.—Are these costs otherwise accurate?

Mr. Banerjee.—Yes.

President.—Are these costs taken from your books?

Mr. Banerjee.—Yes.

President.—How do you keep your costs?

Mr. Banerjee.—I have got a process book in which I write down the formulæ and how much of each is used and then after the end of the month I find out the values of the materials used and from that I make a general calculation and arrive at the cost of matches. I don't do it every time.

President.—As regards timber I suppose you have got to do that?

Mr. Banerjee.—We are buying at the same price. It will be roughly from Rs. 35 to Rs. 41.

President.—How much timber do you take for your gross of matches?

Mr. Banerjee.—($\frac{3}{10}$) ·3 c. ft. per gross of matches.

Mr. Mathias.—You have not included in this case the cost of power and lubricating oil?

Mr. Banerjee.—Everything is included. That will come under that Rs. 3 for the salaried staff. I should like to state that Rs. 350 is to be spent for fuel per month.

Dr. Matthai.—Your power comes to Rs. 350 a month?

Mr. Banerjee.—Roughly.

Dr. Matthai.—What is your fuel?

Mr. Banerjee.—Small pieces of teak and saw dust.

Dr. Matthai.—What price do you get it at?

Mr. Banerjee.—Saw dust Rs. 26 per 100 bags 48″ × 32″.

President.—You say you do box filling by contract?

Mr. Banerjee.—Box-filling, side-painting and packeting by contract. Women do these. Box-making and labelling is done by women at Re. 1 per 1,000.

Dr. Matthai.—Going back to the question of power, you spend Rs. 350 a month on fuel and your daily production is 50 tins. How much is your monthly production?

Mr. Banerjee.—About 1,300 tins. We are burning the waste timber also; that is from our own factory.

President.—You do not require any power at all. That one engine is doing the whole thing.

Mr. Banerjee.—That is so, but I find some difficulty because it is not powerful enough.

President.—What have you got?

Mr. Banerjee.—A small German portable engine, combined with boiler.

President.—You said you get Rs. 1-6-6 per gross of matches so that you have got a margin of 0-1-3?

Mr. Banerjee.—Re. 1-5-3 is the cost, there is a margin of 0-1-3 per gross.

President.—You say you are satisfied with that. You do not want any further increase in the duty?

Mr. Banerjee.—What is already there is enough, I think.

Mr. Mathias.—Your capital you state to be Rs. 1,50,000?

Mr. Banerjee.—I understand that the valuation of the factory was Rs. 1,00,000 and the present working capital required Rs. 70,000 (seventy thousand).

Mr. Mathias.—The machinery is about 15 years old, Rs. 1,00,000 is a high valuation.

Mr. Banerjee.—We bought the factory at that price. In case of buying new machinery the valuation will be far higher.

Mr. Mathias.—Rs. 70,000 is a large sum for working capital, because you say you have no stock of timber.

Mr. Banerjee.—From the beginning we were working at a loss. The outturn was 500 to 600 tins a month, sometimes less even. Then after I joined this factory the outturn gradually rose up and now it has come to the present position.

Mr. Mathias.—Why should you want seventy thousand for working capital because you have not got to keep any stock of either timber or finished matches?

Mr. Banerjee.—We shall have to sell matches on credit. We cannot sell them for cash. We have got trouble in that especially owing to the practice of the Swedish manufacturers and Messrs. Adamjee Hajee Dawood Company who give credit for an unknown time. We don't know how long they give credit. We hear they give 3 to 8 months' credit.

Mr. Mathias.—The match manufacturers do not seem to be a happy family.

Mr. Banerjee.—They are not.

Mr. Mathias.—Can you give me any idea as to how long it would take to collect the money?

Mr. Banerjee.—Two to three months.

Mr. Mathias.—As regards the working capital, three months output will be a fair amount.

Mr. Banerjee.—The output is about 1,300 tins. At Rs. 11, it comes to Rs. 14,300. Then there are chemicals, etc. It will come to about Rs. 70,000 and in this Rs. 70,000 some new machinery is included. Rs. 1,00,000 is the original valuation of the factory.

Mr. Mathias.—Who made the valuation?

Mr. Banerjee.—Messrs. Memon Industrial Company.

President.—It was worth a lakh of rupees in 1910.

Mr. Banerjee.—In 1925 it came into the hands of Mr. Abowath and he bought at Rs. one Lakh.

President.—Did Mr. Abowath pay Rs. 1,00,000?

Mr. Banerjee.—Yes.

Mr. Mathias.—You cannot produce any document as to what price was paid for the machinery.

Mr. Banerjee.—Document may be produced if required.

Mr. Mathias.—Have you got any document?

Mr. Banerjee.—Yes.

President.—This valuation is not of much use to us at present.

Mr. Banerjee.—That is the price at which Mr. Abowath bought.

President.—You have made a good proposal in answer to question 45. You say there "The demand may increase if the Government encourage the people in the direction of smoking cigars." What do you wish we should suggest in order that cigar-smoking may be encouraged?

Mr. Banerjee.—Personally I am against cigars altogether. I don't find any other way to increase the sale. Every hearth and home now-a-days is using matches. Twenty-five years before we knew that sticks were dipped in sulphur and they were burning by keeping the fire in the night. That process has already disappeared.

Dr. Matthai.—Look at your answer to question 15. You say: "Each case requires about 2·26 c. ft. of timber."

Mr. Banerjee.—Yes.

Dr. Matthai.—The figure that we got from Messrs. Adamjee Hajee Dawood and Company is 5 cubic ft.

Mr. Banerjee.—What we have given you is the actual measurement.

Dr. Matthai.—You really have had no experience of making.

Mr. Banerjee.—I have measured it myself.

Dr. Matthai.—You don't export.

Mr. Banerjee.—We do export to Madras.

Dr. Matthai.—You make your own packing cases out of rejected wood.

Mr. Banerjee.—No.

Dr. Matthai.—You buy wood separately for that?

Mr. Banerjee.—Yes and sometimes old Japanese or Swedish cases we buy.

Dr. Matthai.—In answer to question 18 you say some people pay a royalty of Rs. 12-8-0.

Mr. Banerjee.—That is the information we have got.

Dr. Matthai.—Are you referring to Messrs. Adamjee Hajee Dawood and Company?

Match wood supplies.

Mr. Banerjee.—Yes. As regards royalty we have some suggestion to make. My suggestion is not to allow the use of match timber for any other purpose except for match manufacture.

Dr. Matthai.—For what other purpose is it used?

Mr. Banerjee.—It is used for house-building.

Dr. Matthai.—What kind of wood?

Mr. Banerjee.—Letpan and Didu.

Dr. Matthai.—Do they use Sawbya and Maulettanshe?

Mr. Banerjee.—Yes. Further Government help is required to see that the match wood is not used for any purpose other than match manufacture.

President.—At present there is no evidence that the match wood is used for any other purpose.

Mr. Banerjee.—I can give you evidence.

President.—Is it used for any other purpose?

Mr. Banerjee.—It is used in house-building particularly Letpan and Didu.

Mr. Mathias.—How do you propose to give effect to your proposal? You say that Government should not allow this wood to be used for any other purpose. Will you add a section to the Penal Code?

Mr. Banerjee.—That suggestion is explained in another place and that is Government should not grant to any party other than the match manufacturers and their *bonâ fide* suppliers license for match wood. In that way it can be done.

Mr. Mathias.—No contractor should extract this wood from the forest unless the contractor produces a letter of authority from a match manufacturer?

Mr. Banerjee.—The Government may fix the royalty to a reasonable figure.

Mr. Mathias.—Is this Rs. 12-8-0 reasonable?

Mr. Banerjee.—No, it is quite unreasonable. If Government call for tenders, we small manufacturers cannot stand in competition with Messrs. Adamjee Hajee Dawood and Company or the Swedish Trust.

Mr. Mathias.—What are the Government to do?

Mr. Banerjee.—They may fix the royalty and need not call for tenders.

Mr. Mathias.—Who is going to get a block of forest if there are three or four men competing?

President.—You would petition to Government that somebody else had been favoured, wouldn't you?

Mr. Banerjee.—By calling for tenders, small manufacturers do not have the chance. If the Government want to encourage the industry in the proper

spirit, this will be the spirit shown by the Government, *i.e.*, to allow the manufacturers or their *bonâ fide* suppliers to cut as much timber as they require and not to allow individual manufacturers any reserve as they have done at present.

Mr. Mathias.—If they have no reserve, it will mean that in a very short time all the match wood will be cut out and then you will all have to go farther and farther away.

Mr. Banerjee.—For that I have suggested plantation, but plantation will take time. As the wood is cut away, plantation must be taken in hand by Government. These are the suggestions that I have to make.

President.—On the ground that the industry is one of great national importance?

Dr. Matthai.—It is really for the sake of safeguarding small manufacturers like yourself that you make these proposals.

Mr. Banerjee.—There are not many big factories. For the sake of the big factories, small factories should not be troubled.

Mr. Mathias.—Why not? Will it benefit the public?

Mr. Banerjee.—We support so many hundred of labourers.

Mr. Mathias.—Would not the larger factories employ more men?

Mr. Banerjee.—They have got better equipment. They do mostly by machinery. We do mostly by hand. Our labourers get more profit than the big factory employees.

Mr. Mathias.—In the same way as hand weaving and hand spinning would employ more labour.

Mr. Banerjee.—They do, but it is not so much remunerative.

Mr. Mathias.—At present your small factories are not remunerative, I understand.

Mr. Banerjee.—They are remunerative but not much.

Mr. Mathias.—As you are already getting a very good return on your money, why should Government relinquish revenue in order to give the owners of small factories a still bigger return? On your own admission you are at present doing very well making quite a satisfactory profit.

Mr. Banerjee.—We are not getting good return. Government should do this considering it as a national industry.

Mr. Mathias.—On your own account the national industry is doing very well.

Mr. Banerjee.—I have told you a little while ago that the factory lost very heavily. Just now it has come to a position when it can earn a profit.

President.—All the industries take some time to learn their business. You have come to a stage when you can earn a profit. So you have no ground whatsoever to induce Government to relinquish any revenue.

Mr. Banerjee.—If they don't do that, we won't be able to compete with the foreign manufacturers.

President.—At present are you not competing satisfactorily?

Mr. Banerjee.—Yes. But if the royalty is Rs. 12-8-0, the price will gradually rise more and more.

Mr. Mathias.—The actual royalty forms a small part of the cost.

Mr. Banerjee.—Yes.

Mr. Mathias.—By far the greatest item in the cost of timber is the cost of transport.

Mr. Banerjee.—Yes.

Mr. Mathias.—So that really if Government instead of charging Rs. 4 or Rs. 5 charged Rs. 3 as royalty, it would make very little difference to your factory. Your contractors are selling you at Rs. 30 to Rs. 35. Adamjee's are competing. The average is about Rs. 4 or Rs. 5. Rs. 4 or Rs. 5 out of

Rs. 35 is a small amount. Even if you knock it out completely, it would make very little difference to your cost.

Mr. Banerjee.—If Rs. 4 is charged instead of Rs. 12-8 there will be much difference.

Dr. Matthai.—You were speaking of the employment that you would give to labour by maintaining a factory like yours. You pay As. 12 a day for men and women. I suggest your rate of wages is far too low. You are sweating your labour.

Mr. Banerjee.—There is a mistake there. The man gets Rs. 1-2-0 and the woman gets As. 12.

Dr. Matthai.—All the men are salaried labour.

Mr. Banerjee.—Yes.

Dr. Matthai.—And the woman are contract labour.

Mr. Banerjee.—Yes. Some highly trained women earn Re. 1-8-0 to Rs. 2 a day.

Dr. Matthai.—Do you deal with women and children direct?

Mr. Banerjee.—Yes.

Mr. Mathias.—May I just come back to this question of royalty. I didn't quite catch what you said. If Government were to reduce the royalty so as to enable you to get your wood at Rs. 30 instead of Rs. 35, that would be a handsome reduction.

Mr. Banerjee.—Yes, 14 per cent.

Mr. Mathias.—The reduction would not amount to more than half an anna per gross at the outside.

Mr. Banerjee.—That is something.

Mr. Mathias.—It is not a very large item.

Mr. Banerjee.—No.

Dr. Matthai.—Have you got a definite proposal in your factory for the appointment of an engineer?

Mr. Banerjee.—No.

President.—Between what hours, do you work your factory?

Mr. Banerjee.—From 6 A.M. to 11 A.M. and 1 P.M. to 6 P.M.

Dr. Matthai.—You have no information whether your factory is somewhat like a small factory in Bengal or not.

Mr. Banerjee.—No.

Works Costs.

President.—Are these costs 1926 costs?

Mr. Banerjee.—No, they are average costs.

President.—What is this *ex*-godown rate?

Mr. Banerjee.—That is what it costs us at the factory.

President.—Do you get all the imported materials direct?

Mr. Banerjee.—We buy from Japan and England.

President.—You don't buy them through local agents.

Mr. Banerjee.—No.

Dr. Matthai.—Do you get most of the materials from Japan?

Mr. Banerjee.—Not from Japan but from England. Sometimes we also buy from Japan.

Dr. Matthai.—Where do you get your amorphous phosphorus?

Mr. Banerjee.—We buy it from England.

Dr. Matthai.—Is it cheaper for you to get it from an English dealer?

Mr. Banerjee.—We know a big English dealer from whom we buy. We have not made any enquiries of any Swedish manufacturer.

Central Provinces.

The Amrit Match Factory, Kota, Central Provinces.

Representation, dated 29th December 1926.

I have read copies of the Resolution of the Government of India in the Commerce Department, No. 235-T. (14), dated the 2nd October 1926, and also the Press Communiqué issued by the Secretary of the Tariff Board, dated 29th November 1926, and beg to submit my statement regarding the grant of protection to the Match Industry in India as follows:—

The match industry in India was first established about thirty years back but for nearly twenty-five years its position was very critical and by 1920 all those match factories which existed practically closed down. In March 1921, the Government of India imposed a duty of annas 12 per gross, which was raised to Re. 1-8 per gross in March 1922. These duties were imposed as a revenue measure, but naturally an import duty had also protective effect and since then match industry in India developed rapidly, and numerous match factories have been established. A number of people have also taken it up as cottage industry.

The import figures of 1920-21 can be taken as the quantity of normal consumption of matches in India per year. This was the year immediately before the one in which the duty was imposed on matches and the year in which the quantity of matches manufactured in India was the least. In 1920-21 Indian imported nearly 12,150,000 gross of matches. The total maximum quantity of matches manufactured in India in that year would be under 250,000 gross. Thus the total annual consumption of India can be taken at 124 lakhs gross. In 1925-26 India imported nearly 79 lakhs gross. From this figure I estimate that the quantity manufactured in India in 1925-26 might be about 45 lakhs gross.

This development of the match industry had its effect on Government Custom Revenue which fell from Rs. 154 lakhs in 1922-23 to Rs. 118 lakhs in 1925-26. This decrease has drawn the attention of the Government of India and is the immediate cause of reference of match industry to the Tariff Board.

I shall first consider whether the industry requires protection. It has been proved beyond doubt from the report and investigations carried on by the various match experts appointed by the Government and private agencies that the match industry in India possesses great natural advantages in the shape of abundant supply of raw materials. There is a large variety of woods growing in Indian forests which are suitable for the purpose and which are available in large quantities. It requires only a reasonable period of security and a sound forest policy to develop those resources. The power for the manufacture of matches can be generated at a very small cost as the waste wood in the manufacture of matches can be utilized as fuel. Labour in India is plentiful. The fact that India is obliged to import enormous quantities of matches is a proof that she is one of the largest markets for the consumption of matches. This is an industry in which the advantages of large scale production can be achieved, *i.e.*, the increased output would mean increased economy of production. Thus the match industry fulfils all the conditions laid down in paragraphs 97 and 98 of the report of the Indian Fiscal Commission.

If any further proof of the necessity of protecting this industry is needed it will be seen from the fact that before the year 1921 when the first instalment of import duty was levied the match industry in India was in a very bad condition and many of the match industries had closed down. It was only after the imposition of the import duty that it began to show life. Since 1922 numerous match factories have been established and in the year 1925-26, *i.e.*, after the lapse of only three years, India was able to produce 45 lakhs gross or more than 36 per cent. of its total consumption. A period of three years was very short and many of the factories were still under construction and had not started work. If the present duty is maintained I am sure before long India will be able to produce and meet the whole needs of the country and the industry will be able to face world competition.

The match industry has also got other potential value to the country. It will supply the needs of India in matches. It will give employment to about 30,000 persons directly and many more thousands indirectly engaged in allied occupations. It will also create demand for the establishment of other industries such as the production of match paper and chemicals. It will offer a market for inferior forest timbers which are at present bringing no income to the Government, but are only rotting in the forest.

I shall also like to state that some of the foreign countries like Sweden and Japan who formerly supplied the bulk of the demand of India in matches, have a very strong interest in preventing the growth of the match industry in India, for it would be very severe blow to them if Indians succeed in manufacturing matches to satisfy their own market. They, therefore, decided to get behind the Tariff wall created by the imposition of import duty as a revenue measure. They decided to start match factories in India in order to kill Indian match factories in their infancy. They have already set up match factories at Bombay, Calcutta, Colombo, Rangoon, Madras, Karachi and Assam. They have also started selling matches even below their cost price. They are producing a major portion of the matches manufactured in India, which has affected the Indian Government's Customs Revenue. We do not see any reason why the offensive against the Indian Match industry which the foreign people have already launched should be allowed to continue. In case they are allowed to succeed, it will lead not only to the total loss of the Government Customs Revenue from matches, but it will also ruin the real Indian industry, and ultimately the consumer will also suffer, because after attaining their object these foreign combinations will fix the price at such a level that they will more than recover their former expenditure. Thus it will not be in the interest of either the Government revenue, Indian Industry, or the consumer if these Foreign Combinations are allowed to exploit India. It will be a blind policy to encourage them to strangle Indian industry, when they deny equal treatment to Indians in their own country. They do not allow admission to Indians even in their factories in India. Indian match industry at present badly needs protection against these Foreign Combinations. I, therefore, urge that excise duty equal to the import duty on matches should be imposed on all factories financed wholly by foreign people and managed by foreigners, and that in the case of factories financed by mixed capital, the excise duty be in proportion to the foreign capital employed.

At the same time I shall strongly oppose the levy of excise duty on factories financed and managed entirely by Indians. In many places match factories have been started on very small scale. Some people purchase ready made splints and veneers from bigger factories and prepare ready made matches at their homes without any machines. A general excise duty will press more heavily on such small producers than on large ones. The expenses of collection will also be heavy.

A general excise duty will also raise the retail price of Indian matches and will directly affect the consumer and specially the poor class of people. At present all Indian-made matches are sold in the market at one pice per match box, and if excise duty will be imposed the price will be raised to one and half pice per match box. A general excise duty will also directly affect the output of the Indian factories and some of them will even close down. With the decrease of output in India there will be a decrease in the yield of excise revenue to the Government as well. The rules and regulations of the excise department will involve the producer in loss and hindrance of work and will press more heavily on small producers than on big factories. Thus the former will be practically ruined. On these grounds I strongly protest against a general excise duty on all Indian factories, but the imposition of excise duty on Foreign factories in India, for reasons already given, is a necessity.

The matches can be sold in retail only at the rates of two boxes for one pice, one box for one pice, or one box for one and half pice. At present no Indian or Foreign matches can be sold at the rate of two boxes for one pice because this works out below the cost price. All Indian-made matches are being sold at one match box per pice. Hence the reduction of duty on Foreign

matches cannot benefit the poor consumer in any way. It will only swell the profits of the middlemen.

Lastly I come to Government revenue. Before the year 1921-22 the Government Customs Revenue from matches was only about Rs. 16 lakhs per year. In the year 1921-22 when a duty of annas 12 per gross was levied it was 104 lakhs. In the year 1922-23 when the duty was raised to Re. 1-8 it was 154 lakhs. The total consumption of matches in India per year is 124 lakhs grosses. Now even if the whole Indian Match Industry is again killed and the whole requirements of India are met by import, a duty below Re. 1 per gross can never lead to the increase of custom duty above the present figure very much. If the duty is reduced below Re. 1 per gross the custom revenue will be reduced proportionately. In India already many people have invested their capital in match factories, and they are likely to continue to work to some extent. I, therefore, believe that custom revenue from matches cannot be raised by reducing the import duty. The maximum custom revenue from this head can only be kept up by keeping maximum rate of import duty. The loss of revenue due to the increase of Indian match industry will be partly compensated from the increased income to the Government from other sources such as increase of forest revenue, Income-tax, and increased custom revenue on chemicals, papers, etc., imported for the manufacture of matches. As one of the methods for increasing Government Revenue we should suggest the imposition of high custom duty on wood imported for the manufacture of matches. This will encourage the use of wood from Indian forests, in place of foreign wood, and will lead to the increased Government forest income.

The Lakshmi Match Works, Bilaspur, Central Provinces.

Representation, dated 30th December 1926.

With reference to your Press Communiqué, dated 29th November, 1926, regarding the protection of the Match Industry, we beg to submit our views on the subject as follows:—

That the three conditions laid down in paragraph 97 of the Indian Fiscal Commission report are satisfied and that the industry should be protected.

The three conditions laid down in paragraph 97 of the Report of the Indian Fiscal Commission relating to industries claiming protection are that:—

(1) The industry must be one possessing natural advantages such as—

(*a*) abundant supply of raw material,

(*b*) cheap power,

(*c*) sufficient supply of labour,

(*d*) large home market.

(2) The industry must be one which without the help of protection either is not likely to develop at all or is not likely to develop so rapidly as is desirable in the interests of the country.

(3) The industry must be one which will eventually be able to face world competition without protection.

(1) Applying these tests to the Match Industry we find with respect to No. (1), "natural advantages."

(*a*) That in Bengal there are very large supplies of suitable wood in Sunderbans. In Assam there is also an ample supply of suitable wood. In Bihar and Orissa according to the report of the Government Expert there is sufficient suitable wood, and a Government Model Factory has been started in Patna. The United Provinces, we know, abound in the supply of Simul wood. There are large quantities of Bluepine available in the Punjab and we know that even if the timber is secured at market prices it is

possible for the industry to develop. Poplar wood is also to be had in the Punjab and though the results with this timber hitherto have not been very satisfactory, yet with the improvement of the growth of these trees it may be expected to prove a very useful raw material obtainable at comparatively more economic rates. Mango wood is also to be had in the Punjab and its utility as a match wood may be said to have added to its importance in this province. In Madras Forests plenty of suitable match timber is available. In Kashmir there is a plentiful supply of suitable Poplar, Spruce, and Willow wood; and recent experiments and examination have shown that in spite of the disadvantages of distance to rail head, it could be possible to work economically with these timbers.

(*b*) The question of cheapness of power will vary in different provinces, but it may be observed generally that in the existing conditions the cost of power does not handicap the manufacture of matches. In Western India, Tatas have launched upon a large Electrification Scheme and are supplying power at very cheap rates. In the Punjab the Mendi Hydro-Electric Scheme guarantees power at cheap rates, while in Kashmir, electricity for commercial purposes may be had at under 6 pies per unit. Thus with the electrification which is in progress in different parts of the country, power will be available at cheap rates. Moreover, India is a large coal producing country and Burma abounds in Petroleum.

(*c*) As regards the supply of labour, there is no doubt that there is plenty of it in all provinces of India and that the same may be had at low rates. In fact the earning of an Indian is the lowest in the World. Our experience shows that they are quick at picking up technical knowledge. It is evident that the cost on labour forms a very encouraging factor for the Indian Match Industry when compared with the labour costs in other countries, and with the rise of efficiency it will, after a time, form an important factor in enabling Indian Matches to withstand world competition.

(*d*) As to market, it is well known that there is a large home market which is at present in the hands of foreign capitalist manufacturers.

(2) It is abundantly clear from a study of the history of the industrial development of India for the past quarter of a century or so that in spite of various attempts made from time to time the match industry has not been able to develop at all, and it has not been possible for this industry until lately, when the Government of India levied an import duty on foreign manufactured matches imported in India, that the indigenous Indian enterpriser received an appreciable measure of encouragement to attempt developing the industry. The reason for this industry not being developed in spite of the fact that India possesses various kinds of timber suited for match manufacture is also apparent. Foreign countries have been masters of this industry and the trade connected therewith for a long time. They possess very large organization, and facilities both natural and commercial. Their financial resources make it possible for them, after their flourishing existence for scores of years, to reduce their working cost and profits to a minimum which though bringing them only a small return on their capital, ensure to them the control over the world market in which India furnishes a very large field. They are in a position to kill a new venture by even foregoing profits for a time or even drawing on their reserve and losing a little. Indian enterpriser in this industry has therefore naturally to combat against very powerful competitors; and it is therefore evident that unless he has some kind of support and protection from Government in its early stages of development, he has little or no chance of being fit to stand up to this keen competition.

The Industry is one which without the help of protection is not likely to develop at all.

It is an admitted fact that the match industry in India has been stimulated by the Re. 1-8 per gross duty; and that prior to this although various independent ventures were made, they did not meet with any success, and the few that survived existed through sheer perseverance. It is instructive to note that up till 1921 although the match industry had been in existence for over a quarter of a century the manufacture from Indian wood hardly reached 1,500 gross per day; and that too of a very inferior quality as compared, to the imported matches. Subsequent to the imposition of the duty, the manufacture from Indian wood received a steady impetus, and in 1924-25 the figure of production of matches in India rose to about 5,000 gross per day. Considering that there are certain factories under construction, while many are under contemplation, the industry may be fairly claimed to be a progressive one with the help of the duty, which, although it was given effect to only as a revenue measure, has acted simultaneously as a protective measure for the Indian match industry. It is hardly necessary in the peculiar circumstances of the match industry to prove that without the help of protection the industry is not likely to develop. The unsuccessful ventures prior to the levy of the duty and the successful and progressive work subsequent to it prove most conclusively that without the requisite protection the indigenous match industry in India cannot develop and must if left alone, die in a short time.

Appreciable as the effects of the duty were in protecting the growth of the Indian Match Industry, the delay on the part of Government in imposing a special duty on imported match *logs*, in spite of the repeated representations of the indigenous match manufacturers, has not only caused a fall in Government revenue, but has adversely affected the indigenous match manufacture. The duty therefore although it has acted as a protective measure, has not met the aim and object for its imposition. It has been evaded by the foreign manufacturers by employing clever devices; and consequently the Indian manufacturers who took up the enterprise in right earnest, laying their faith in the protection afforded by the levy of this duty, have had to encounter extreme difficulty and to meet a severe handicap in the actual working of their manufactures.

(3) To enable the indigenous match manufacturer to ultimately stand foreign competition he must effectively

The industry promises to be one which should be able eventually to face world competition without protection.

(*a*) reduce the cost of production, and

(*b*) enable his products to compare favourably with foreign imports.

Considering that the first impetus received by the match industry in India was given only in 1922, a good bit of the last four years has gone in preliminary enquiries, erection of factories, and preliminary arrangements incidental to manufacture and marketing. The cost of Indigenous manufacture is therefore still comparatively high and the finished product less attractive to the market. It is premature to gauge the extent to which cost of manufacture can be reduced and the quality of the finished product improved, though we cannot doubt that with economic and careful work results will be appreciable. It will be instructive to study the handicaps which affect the cost of matches manufactured in India from Indian timbers and to show the prospects that may be anticipated.

(*a*) Chemicals and paper are at present very largely imported owing to the fact that India is not yet producing the paper nor the chemicals for the manufacture of matches. The chemical industry in India has a future before it and we may reasonably hope that the increasing demands of the match industry during its course of proper development will afford an impetus to the manufacture of superior chemicals in India. With the various attempts that are being made to manufacture paper in India on extensive and economic lines, the match industry may expect a certain economy in this item. The development of chemical industries and paper to an extent as to materially help the match

industry is, however, a question of time; but we may assume that these will in due course form material factors in determining a competitive cost of Indian matches for world competition.

(*b*) Technical knowledge has to be obtained in the initial stages, at a considerable cost, but with the development of the industry in the country and with training being received by Indians, the expert technical knowledge will be obtainable at a much lower cost. With the experience, which is being gained of Indian conditions as applied to this industry, there is much that can be done to improve and organize the working with a view to economy and efficiency.

(*c*) Labour of which India has more than plentiful, is much cheaper than that available in other countries producing matches. Trained labour is of course essential for efficient and economic working. It is encouraging to note that Indian intelligence receives that training quite quickly.

(*d*) The question of inland tariff for raw material and finished products is one which deserves a careful and sympathetic consideration of the Government of India, and is one which is worthy of being taken up by Government in the interests of the Indian industries. Considering that the development of the match industry in the country, apart from transport of finished products, ensures to railways an additional revenue on account of the transportation of all raw materials incidental to manufacture; the railways by allowing concession freights to encourage the industry, would be helping their own revenue. There could be a material reduction of cost as soon as concession freights can be had, and a decided encouragement to the manufacturer dealing with Indian timber.

(*e*) Timber which is of primary importance is abundant in India, and there is plenty that can be suitably employed for match manufacture while most of it at present remains unutilized for want of transport facilities. This is a severe handicap under which the Indian Match enterpriser is labouring at present.

It will be observed that although the question of obtaining timber at present at prices economic enough to withstand world competition is a difficult one, yet the difficulty is not such as to be unsurmountable. There is, however, another important feature connected with the cost of this raw material required for the manufacture of matches. In India the match enterpriser has to purchase it mostly from Government forests and in small quantities from third parties, and in both cases the suppliers of raw material have no direct interest in the development of the industry and consequently no serious effort is made to reduce the cost to a possible minimum.

We believe it should be practicable within a reasonable time to co-ordinate the interests of Government and other timber suppliers, with those of the match manufacture to an extent as will ensure—

(*a*) the improvement of the growth of suitable species;
(*b*) the manipulation of supplies to give timber in its most suitable condition;
(*c*) the reduction of extraction costs to a possible minimum.

In view of considerations such as these it will be clear that although the match industry in India has every prospect of being able in course of time to face world competition, it is premature at present to calculate with any precision the time this would take. Much depends upon the progress that can be made in the next five years.

From a study of the figures given below :—

Year.	Government Revenue in lakhs.	Matches imported in grosses.	Matches in terms of daily production grosses.	Value in rupees.	Splints. lbs.	Value rupees.	Veneer. lbs.	Value rupees.
1921-22	103	13,680,801	45,602	2,03,80,469	...	...	...	...
1922-23	154	11,285,740	37,619	1,61,80,658	...	...	...	...
1923-24	138	11,243,745	37,479	1,45,91,813	...	...	...	...
1924-25 . . .	126	7,264,785	24,215	88,88,611	967,305	1,95,413	2,780,063	10,08,935
1925-26	118	7,928,522	26,428	93,45,036	25,521	4,809	1,128,751	3,86,910

We observe that since the duty of Re. 1-8 per gross was levied on matches, the import of finished matches began to fall. The decline of revenue was noticed in the financial year 1923-24 and to counterbalance the decreased revenue the import of splints and veneers in place of the finished matches that accounted for the drop was also taxed. In the year 1924-25 there was a large import of splints and veneers. But in 1925-26 a decided fall in the import of splints and veneers was noticeable which undoubtedly indicated an extensive import of match logs.

It is apparent that the first attempt to avoid the import duty consisted in replacing finished matches with splints and veneer, and when the latter were also included in the schedule of special duty, a fresh device was found to evade the duty by the importation of match logs, which has increased by leaps and bounds in the two years 1924-25 and 1925-26. It would be in keeping with the policy adopted by the Government of India in 1924, if they were to impose a special duty on match logs also to safeguard the interests of their revenue.

The fall in Government revenue may be attributed to—

(1) the growth of the match industry based on Indian timber,

(2) evasion of the duty by importation of match logs.

The former as a matter of fact, if at all, can account only for a very small portion of the decrease, while the latter is mainly responsible. If a special duty had been levied as was suggested at the time by the indigenous manufacturers Government would have been saved, we venture to observe, the loss of revenue. We therefore strongly urge the expediency of taxing imported match logs further, in addition to the existing *ad valorem* duty.

Another reason for the fall in Revenue is the suspected abuse of the right of transhipment of Native States. Matches are being imported to some of the Native States through their ports in a much larger quantity than the actual demand of those States and the excess quantities are sent to towns in British Territory a long way off from those States avoiding the custom duty legitimately due to the British Government.

(C)

The vested interests created as a result of this duty.

(*a*) Considerable capital has been sunk in the match industry during the last five years or so. We are alive to the fact that large investments have been made in this direction by the Swedish American Trust who control important match factories in different parts of the world and are therefore keenly interested in importing foreign matches into India. They are essentially out in India with a view to avoid the Re. 1-8 duty and to exploit the country to their own advantage. We cannot for a moment conceive that the Government of India will tolerate the idea of exploitation of the country by the foreigners who are anxious in their own interests to kill the prospects of an indigenous Indian industry and are capable of bearing substantial temporary loss to ensure their ultimate gain. It would be a great catastrophy both for the ultimate revenue to Government and for the industrial benefits that could accrue to the people of India. We do not therefore consider that the investments contracted in India by foreign enterprisers, as opposed to the Indian interests, deserve any protective consideration whatsoever. At their best, the foreign investments were a gamble undertaken to ensure the ruination of India's indigenous interests and should therefore be treated as such.

(*b*) There are however certain Indian firms and individuals who have hitherto developed a business with the use of foreign timber. We however consider that every inducement and facility should be offered to such Indian firms and individuals to employ their enterprise in the interests of Indian timber by which measure a substantial impetus will be afforded to the indigenous industry and a consequential gain to the Forest and Railway Revenue, and to a large amount of labour that could be employed on works preceding the actual manufacture in a factory.

(*c*) In addition to the factories already in existence and actually working with the Indian timber there are many fresh ventures either under construction, or contemplation. We have no doubt whatsoever that in addition to large investments actually made on these constructions considerable sums of money have been spent by Indian enterprisers on preliminary investigations and enquiries.

(*d*) There has been a decided gain to the Indian Railway owing to the establishment of match factories using Indian wood. Factories based on imported wood, to thrive, must be located on or near seaports, and hence no freight on carriage of Match Timber, Chemicals, Paper, Fuel, and other imported stores, can normally accrue to the Railways from them. Factories using Indian timber must invariably be situated inland, and thus to ensure the delivery of various materials incidental to manufacture a decided Revenue accrues to the railway. With the growth of factories using indigenous timber the increased railway revenue will become an appreciable vested interest.

(*e*) With the increase in the requirements of timber there is bound to be an increase in the labour employed on its extraction, and with the propagation of suitable species of match wood and their extraction, the increased employment of labour will be a material factor for consideration. Every endeavour is being made in various quarters to place on the market at economic rates timbers which are suitable for match manufacture. We understand that there are in Northern India extensive plantations of suitable timbers in hand which in the course of 10 to 15 years would, it is hoped, be able to furnish timber of very superior quality to manufacture about 10,000 gross of matches a day. Undertakings of this kind will doubtless follow in quick succession in other provinces if only the Indian enterpriser has the guarantee of protection to see him successfully through the period of experiment and development.

(*f*) With the fixation of the Re. 1-8 duty in the normal course there should have been a tendency for the market rates to have risen. It is the Indian manufacturer that has ensured a further decrease in the price and has ensured to the consumer the rate of 3 pies per box. He has thus materially safeguarded the interests of the consumer, which can by no means be considered to be a negligible factor in the interests of the country.

(D)

Whether the loss in revenue can be made up by any other appropriate form of taxation of the industry.

We have discussed in a previous paragraph the difficulty under which the present Indian manufacturer is labouring in selling his goods against those imported or manufactured with imported logs. It will not be out of place to mention here that the actual fall of revenue due to the import duty is not so high as it appears to be. Match manufacture in India has increased the import of Chemicals, Papers, and Wood, etc., and has increased the consumption of wood from Government forests. The increased revenue on these heads considered along with its apparent fall on matches would show the figure much less. We do not consider it would in the circumstances be at all desirable or justifiable, at such a stage, to contemplate the taxation of the indigenous match industry with a view to make up the actual shortage of Government revenue. If our suggestions summarized at the close are agreed to, the Government will not only be safeguarding its own revenue, but very largely protecting the interests of the consumer. In the circumstances we consider that the question of taxing the indigenous industry does not arise.

It is an acknowledged fact that matches are more or less an indispensible necessity of life, and the match industry is of great economic importance, if India is to be self-contained. We are aware that with the expansion of the indigenous industry, there can be no danger of an undue rise in prices, as competitive conditions within the country will contribute to regulate the minimum price.

In addition to this, there is the important question of India being developed to be self-contained and self-dependent within the Empire. Want for

this was prominently felt during the great war, and if on any grounds Great Britain is ever hereafter drawn into war with the match producing countries or there is any disturbance in the waters separating India from the foreign countries manufacturing matches, the condition of India would be pitiable, unless she has developed her indigenous resources and is self-contained. We believe it should be accepted as a principle that where the questions of the economic development of the internal resources of the Empire are concerned, and the conditions for the development of an industry are not unfavourable, the industry should as far as possible be adequately protected. There can be no gainsaying the fact that the indigenous match industry is decidedly one which comes under this category, and consequently any proposal for taxing it would be most detrimental to the interests of the country and the Empire.

The conclusions arrived at may be summed up thus:—

1. That the three conditions laid down in paragraph 97 of the Indian Fiscal Commission Report are satisfied in regard to the match industry and that the industry should be protected.
2. That the custom duty imposed at present on imported, finished matches, splints, and veneers, should be converted into a protective duty on the same scale.
3. That a suitable protective duty should be imposed on imported match logs.
4. That a suitable excise duty of not less than 8 annas per gross should be imposed on the production of factories of which three-fourths of the capital and Directors are not Indian.
5. That any fresh tax levied on the manufacturers using indigenous timber would be ruinous in the interests of the country.
6. That suitable measures should be adopted for increased facilities for Railway and Steamer transport of Indian match wood throughout the country.
7. That the import of foreign matches through Native States by transhipment methods requires very careful examination.

सत्यमेव जयते

Madras.

The Malabar Match Manufacturing Company, Limited, Cochin, Madras Presidency.

(1) *Representation, dated 16th December 1926.*

We have received from you a printed circular asking for objections to a possible decrease of import duty on matches, and would refer you to our letter of the 2nd instant with which we enclosed a copy of our letter of the 29th October last to the Secretary, Finance Department, Central Board of Revenue, Delhi.

In the above letter we emphasised two points which have an important bearing on the subject, and we cannot do more than lodge our protest against the possibility mentioned in our first paragraph.

Opinion seems to be generally in favour of the duty being made a protective one instead of it continuing to appear in the ordinary Revenue Schedule, but this is purely a matter for the Government to decide. It is obvious, however, that to make any reduction in the existing duty would be tantamount to an attempt to destroy a home industry which has been fostered and has grown under the protection of the duty at present in force.

It is certain that indigenous timbers are providing a good substitute for timbers grown in countries where match making is one of the principal industries, and in our own case we have gone to considerable expense and trouble in experimental work to make our own locally grown timbers of more use to us. The Company has been in existence for three years, and it is only now that we can see a chance of success. Were the duty on imported matches to be reduced, so that competition from Sweden and elsewhere became more dangerous than it is at present, it would merely mean that the success which we anticipate would not materialise, and shareholders would be faced with a heavy loss instead of a reasonable profit on their investment—a possibility which we naturally wish to do our utmost to avoid.

As our own situation must approximate that of most other Indian Match Manufacturing Companies, it is reasonable to assume that legislation which would result in our factory ceasing operations would have a fatal effect on the Indian Match industry in general.

---

(2) *Letter, dated 18th December 1926.*

Referring to the Press Communiqué issued on the 29th ultimo under the above title, we now enclose six spare copies of the two letters we have already written on the subject of the possibility of revision of the import duty on matches.

We are endeavouring to procure a copy of the Report of the Indian Fiscal Commission referred to in the abovementioned communiqué, and if necessary on receipt of the same, we will address you further.

Enclosure I.

Cochin, 29th October 1926.

The Secretary,
Finance Department,
Central Board of Revenue,
Delhi.

SIR,

Possibility of revising Import Duty on Matches.

We refer you to the statement recently published to the effect that the question of import duty on matches has been referred to the Tariff Board for their consideration and report.

The chief reason for instituting this enquiry appears to be a decrease in revenue since the duty was fixed at the present rate and judging by press reports the opinion is held that this reduction in revenue is entirely due to a reduction in the quantity of matches, splints and veneers imported.

It is by no means certain that this is the case, for it is a fact that since the duty was raised, Foreign Exporters have increased the size of the box exported and increased the number of matches per box up to the limit prescribed by the Customs Schedule. It is probable that this process has been taking place gradually during the past three years and its effect would naturally be a reduction in the number of boxes of matches consumed.

A similar movement has taken place in the splint, veneer or timber imported, in that Indian manufacturers, or foreign companies with factories in India using imported material, have reduced the size of box and match produced, and thus reduced the incidence of the duty.

We bring the above two points to your notice as they have an important bearing on the subject and they present an aspect of the situation which this company, as representing vested interests in the Indian Match Industry using indigenous timbers, does not wish to be overlooked.

We have the honour to be,
Sir,
Your most obedient servants,
THE MALABAR MATCH
MANUFACTURING CO., LTD.

Enclosure II.

Cochin, 16th December 1926.

The Secretary to the Tariff Board,
Calcutta.

SIR,

We have received from you a printed circular making for objections to a possible decrease of Import Duty on Matches, and would refer you to our letter of the 2nd instant with which we enclosed a copy of our letter of the 29th October last, to the Secretary, Finance Department, Central Board of Revenue, Delhi.

In the above letter we emphasised two points which have an important bearing on the subject, and we cannot do more than lodge our protest against the possibility mentioned in our first paragraph.

Opinion seems to be generally in favour of the Duty being made a protective one instead of it continuing to appear in the ordinary Revenue Schedule, but this is purely a matter for the Government to decide. It is obvious, however, that to make any reduction in the existing Duty would be tantamount to an attempt to destroy a home industry which has been fostered and has grown under the protection of the Duty at present in force.

It is certain that indigenous timbers are providing a good substitute for timbers grown in countries where match-making is one of the principal industries, and in our own case we have gone to considerable expense and trouble in experimental work to make our own locally grown timbers of more use to us. The Company has been in existence for three years, and it is only now that we can see a chance of success. Were the Duty on imported matches to be reduced so that competition from Sweden and elsewhere became more dangerous than it is at present, it would merely mean that the success which we anticipate would not materialise, and shareholders would be faced with a heavy loss instead of a reasonable profit on their investment—a possibility which we naturally wish to do our utmost to avoid.

As our own situation must approximate that of most other Indian Match Manufacturing Companies, it is reasonable to assume that legislation which

would result in our factory ceasing operations would have a fatal effect on the Indian Match Industry in general.

We have the honour to be,
Sir,
Your most obedient servants,
THE MALABAR MATCH
MANUFACTURING CO., LTD.

The Malabar Match Works, Palghat, Madras Presidency.

Representation, dated the 23rd December 1926.

We the above match manufacturers beg to bring the following few lines to your kind consideration.

We have seen the advertisements given in the newspaper both by the Government of India and by the Tariff Board about the protection to the above industry. No doubt the first part (beginning) gives us pleasure to note, while the points shown on conclusion are contrary.

Regarding downfall in Revenue.

We surely can say, that the supposed downfall in Revenue is not due to this industry. But it is due to the reduction in import duty on salt and other several things. Besides that various other industires have sprung up in India after the conclusion of war. As far as this industry is concerned it is needless to state that a portion of import duty is levied by the importation of chemicals, wood and paper and the like which are used for the above industry.

In conclusion when we try our level best to get freedom and free liberty in these days we request you to conclude this matter favourably to protect us from the difficulties.

Under the circumstances above mentioned what all required is that the present import duty should be retained as a protective one.

And we give you another suggestion *i.e.*, a decent duty can be levied on big industries which produce as outputs of 50 gross of matches daily. And this thing will not in any case be difficult to them or neither affect them.

Further we think it will be better to postpone the matter for at least one year to come. And we also hope that we will receive a favourable reply from you at your earliest convenience. Further it is a great sin if any hindrance will happen for cottage industry.

Duty.

We beg to state that the present import duty levied on the above is a protective one; and so it is impossible to do this industry without the present duty in the whole of India itself. Taking into consideration the above fact itself is a great protection, we have begun this industry. And so if any changes were to be made in the same, now it is sure and certain that the above industry will be ruined once for all. In India when there is not a proper industry in these days owing to the beginning of the various factories in the above industry not only millions of people live upon the same but also young boys who are idling away their time are easily brought forward to a prosperous condition. This industry will naturally induce the owners to conduct several other similar industries also.

Thanking you in anticipation.

The New Madras Match Factory, Madras.

Representation, dated 23rd December 1926.

In reply to yours of the 7th instant, bearing No. 3148 (Development Department), I have the pleasure to submit to you the following:—

It is some years since the Government of India has been looking forward to develop industries in India, so much so large amounts of moneys have been spent by her only for the development of this Art. And since the time of the increment in duty on imported matches "Match Industry" in India has found its way here, so that now India boasts of producing about 20 per cent. of the stuff consumed here. The progress no doubt is slow, but it is steady and sure increasing provided the present Revenue duty is transformed into a permanent protective one. If there be change, *i.e.*, reduction in the duty even to a slight extent, no doubt it will greatly affect the industry and will retard it and eventually annihilate it. Annihilation, of course, our benign Government hates.

The slow progress has been owing to lack of capitalisation and imperfect education in this line. These two drawbacks are being made good; capitalists are coming forward, importation of experts does eventually prove beneficial to India. India is trodding towards perfection. Experts in India are as good though not better as foreign experts

In view of the present invested interests in this industry, *i.e.*, the expenditure made by the Indians, there is every necessity of retaining the full Revenue duty as protective. Even the very name of any reduction will break the back of the enterprising classes, who with difficulty have so far been in fact successful.

The Customs Revenue, which will no doubt decrease if protective duty is made permanent, can be made good to a great extent from the duty derived from raw matrials and such as and more specially the future improvement of Indian forests, paper, chemicals, machinery, all of which will naturally increase in proportion as industry in India drives out foreign stuff. Again there are many other Revenues for the Government about which the Government itself is better aware of, to make good the deficiency in income of the Customs, if any.

Apart from these the unemployment question may be pushed out to some extent by means of the Government taking in people in Forest Department to look to the wood problem and by their employment in factories which are to be started.

In my opinion, therefore, I shall recommend protection tariff.

The South Indian Match Factory, Limited, Madras.

Representation, dated 24th December 1926.

With reference to paragraphs 3 and 4 of the Press Communiqué, dated 29th November 1926, on the Match Industry in India, I have the honour to submit the following representations of the South Indian Match Factory, Limited, Madras, which desires to claim protection for the industry and bases its claim on the following grounds:—

(1) This Company's factory was started to meet the local demand for matches and is well-equipped. It is located in the midst of Travancore forests which abound with plentiful supply of suitable timbers and firewood required for the industry. There is also a sufficient supply of labour and it is too well-known that there is a large home market for matches. The factory is capable of producing 700 gross a day and when it develops sufficiently the output can be still further increased.

(2) The industry is a nascent one and requires the help of protection without which it cannot develop to any satisfactory extent; particularly so, owing to the fact that Sweden, which has practically the sole monopoly of Match Trade in India, is upset by the indigenous enterprise in this direction and has already launched an offensive against the Indian Match Industry on a large scale, by creating a Trust in India and starting factories in various centres in India. The object of the Trust is to kill the existing match factories in India in order to attain their real aim which is to govern the world's match trade. To this end, a factory has already been started near Bombay and another in Calcutta and both these factories are already working and an extensive underselling of Indian made matches has already begun. In addition to this, the construction of factories at Karachi and Madras is shortly going to be taken in hand. Moreover, several factories in Colombo and Rangoon have been bought by the Trust which has also opened a Match Manufacturing Supply Company in Bombay. It is therefore highly necessary that the import duty on matches should be maintained at its present level or even raised and all Trusts of foreign capitalists should be made to pay excise on their products so as to make up for the loss of revenue to the Government. In fact, a duty should also be imposed on import of foreign wood in logs to help the indigenous industry. Otherwise, there is no doubt that the Trust will be enabled to monopolise India's match trade and the consumer will have to suffer. Because, after attaining their aim in killing indigenous industries they will fix the prices at such a level that they will more than recover their former loss. In this connection, a copy of " Industrial and Trade Review for Asia " is enclosed for information.

(3) The match industry is one which will eventually be able to face competition without protection; but it will take some time and during that time protection is absolutely inevitable.

(4) In addition to the import duty the grant of a bounty will accelerate the development.

Enclosure.

INDUSTRIAL

AND

TRADE REVIEW FOR ASIA.

For promoting Asia's industrial development and foreign trade relations, 1925.
Berlin, October (First Half). No. 19.

THE FOREIGN DANGER TO INDIA'S MATCH INDUSTRY.

The time is rapidly ceasing to be when India was solely a supplier of raw materials to foreign countries and buyer of manufactured articles. The country is being industrialised, and foreign capitalists, whose only Fatherland is the land which provides the best opportunities for lucrative investment, are not slow in casting their greedy eyes upon the unexplored resources and cheap labour of the Indian continent. The problem has now become extremely acute and Indian opinion is rightly concerned about the alarming growth of foreign private and joint stock companies which not only cause a large drain of India's wealth in the form of interest and dividends, but, what is far more serious, tend to transfer the key-industries of India into foreign hands as well as to prevent the growth or prosperity of a number of industries in which India could be self-dependent and self-supporting.

To this latter category belongs the match industry. It was long believed that the Indian match industry was doomed to failure for want of suitable timbers. But during the last few years it has been clearly proved that this is a fiction. India is one of the largest markets in the world for the con-

sumption of matches and she is obliged to import enormous quantities from foreign countries. The most important of those is Sweden; the import from Austria, Hungary, Japan, Norway, Czechoslovakia or Finland is inconsiderable in comparison with Sweden. That country has, therefore, a very strong interest in preventing the growth of the match industry in India, for it would be a severe blow to Sweden's largest export trade if India should succeed in manufacturing matches on a sufficiently large scale to satisfy the demands of the Indian market.

The Swedes have, therefore, decided to start their own factories in India—a fact that has already aroused considerable indignation in national India circles. But the exact manœuvres of the Swedes still seem to be not clearly understood by the large majority of Indians and it will, therefore, be very instructive to them to read the following facts that have been placed at our disposal by a German Match Expert who has recently returned from India after many years' stay there, who has set up match factories for a number of Indian Capitalists and who is sincerely and enthusiastically interested in the development of the match industry in India. He says: "It is well-known that India is to-day the best customer for Swedish matches. This is solely due to India being unable to produce her own matches. And this again was and is still due to lack of enterprise and difficulties in obtaining timbers suitable for match manufacture. Lately, however, things have considerably improved. Since over two years the Indian match manufacturer has been protected by an import duty of Re. 1-8 per gross of boxes of matches. As the cost price of good matches made in India is somewhat below Re. 1-8 per gross, it is obvious that a good return for the capital outlay is assured and there is, no doubt, a fair opening for the match industry in India. In fact, some of the Indian business men are at present very keen on starting match factories in India, and lately some well-equipped factories have been started. It is almost certain that, in course of time, India will be able to produce her own matches and then the import of foreign matches, chiefly of Swedish make, will stop automatically. Sweden, or to be quite correct, the Swedish-American Match Combine, is watching this development with keen interest. They have already launched an offensive against the Indian Match Industry on a large scale. They did this in such a cunning way that most of the Indians have been taken unawares. It is worth while to go a little further into the practice of the said combine. Above all one thing is certain, the real aim of the said Match Trust is to monopolise the world's match trade. The means employed by the Trust to attain this end are numerous. According to circumstances they employ fair or foul means. To be just it must be admitted that they employ fair means first. If unsuccessful, they will use foul means unscrupulously. It is impossible within the available space in this paper to depict the various ways and means employed by the Trust. Generally, the practice employed is as follows. After having undersold the matches manufactured in the country for a considerable time (the English call this dumping), they approach the factories with a proposal to buy the whole business. As a rule, the price offered is a decent one. Of course, the owner will be bound over not to do any more business in matches. Very often, after having bought the factory, it will be closed down. Then, of course, the import of matches must commence again. Quite a number of match factories in Europe and elsewhere have come under the influence of the Trust and a great number have been bought by the Trust."

What means is the Trust now employing in India? Before all it must be perfectly understood that the Trust is out for killing the existing match factories in India; in order to attain their real aim, *i.e.*, to govern the world's Match Trade. To attain this end the Trust has started a factory in Ambarnath near Bombay and another one in Calcutta. Both these factories are already working and an extensive underselling of Indian made matches has already begun. In addition, factories at Karachi and Madras are in course of construction. Moreover, two existing factories, one in Colombo and the other in Rangoon, have been bought by the Trust. Further, some of the important factories in India have received very favourable offers, fortunately so far without success. They also have opened the Match Manufacturing

Supply Company in Bombay. This Company, besides supplying paper and chemicals for match manufacture (mostly of Swedish make) is acting as Agent for Messrs. Gerh. Arehn, Stockholm. The last named firm is supplying match making machinery but lost its independence some time ago, or in other words, it belongs to the Trust. The said supply Company comes as a wolf in sheep's clothing to the Indian business man. They offer materials cheaper than any Continental or English firm. Indeed, this Company undertakes to equip factories almost for nothing. They offer to take payment after years: Why? Any man with a reasonable amount of business brains will feel sure that there must be a " fly in the ointment " somewhere, or as the Indians say " Kuchh dal men kala hai." And so there is: If, for some reason or other, the payment is not forthcoming after the agreed period, the Trust will take over this factory without much ado and thereby strengthen its position in India more and more. Most of the readers of this paper will say there will be comparatively few Indians who will go into this trap. This is not so. It may be mentioned here that lately the Government of Bihar and Orissa has been trapped in the aforesaid way. There in Patna, the Swedish-American Match Combine is erecting a small demonstration factory on behalf of the Government. By allowing that, the Government of Bihar and Orissa has assisted the Swedish Match Trust and has acted against the interests of the country and people. It must be mentioned here, however, that the Government did not know at the time that the Match Manufacturing Supply Company and the Swedish-American Match Combine are identical. Unfortunately, only a few Indians are acquainted with this fact.

During the last year, a few big factories have been started near Bombay by enterprising Indians. These factories import suitable wood in logs from Siberia. Their matches are finding a ready sale. The Swedish factories in Ambarnath and Calcutta import wood in logs also. There is no import duty on wood in logs. Now the Trust is feeling the competition of these factories and in order to get rid of them they urged Government to put a high duty on wood in logs also. They did not do this in a straightforward way but got behind some officials and other influential people. Fortunately the Bombay business men are wide-awake and the attempt of the Trust failed. If they had succeeded, the Indian factories besides the Swedish factory near Bombay would have had to close down. As the above mentioned Indian factories are considerably larger than the Swedish factory, this would only mean that the Trust is getting nearer its real aim, *i.e.*, to govern the world's match trade. The last mentioned move of the Trust was a very clever one and quite a number of Indians were unable to see the real object of the Trust. The Trust is keeping up its propaganda regardless of expenses.

It will be of interest to mention a few items about the Trust. The capital of the Combine is 180 million Swedish Kronan (about 15 crores of rupees). On the Board of Directors are names like Percy A. Rockefeller, Samuel F. Pryor, H. Havenmeyer, John McHugh of the Mechanical-Metal-National Bank, F. L. Higginson of the Bank Lee Higginson & Co., New York. Chairman is the Swede, Ivar Kreuger.

There is no doubt that, if the Trust is able to monopolise the World's Match Trade, the consumer will have to suffer. Because after attaining their aim, they will fix the prices at such a level that they will more than recover their former expenditure. Moreover, it is of no interest to Indians if their industries are organised solely, with foreign capital.

Let us hope that India will be among the countries where the Trust is unable to secure a footing.

Now this same Mr. Kreuger, the Director of the Swedish Match Company, has been clever enough to publish a review of the world's match industry with the special object of throwing sand into the eyes of the Indian people. After showing how Sweden has been able to overcome the difficulties caused by the War and to compete successfully in the world's market, he says:

" It is easy to understand, however, that if the Swedish match industry is to retain its leading position, it cannot rely only on the Swedish factories,

and for this reason the Swedish Match Company decided a few years ago to go in for a programme of taking an interest in match factories abroad on a very large scale. We have now in operation two newly-built factories in India, one in Bombay and one in Calcutta, and we are building two new ones, one in Karachi and one in Madras, and we have acquired two established match factories in Colombo and Rangoon. It is not our intention to try to monopolise the Indian match trade, and we have decided to seek the co-operation of prominent Indians in our Indian undertakings."

We should like these utterances of the Swedish Director to be read in the light of the above statement of the German expert. It is highly important for Indians to know all the facts regarding the methods of the Swedish Match Company, as well as their innocent-looking ramifications abroad. It should be known to them that the Norden Export Company of Sweden and the Nord-deutsche Maschinen-Vertriebs Gesellschaft in Berlin are both alleged to have very intimate connections with the Swedish Trust, and the main object of these so-called suppliers of match-making machinery is to monopolise India's match trade and make Indian factories impossible, except in Swedish hands. We warn all Indians against purchases of machinery on easy terms from suspicious firms, and we advise them to have dealings only with well-established German manufacturers of match-making machinery about whom there can be no doubt whatsoever. We shall be happy to supply all intending manufacturers with the names of all the reliable machine firms in Europe and we sincerely trust that Indian capitalists will organise themselves to establish and control match production in India and make it impossible for the Swedish Trust to obtain a footing there.

Swan Match Works, Madras Presidency.

Representation, dated 29th December 1926.

With reference to your Press Communiqué in connection with the Match Industry in India I beg to offer the following observations:—

1. If Indian Government wants to safeguard the Match Factories of India, it will be highly advantageous if the tax on the imported matches is increased.

2. If protection is granted to this industry in India it will be helpful only to the foreign factories in India and also to great Indian Capitalists. Under these circumstances the Cottage Industries will not in any way be benefited, but on the other hand will experience a great loss as a result of competition with bigger foreign and Indian factories. There are no chances in India for this industry to flourish, but it is now getting on because of the increased duties on the imported goods.

3. The Indian wood used for this industry is not quite suited and to make one's matches popular one has to go in only for foreign wood which is more attractive and strong. Many of the big factories in India get their supplies from Japan and Sweden. So the duty of the foreign imported wood might advantageously be increased.

4. It is a fact that this has caused a great loss to the Government but because all the match materials are to be got from outside, the loss will be covered up by the consequent greater demand for the materials. The Government will also be getting a decent income from the Indian forests as a result of the demand for Indian wood.

5. This is a Cottage Industry in Japan and it can be profitably made so here also. If the Government is pleased to levy a super-tax on the large scale match factories of India, the Cottage Industries will then be encouraged and it will be a source of additional income to the Government.

6. If the Government is desirous of encouraging home industries without considering the loss in this source, it will do well to overlook the loss and

decrease the duties on imported match materials (Wax, Glue, Paper and Chemical drugs, etc.), and also grant free of cost the State forest wood for the manufacture of matches.

7. India is a thickly populated country where the question of unemployment is very keen. In other countries the help of machinery is sought, because of want of labour. This cannot hold good with India. So, if the Government is pleased to restrict the machinery in India there will be demand for labour and the question of unmployment will be no more heard. The Government then will not have to tackle the question of Indians in other Colonies.

The Madras Swadesh Match Factory, Madras.

Representation, without date.

We, the above match manufacturers, beg to bring the following few lines to your kind consideration.

We have seen the advertisements given in the newspapers both by the Government of India and by the Tariff Board about the protection to the above industry. No doubt the first part (beginning) gives us pleasure to note, while the points shown on conclusion are contrary.

Duty.

We beg to state that the present import duty levied on the above is a protective one; and so it is impossible to do this industry without the present duty in the whole of India itself. Taking into consideration the above fact itself is a great protection we have begun this industry. And so if any changes were to be made in the same now it is sure and certain that the above industry will be ruined one for all. In India when there is not a proper industry in these days owing to the beginning of the various factories in the above industry not only millions of people live upon the same but also young boys who are idling away their time are easily brought forward to a prosperous condition. This industry will naturally induce the owners to conduct several other similar industries also.

Regarding downfall in revenue.

We surely can say that the supposed downfall of revenue is not due to this industry. But it is due to the reduction in import duty on salt and other several things. Besides that various other industries have sprung up in India after the conclusion of war. As far as this industry is concerned it is needless to state that a portion of import duty is levied by the importation of chemicals, wood and paper and the like which are used for the above industry.

In conclusion when we try our level best to get freedom and free liberty in these days we request you to conclude this matter favourably to protect us from the difficulties.

Under the circumstances above mentioned what all required is that the present import duty should be retained as a protective one.

And we give you another suggestion, *i.e.*, a decent duty can be levied on big industries which produce an output of 100 gross of matches daily. And this thing will not in any way be difficult to them or neither affect them.

Further we think it will be better to postpone the matter for at least one year to come. And we also hope that we will receive a favourable reply from you at your earliest convenience. Further it is a great sin if any hinderance will happen for the cottage industry.

The Mysore Match Manufacturing Company, Limited, Bangalore.

Representation, without date.

I have enclosed my views with regard to enquiry about the duty on Match Industry in India.

Please put this matter before the Tariff Board and oblige.

To

The Secretary,
Tariff Board, Calcutta.

DEAR SIR,

With regard to the notification of the Government of India regarding the enquiry of the Tariff Board about the duty on the imported matches, I am writing on this matter as one of the promoters and the Directors of the Mysore Match Manufacturing Company, Limited, with an issued capital of five lakhs. I can realise fully the difficulty to which the match industry in India will be put into, if there should be any change in the policy of the Government of India with regard to the present duty which has been imposed on the imported matches.

I think the time is not yet ripe enough to remove the present duty which has been imposed on the imported matches at the rate of Re. 1-8 per gross, as it gives an impetus to the indigenous industry for its development; this was the only cause which gave a hope to the Indian capitalists, to start this industry in India as it was favourable to compete with the outside manufacturers who have built up themselves strong for centuries to cripple any of their rivals in the whole of the world where this industry is not protected. It is after the imposition of this duty that many enterprising men and firms took into their heads of finding out suitable woods which are suitable for the purpose in the Indian forests. This took them some years at least to hit at the proper soft woods, after great many experiments which cost them their time and money. Still they are in experimental stages and they are not yet away from many difficulties. Some have started their business, some have ordered their machinery and some are still contemplating of starting. At this short time the announcement of the present enquiry into it has discouraged many of them. So it will be a sheer waste of time and money on the part of many of these industrialists, if the duty is to be removed in such a short time. All the Indian capital will be sunk into the useless building materials and useless iron machinery which will be nothing but scrap iron. If at all the Government wants to see that this industry should flourish, the duty should be made permanent at least for twenty years before it could be fully developed and could stand any competition; and the Government should impose a duty of at least 125 per cent. on the imported logs, for this purpose, which will induce the indigenous manufacturers to find out more species of woods suitable for the purpose; this is more essential than any other thing to give a full scope for the utilization of the local forest woods and to make the industry purely indigenous.

Besides that the imposition of the duty does not affect the British manufacturers as Britain is not at all supplying the requirements of India. It is solely either Swedish or Japanese. The latter is out of the market as it cannot favourably sell their stuff in India, thus one can see very well what a salutary result this imposition has brought, and it has stopped the supplies from one country which was supplying for a long time. The only country which is now supplying the needs of India is Sweden and we are not much concerned whether the Swedish Industry is crippled by this duty or not; so the Indian Government is legally and morally bound to protect the interest of India by having a strong protective duty on the imported matches; so that even the Swedish stuff is removed from the Indian market and thus give a good impetus for the development of the Indian match industry. So, one cannot see why this industry should not be fully protected.

A question may arise as to the difficulty to which the general public is put to, as it has to pay a bit more for the matches the public uses; but as far as one can see the user is not at all complaining about the extra price which he is paying for his matches owing to this duty. He is quite used to it and he is most willing to pay the swelling price as long as he sees that duty is helping the springing up of the Indian Match Industry and he never grudges to pay even if it is enhanced and he is most willing to see that any of the Indian Industry is similarly protected which is a means of helping the development of any of the industries.

M. ABDUL RASHID SAHEB,

Director.

The Mysore Match Manufacturing Company, Bangalore.

Letter, dated 22nd March 1927.

We are in receipt of your letter of the 7th instant with a copy of the questionnaire drawn up by the Tariff Board in connection with the Board's enquiry into the match-making industry.

We regret, however, to inform you that as our factory will be just starting manufacture, we are not in a position to give you the information desired by your Board.

The South Indian Match Factory, Limited, Madras.

(1) Letter, dated 31st March 1927.

I have the honour to acknowledge receipt of your letter No. 209, dated 7th instant, enclosing a copy of the questionnaire drawn up by the Tariff Board in connection with the Board's enquiry into the Match-making Industry and to send herewith as therein desired answers to the said questionnaire with six spare copies.

The answers may not be as complete as they should be owing to the fact that I have been bed-ridden for the last 1½ months and I had to dictate the answers from my bed. I therefore trust that the Board will excuse any shortcomings in the answers and extend their full sympathy to this Company's cause.

ANSWERS TO QUESTIONNAIRE.

Introductory.

1. The South Indian Match Factory, Limited, is a public registered Company and was formed in August 1912, but started the construction of the Factory in 1922.

2. The total capital invested in this Company is all by Indians. The total number of Directors is seven, and they are all Indians. No Europeans are employed. There was a German expert obtained to fit up the Factory and machinery. He remained in the service of this Company from January 1922 to October 1924. Besides him no other European has ever been employed by this Company in any capacity.

3. This Company undertakes the whole process of manufacture of matches.

4. The factory commenced work in August 1924.

5. The full capacity of our factory as at present equipped is 700 gross per day of 10 hours.

6. The dimensions of the match boxes manufactured are of 2·25″ length, 1·45″ breadth and ·5″ depth and the average number of sticks in each box is 60.

7. The output of the Factory is as under:—

From August 1924 to July 1925—26,839 gross.

From August 1925 to July 1926—22,094 gross.

8. The factory is situated at Kalamkannu about 2½ miles from the Tenmalai Railway station on the South Indian Railway and is advantageously situated in respect of (*a*) and (*b*) vicinity to the area from which our timber and firewood are drawn, (*c*) vicinity to important markets and (*d*) close to the bed of a river which has abundant supply of water. The important factor in selecting the sight of a match factory in India is that it commands facilities in respect of raw materials such as timber, firewood and water and its proximity to the Railway Station.

9. (*a*) It may be so. But the matches manufactured by this Company are second to none except as regards the colour of the veneers which are not purely white. (*b*) There appears to be some prejudice apart from the question of quality against Indian matches in that practically all markets are controlled by foreign exploiters. (*c*) The difference must be such as will enable the indigenous industries to compete with the foreign manufacturers and probably Rs. 1-8-0 per gross represents a fair difference.

Raw Materials—Wood.

10. The wood required for (*a*) splints, (*b*) veneers and (*c*) packing cases is all available in the forests in the midst of which the Company's factory is situated. We do not import any wood from any foreign countries.

11. We use Indian wood as under: (*a*) for splints, (*b*) veneers and (*c*) for packing cases.

12. Yes. We have found Indian wood as satisfactory as imported wood in all respects except as regards colour and fibre. Splints from Indian wood cannot be made as thin as from foreign wood and its colour is not quite white.

13. Our annual requirements of wood are:—(*a*) splints, (*b*) veneers, (*c*) packing cases, about 9,600 cubic feet.

Splints and veneers.—Elavu (Bombax malabaricum), Cheeni palai, pine and various other kinds of trees.

Packing cases.—Vankottah and Uravu and other kinds of trees.

14. About 44 cubic feet of wood.

15. The standard size of the packing case is length $2' \times 9''$, breadth $2'$ and depth $1' \times 3\frac{1}{4}''$, thickness of the plank being $\frac{1}{2}''$. Twenty-five gross of matches are packed in one case.

16. The factory draws its main supply of wood from the surrounding areas about 5 to 8 miles distant. It is much regretted that a map of the factory and the areas from which the supply is drawn is not available.

17. The trees required are felled by local coolies engaged by the factory and are transported from the forest to the factory by floating them down the river and by country carts.

18. The royalty paid to the Government is quarter anna to half anna per cubic foot.

19. The cost per 50 cubic feet during the past four years is as under:—

1923—*Nil.*

1924—*Nil.*

1925 and 1926—Royalty, labour employed on extraction, freight to factory and miscellaneous charges, Rs. 12-12-0, nearly.

20. The terms of concession for extraction of wood are as per copy of concession enclosed and they are favourable.

21. Yes.

22. Yes. The supply of wood has been found constant but as time passes on and demand increases and supplies diminish in certain areas it will be necessary to go to longer distances. There are some petty match factories in

the shape of home industries but we find no comp on from them. But we do not grudge them.

23. Not yet.

24. Yes. We propose to plant trees suitable for match-making within proximate distance from the factory.

25. No.

Other raw materials.

26. Paper and chemicals. Total requirement of each in one year depends upon the output which during the first two years has not been much owing to our not being able to secure suitable agents for the distribution of our output.

27. The quantity of these materials required for each year is as under:—

	Kilos.	Per 100 gross.
Zinc, white	242·9	1·1
Glass powder	444·3	2·1
Antimony sulphide	92·5	·4
Gum Tracaganth	3·5	·02
Gum Arabic	155·8	·7
Manganese dioxide	550·9	2·5
Whitening	54·7	·2
Chlorate of potash	1,758·2	7·9
Bichromate of potash	106·7	·5
Chromate of Barite	8·7	·04
Leather Glue	383·1	1·6
Italian sulphur	281·9	1·3
Phosphorus	150·0	·7
Paraffin	4,235 lbs.	19·3
Colour Rhodamine	15 ,,	·07
Blue paper, etc.	Rs. 3,513-0-6	Rs. 15-15-6

28.

Port of importation is Madras.

The cost of chemicals, etc., per gross is As. 8, nearly.

(*a*) Imported from England and Germany.

(*b*) and (*c*) *Nil.*

Cost price per Kilogram of chemicals recently imported including freight, insurance, landing charges, transport charges and customs duty is:—

	Rs.	A.	P.
Gum arabic	1	0	6
Manganese dioxide	0	7	6
Sulphur	0	4	11
Glass power	0	3	3
Pot. Bichromate	0	13	5
Umber	0	5	8
Glue	1	3	3
Phosphorus	4	2	11
Antimony sulphide	1	6	11

Labour.

29. No.

30. There is no difficulty.

31. Not necessary.

32. None.

33. The whole labour consists of Indians. They are paid and trained in the factory itself.

34. Between 50 and 60 consisting of about 40 men on an average cooly of 12 annas to Re. 1-4-0 and 20 children on an average cooly of 6 to 8 annas. No women are employed.

35. Yes. The Indian labour is drawn from the vicinity of the factory.

36. Yes. But we have no record to indicate the improvement.

37. Free quarters have been provided close to the factory and medical assistance is rendered.

Power.

38. Steam.

39. No.

40. Firewood and scrappings of the factory. Firewood is available in sufficient quantities.

41. About 2 tons per day on an average.

42. Within about 5 or 6 miles of the factory.

43. No. We have a concession from the Travancore Government (*vide* copy referred to in answer 18).

Market.

44. Not available.

45. Yes. The demand has risen gradually.

46. Madras Presidency.

47. Southern districts.

48. (*a*) Figures not available.

(*b*) Yes.

Competition.

49. Sweden and Japan.

50. No.

51. (1) Not available.

(2) Rs. 1-8-0 to Rs. 1-12-0 per gross.

(3) We have no figures.

52. From importing firms.

53. Yes, for reasons already explained in our representation, dated 24th December 1926.

54. (*a*—*c*) Yes.

(*d*) Yes, in respect of chemicals and paper.

(*e*—*i*) Yes.

55. (*a*), (*b*), (*g*), (*h*) may be regarded as permanent and the rest as temporary disadvantages which will not operate for long.

Equipment.

56. Yes. About 400 gross a day.

57. About 50 per cent.

58. (*a*) Self-acting cross-cut saw. Cross-cut circular saw. Peeling machines. Splint chopping machine. Machines for cutting box-veneers. Splint shaping machines. Splint drying cylinder. Splint polishing and cleaning machines. Splint levelling machine. Outer box and inner box machines. Labelling machines. Ideal machine. Paraffining apparatus. Rotating dipping machine. Match box painting and filling machines. Packetting machines. Cone grinders. Igniting machines. Steam paste cooking machines. Knife grinding machines.

(*b*) No special agreement.

59. (*a*) Yes.

(*b*) Transport of materials into the factory and feeding the various machines and making packing cases and packing.

60. (*a*) No.

(*b*) Yes. Later on by adding further machines to manufacture different sizes.

61. None.

Capital Account.

62. (*a*) *Nil.*

(*b*) *Nil.*

(*c*) Buildings, Rs. 66,324-7-7.

(*d*) Plant and machinery, Rs. 1,28,622-2-6.

(*e*) Other miscellaneous assets, Rs. 86,548-5-8.

63. Yes.

Depreciation written off on buildings since this year, Rs. 3,443-6-0.

Depreciation written off on machinery, Rs. 13,695-8-0.

Depreciation on furnitures, Rs. 91-8-0.

64. Yes.

65. About the same as it costs us. I do not think there will be much difference.

66. About 1*s.* 3*d.*

67. (*a*) Rs. 3,00,000 Authorized capital.

(*b*) Rs. 2,28,925 Subscribed capital.

(*c*) Rs. 1,82,625 Paid up capital.

All ordinary shares and the balance is borrowed capital.

68. We have no preference shares.

69. No deferred shares.

70. No dividends have so far been paid.

71. None so far.

72. None.

73. None.

74. This has not been worked out yet.

Works cost.

75. Forms filled up and annexed.

76. Yes, chiefly labour, interest and steam. About 50 per cent.

77. Yes.

78. No.

Overhead charges.

(*i*) Depreciation.

79. Depreciation. None so far.

80. Unable to give the information.

(*ii*) Working capital.

81. (1) About Rs. 25,000.

(2) About Rs. 50,000.

82. It has been necessary to borrow additional capital for the purpose.

83. About Rs. 1,30,000, the interest being at the rate of 9 to 12 per cent.

84. This has not been done so far as the work has been more or less in an experimental stage.

85. On an average of Rs. 25,000. About 3 or 4 months.

86. Yes, of raw materials. The average value of stock is Rs. 15,000.

(*iii*) Head office expenses and Agents' commission.

87. Yes. The Head office is at Madras and the local management office is at Tenmalai.

88. The annual amount of Head office expenses is about Rs. 2,500.

(*b*) Agent's commission, *nil.*

89. *Nil.*

90. Same as 88 (1), *viz.*, about Rs. 2,500.

Manufacturer's Profits.

91. About 12 per cent.

92. About 10 per cent.

93. 12 per cent.

Claim for Protection.

94. (*a*—*c*) Yes.

95. (*a*—*c*) Yes.

96. Yes, for the reasons that it could be developed into a home industry during spare period of agriculturists and thus enable them to secure an item of absolute home necessity at cheap cost.

97. (*a*) To the extent of the duties.

(*b*) To the extent of that these charges represent.

98. The amount of the existing customs duties on matches is absolutely necessary and the entire abolition or a substantial reduction in the import and customs duties on chemicals, paper and other raw materials imported from foreign countries.

99. As an alternative a bounty to the extent of the existing customs duties on matches *plus* the customs duty on materials imported from foreign countries.

Raw Materials—Wood.

Answer to question No. 11—

Very suitable trees for splints and boxes.

Species.	Seigniorage rates per cubic foot. Rs.	A.	P.
Antiaris toxicaria	0	1	0
Mastixia pentandra	0	1	0
Elasocarpus serratus	0	2	0
Sterospermum chelonodies	0	1	0
Ormosia travancorea	0	1	0
Chrysophyllum Roxburghi	0	1	0
Evodia Roxburghiana	0	1	0
Albizzia stipulata		...	
Semicarpus travancorica	0	1	0
Symplocos macrocarpa	0	1	0
Litsæa coriaces	0	1	0
Actinodaphne madraspotana	0	1	0
Buchania latifolia	0	1	0
Pterospermum rubiginemum	0	2	0
Magnifera indica	0	2	0
Stephegyne parvifolia	0	1	0
Artocarpus Lakcooha	0	4	0
Melia dubia	0	2	0
Bombax malabaricum	0	2	0
Allanthus malabarica	0	2	0
Anthocephalus cadamba	0	1	0
Hymenodictuon excelsum	0	1	0
Smelina arborea	0	4	0
Myristica malabarica	0	2	0
Trewia nudiflora	0	2	0

Suitable for boxes, not suitable for splints.

Canarium strictum	0	2	0
Semicarpus auriculata	0	1	0
Elaecarpus oblongus	0	2	0
Cinnamonum Zeyanicum	0	1	0
Miliusa velutina	0	2	0

Species.	Saigniorage rates per cubic foot. Rs. A. P.
Ficus Beddomei	0 1 0
Ficus Benjamina	0 1 0
Ficus Glomerata	0 1 0
Ficus religiosa	0 1 0
Ficus Tjakela	0 1 0
Ficus collosa	0 1 0
Ficus hispide	0 1 0
Diospyros Faniculata	0 1 0
Nephalium longana	0 1 0
Totrameles nudiflora	0 2 0
Eugania hemispherica	0 1 0
Flacurtia Cataphracte	0 1 0
Aporosa acuminata	0 1 0
Callophyllum Wightianum	0 4 0
Pithecolobium bigeminum	0 1 0
Humboldtia Vahliana	0 1 0
Sterculia urens	0 2 0
Sterculia villosa	0 2 0
Mallohis philippinensis	0 1 0
Suitable for splints, not suitable for boxes.	
Odina Wodier	0 2 0
Spendias Mangifera	0 1 0

Answer to question No. 75—

Form I.—*Statement showing total expenditure on the production of matches during the last four years.*

—	1922-23.	1923-24.	1924-25.	1925-26.
			Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers.	...	...	4,410 7 0	2,217 12 2
2. Cost of paper	...	...	...	3,513 0 6
3. Cost of chemicals	...	...	10,920 2 4	5,192 3 8
4. Cost of other raw materials	...	...	791 8 10	685 8 11
5. Factory labour	...	...	12,633 14 0	11,290 8 2
6. Power and fuel	...	...	1,491 0 0	788 13 3
7. Ordinary current repairs and maintenance of buildings, plant and machinery.	...	...	178 11 10	1,158 5 6
8. General services, supervision and local office charges.	...	...	...	...
9. Miscellaneous, *e.g.*, rent, municipal tax, insurance, etc.	...	...	...	...
10. Cost of packing cases	...	...	2,143 15 10	2,896 4 6
TOTAL	...	...	31,569 11 10	27,743 8 8
			Gross.	Gross.
Total production of matches for the year.	...	...	26,839	22,094

FORM II.—*Statement showing works cost per gross of matches.*

———	1922-23.	1923-24.	1924-25.	1925-26.
			Rs. A. P.	Rs. A. P.
1. Cost of wood for splints and veneers.	...	...	0 2 8	0 1 8
2. Cost of paper for labels and wrapper.	...	...	0 6 6	0 2 7
3. Cost of chemicals	...	...		0 3 9
4. Cost of other raw materials . .	...	...	0 0 6	0 0 6
5. Factory labour	...	...	0 6 11	0 8 2
6. Power and fuel . . .	...	...	0 0 11	0 0 8
7. Ordinary current repairs and maintenance of buildings, plant and machinery.	...	...	0 0 1	0 0 10
8. General services, supervision and local office charges.	...	...	...	...
9. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc.	...	...	...	...
10. Cost of packing cases . . .	...	...	0 1 3	0 2 1
TOTAL .	...	...	1 2 10	1 4 3
Credit of for materials recovered (if any).	...	...	...	...
			Gross.	Gross.
Total production of matches for the year.	...	...	26,839	22,094

AGREEMENT.

ARTICLES OF AGREEMENT made the Twenty-sixth day of One thousand nine hundred and twenty-three BETWEEN THE SOUTH INDIAN MATCH FACTORY, LIMITED, a Company incorporated under the Indian Companies Act VI of 1882 and having its Registered Office at No. 11, Mount Road, Madras (hereinafter called "The Company") of the one part and DEWAN BAHADUR T. RAGHAVIAH, ESQ., B.A., DEWAN OF TRAVANCORE, acting for and on behalf of the Government of His Highness the Maharaja of Travancore (hereinafter called "The Government") of the other part.

WHEREAS These Presents are supplemental to the Articles of Agreement (hereinafter called "The Principal Agreement") bearing date the twenty-first day of December One thousand nine hundred and twelve and made between the Company of the one part and Dewan Bahadur P. Rajagopalachariar, Esq., M.A., B.L., C.I.E., then Dewan of Travancore, acting for and on behalf of the Governmuent AND WHEREAS under the Principal Agreement the Government with a view to enable the Company to start and work

a Match Factory in Travancore, agree to allow to the Company certain concessions in the matter of land, timber, soft wood and fuel subject to the terms, covenants, conditions and provisions therein contain AND WHEREAS under the said terms, covenants, conditions and provisions in the Principal Agreement contained, the Company was bound to start buildings and other operations within three years of the date of Principal Agreement AND WHEREAS for reasons beyond its control the Company not being in a position to keep to the terms of the contract contained in Clause 2 of the Principal Agreement the Company did apply for and obtain from the Government repeated extensions of time for acting up to the contract and the last of such extensions expired on the 31st of December 1922 AND WHEREAS though satisfactory progress has been made with regard to the construction of buildings and the installation of machinery the Company has not yet been able to work the factory AND WHEREAS under such circumstances differences arose between the Company and the Government, the Company insisting on the fulfilment by the Government of the contract for a period of twelve years from 1923 and the Government contending that the contract has ceased to subsist and cannot be given effect to AND WHEREAS in view of the facts that the Company knew at the time of the Principal Agreement that the Government did not want to commit themselves to an agreement likely to last beyond about fifteen years from the date thereof and the Government would incur heavy loss if the terms of the Principal Agreement were enforced as also in view of the facts that on the strength of the Principal Agreement and repeated extensions of time granted thereafter by the Government as hereinbefore mentioned the Company did invest large sums of money in putting up the necessary buildings and importing the necessary machinery and the Company would be put to considerable loss if the Government were to withdraw from the Principal Agreement now and with a view to an amicable settlement of the said differences between the Company and the Government and the avoidance of loss to either party V. Desikachari, Esq., the Managing Director of the Company, acting for and on behalf of the Company has agreed that the Principal Agreement be modified in such particulars as are hereinafter mentioned. AND WHEREAS the action of the said V. Desikachari, Esq., in having so agreed on behalf of the Company to so modify the Principal Agreement has been duly sanctioned by a resolution passed at the meeting of the Board of Directors of the Company held on the eleventh day of July One thousand nine hundred and twenty-three.

NOW THESE PRESENTS WITNESS and it is hereby mutually agreed as follows:—

1. That Clause 7 of the Principal Agreement shall be deemed to have been cancelled and the following substituted instead:—

That for the purpose of ensuring an adequate supply of soft wood to the Company for manufacturing splints, match boxes and packing cases in the factory the Government doth hereby agree with the Company that the Government will for a period of twelve years from the first day of September One thousand nine hundred and twenty-three permit the Company to extract at the Company's own cost and expense from the forests of the Government soft wood of the species mentioned in the schedule hereto annexed or such other species as may hereafter be tested and found suitable for the purpose in such quantities as may be required by the Company from time to time Provided however the quantities so extracted shall not in the aggregate exceed a maximum of three hundred and sixty thousand (3,60,000) cubic feet of wood during the first three years, one million and eighty thousand (10,80,000) cubic feet of wood during the next five years and eight hundred and sixty-four thousand (8,64,000) cubic feet of wood during the last four years exclusive of the bark.

2. That Clause 8 of the Principal Agreement shall be deemed to have been cancelled and the following substituted instead:—

That the extraction of soft wood by the Company from the Government forests as hereinbefore mentioned shall be made in such areas as may be

selected for the purpose by the Conservator of Forests of the Government due regard being had by the said Conservator in the selection of such areas to the means available for the transport of such wood to the Company's factory and the cost of such transport, and in the event of a difference of opinion between the Company and the said Conservator of Forests such differences shall be settled by the Government whose decision in the matter shall be final. Such extraction of soft wood by the Company from the Government forests shall also be subject to the supervision of the Forest Department of the Government and the agency employed by the Company to carry on such extractions shall be bound to carry on work under the general control of the Forest Department and on the lines laid down by that Department so as to obviate all possible risk of injury to the forest.

3. That clause 9 of the Principal Agreement shall be deemed to have been cancelled and the following substituted instead:—

That the Government doth likewise agree with the Company that the Government will for a period of twelve years from the first day of September One thousand nine hundred and twenty-three permit the Company to extract at the Company's own cost and expense from the forests of Government all such quantities of fuel as may be required by the Company for use in the factory and for the domestic consumption of the Company's employees, agents, workmen and servants residing at or near the Company's premises.

4. That clause 10 of the Principal Agreement shall be deemed to have been cancelled and the following substituted instead:—

That the extraction of fuel by the Company from the Government forests as hereinbefoe mentioned shall be subject to the same limitations, conditions, supervision and control as are hereinbefore prescribed in clause 2 hereof in the case of soft wood.

5. That clause 15 of the Principal Agreement shall be deemed to have been cancelled and the following substituted instead:—

That the Company doth hereby covenant and agree with the Government that in respect of the soft wood permitted by the Government to be extracted by the Company from the Government forests as hereinbefore mentioned the Company will pay seigniorage to the Government according to the undermentioned scale, that is to say, 25 per cent. of the now existing seigniorage rates for the first four years, 50 per cent. of the said rates for the next four years and 75 per cent. of the said rates for the last four years of the existence of These Presents, the said now existing seigniorage rates being mentioned and specified in respect of each species of wood described in the schedule hereto annexed; in the case of the species of soft wood which are not mentioned in the said schedule and which may hereafter be tested and found suitable for the said purpose the rates of seigniorage will be fixed by the Government and the Company shall pay the same percentage of such rates as will be payable if such species and rates were included in the said schedule. The Company shall also be bound to accept and pay seigniorage to Government on all such soft wood measured out to the Company by the said Forest Department.

6. That clause 16 of the Principal Agreement shall be deemed to have been cancelled and the following substituted instead—

That the Company doth hereby covenant and agree with the Government that in respect of all fuel permitted by the Government to be extracted by the Company from the Government forests as hereinbefore mentioned the Company will pay to the Government seigniorage according to the undermentioned scale, that is to say, 25 per cent. of the now existing seigniorage rate of British Rupee One and Annas Eight per ton for the first four years, 50 per cent. of the said rate for the next four years and 75 per cent. of the said rate for the last four years of the existence of These Presents.

7. That subject only to the variations herein contained and such other alterations, if any, as may be necessary to make the Principal Agreement consistent with These Presents, the Principal Agreement shall remain in full force and effect and shall be read and construed and enforceable as if the

terms of These Presents were inserted therein by way of addition or substitutions as the case may be.

IN WITNESS WHEREOF the parties to These Presents have hereunto set their hands and seals the day and year first above mentioned.

THE SCHEDULES REFERRED TO IN THE FOREGOING ARTICLES OF AGREEMENT.

Very suitable for Splints and Boxes.

Species.	Seigniorage rates per cubic foot. Rs. A. P.
Antiaris toxicaria	0 1 0
Mastixia pentandra	0 1 0
Elaeocarpus serratus	0 2 0
Sterospermum chelonoides	0 1 0
Ormosia travancorica	0 1 0
Chrysophyllum Roxburghii	0 1 0
Evodia Roxburghiana	0 1 0
Albizzia stipulata	...
Semicarpus travancorica	0 1 0
Symplocos macrocarpa	0 1 0
Litsaea coriacea	0 1 0
Actinodaphne madraspatana	0 1 0
Buchania latifolia	0 1 0
Pterospermum rubiginosum	0 2 0
Mangifera indica	0 2 0
Stephegyne parvifolia	0 1 0
Artocarpus Lakoocha	0 4 0
Melia dubia	0 2 0
Bombax malabaricum	0 2 0
Ailanthus malabarica	0 2 0
Anthocephalus cadamba	0 1 0
Hymenodictyon excelsum	0 1 0
Gmelina arborea	0 4 0
Myristica malabarica	0 2 0
Trewia nudiflora	0 2 0

Suitable for Boxes, not suitable for Splints.

Canarium strictum	0 2 0
Semicarpus auriculata	0 1 0
Elaecarpus oblongus	0 2 0
Cinnamomum Zeyanicum	0 1 0
Miliusa velutina	0 2 0
Ficus Beddomei	0 1 0
Ficus Benjamina	0 1 0
Ficus Glomerata	0 1 0
Ficus religiosa	0 1 0
Ficus Tjakela	0 1 0
Ficus collosa	0 1 0
Ficus hispida	0 1 0
Diospyros Paniculata	0 1 0

Species.	Seigniorage rates per cubic foot. Rs. A. P.
Nephelium longana	0 1 0
Tetrameles nudiflora	0 2 0
Eugenia hemispherica	0 1 0
Flacourtia Cataphracta	0 1 0
Aporosa acuminata	0 1 0
Callophyllum Wightianum	0 4 0
Pithecolobium bigeminum	0 1 0
Humboldtia Vahliana	0 1 0
Sterculia urens	0 2 0
Sterculia villosa	0 2 0
Mallohis Philippinensis	0 1 0
Suitable for splints, not suitable for boxes.	
Odina Wodier	0 2 0
Spendias Mangifera	0 1 0

Signed Sealed and Delivered by the abovesaid T. Raghaviah, Esq., Dewan of Travancore, acting for and on behalf of the Government of His Highness the Maharaja of Travancore in the presence of— (Sd.) T. RAGHAVIAH.

(1)
(2)

Signed Sealed and Delivered by the abovesaid The South Indian Match Factory, Limited, by its duly constituted Attorney, V. Desikachari, Esq., in the presence of— (Sd.) V. DESIKACHARI.

(1)
(2)

True copy.

(Sd.) Illegible.

Managing Director,
The S. I. Match Factory Ltd.

CONCESSION AGREEMENT WITH TRAVANCORE GOVERNMENT.

ARTICLES OF AGREEMENT entered into this 21st day of December One Thousand nine hundred and twelve BETWEEN THE SOUTH INDIAN MATCH FACTORY LIMITED, a company incorporated under the Indian Companies Act VI of 1882 and having its Registered Office at No. 11, Mount Road, Madras (hereafter referred to as " the Company ") of the one part and DEWAN BAHADUR P. RAJAGOPALACHARI, ESQ., M.A., B.L.

C.I.E., DEWAN OF TRAVANCORE, acting for and on behalf of the Government of His Highness The Maharaja of Travancore (hereinafter referred to as the Government) of the other part; WHEREAS under date the 29th day of August 1912 a memorial was presented to the Government by the Directors of the Company for certain concessions such as would enable the Company to start and work up a Match Factory in the State of Travancore AND WHEREAS after full consideration of the concessions sought to be obtained by the Company Government was pleased to agree to the terms and to grant the concessions specified in the Government proceedings No. 10508-L. R. & F., dated the 2nd day of October 1912 AND WHEREAS on further and subsequent representations made to the Government on behalf of the Company on or before the 2nd of December 1912. Government was also pleased to alter, modify and supplement some of the terms and concessions specified in the said immediately hereinbefore recited Government Proceedings AND WHEREAS demand was made of the Company by the Government to enter into a formal agreement with Government specifying the terms covenants conditions and provisions subject to which the industry was to be started and worked up by the Company which demand was assented to by the Company. It is hereby mutually agreed to that the Company shall have the rights liberties and privileges and be also subject to the liabilities herein recited and hereinafter appearing.

(1) That the Government doth hereby agree to grant to the Company an area of 25 (Twenty-five) British statute acres of land at such spot in the Yerur Reserve as may hereafter be mutually agreed to by the Company and the Government for the erection of their factory, cooly lines, outhouses for the stockage of raw materials, fuel and other requisite goods and things and buildings for residential and other purposes as may be required by the Company.

(2) That the Government doth hereby agree to deliver possession of the lands specified in clause (1) One hereof as and Where the same is required by the Company for the purpose of starting their building and other operations on the said land within three years from the date of these presents.

(3) That should at any time after the date of these presents it is found necessary that more land is required by the Company for the purposes of the Company. The Government doth hereby covenant and agree to grant also such additional land in the vicinity as may be required provided that Government land is available for the purpose and also that in no event Government shall be under liability to grant land in all exceeding (50) Fifty British statute acres in area inclusive of the first grant.

(4) That the Government doth hereby agree to grant to the Company the land hereby agreed to be granted free of payment of vilayartham or price thereof and also free of any assessment or tax for a period of twenty (20) years calculated as and from the date on which possession of such lands is delivered to the Company.

(5) That should at any time after the date of these presents the Company desire to acquire full right of ownership over the whole or any portion of the lands that may under the provisions in that behalf contained in these presents be granted to the Company the Government doth hereby agree to grant such full ownership to the Company subject to payment of acreage value at the rate of British Rupees (50) Fifty per acre and also subject to payment of assessment or tax at the rate of British Rupees (2) Two per acre per annum as and from the date of grant of such full ownership provided that the said assessment of tax shall be liable to revision at the Periodical Revenue settlement of the other lands in the State.

(6) That the Government doth hereby agree to supply the Company with such quantity of timber as may be *bonâ fide* required by the Company for the buildings specified in Clause (1) hereof and which they may cause to be erected on the lands granted to the Company and under or by virtue of these presents and deliver the same to the Company at the site of their works. Provided that Government shall on no account be under liability to

supply teak timber and provided also that Government shall be under obligation to supply only jungle wood timber and provided further that the supply and delivery need to be made only on a payment to Government by the Company of the actual felling charges of the requisite quantity of timber and the transport charges thereof for delivery at the sight of works of the Company.

(7) That the Government doth hereby agree to supply and deliver to the Company at the Company's factory soft wood of such species which are at present recognised or which may be hereafter be tested and found as suitable for the purpose of manufacturing splints, match-boxes and packing cases and of such quantity as may be indented for by the Company for a period of Twelve Years, from the date of the first supply indebted for by the Company at the maximum rate of (3,60,000) Three hundred and sixty thousand cubic feet of wood for the first (3) three years (10,80,000) One million and eighty thousand cubic feet for the next five years and (8,64,000) eight hundred and sixty-four thousand cubic feet for the remaining four years exclusive of the bark the delivery being fairly evenly spread over each of the year during the said twelve years provided that the Company shall be under obligation to accept delivery of the wood required for the months of March, April and May in each year between the fifteenth day of January and the fifteenth day of February of each year immediately preceding and provided that the Company shall be under liability to accept only sound and suitable wood which are 28 inches or multiplies of 28 inches in length and of a girth of not less than 3 feet and not more than 9 feet.

(8) That should at any time the Company be desirous of arranging for its own supply of soft wood referred to in clause 7 hereof the Government doth hereby agree to permit them to do so by felling and removing such wood from the nearest vicinity of their factory provided that the Company shall be exempt from payment of any charges to Government in respect of the quantity of wood required during the first three years from the commencement of their works and referred to in clause 7 hereof and that thereafter the Company shall be under liability to pay to Government seigniorage at the rate of (3) three pies per cubic foot of soft wood removed from the Government forests and provided also that in the event of the Company preferring to work down the soft wood needed by their own agency such agency shall be under liability to carry on work under the general control of the Forest Department of the Government and on lines laid down by the department so as to obviate all possible risk of injury to the forests.

(9) That the Government doth hereby agree to supply and deliver to the Company stocked at their premises for a period of twelve years from the due date of the first supply indented for by the Company such quantity of timber as may be required for fuel for use in the factory and for the domestic consumption of the Company's employees, agents, workmen and servants residing at or near the Company's premises.

(10) That should of any time the Company be desirous of arranging for its own supply of fuel referred to in clause (9) hereof the Government doth hereby agree to permit them to do so by felling and removing the requisite quantity of timber required for fuel from the nearest vicinity of their factory, provided that the Company shall be exempt from payment of any charges to Government in respect of the quantity of timber felled and removed from the Government forests for fuel purposes during the first three years from the commencement of their working and that thereafter the Company shall be under liability to pay to the Government seigniorage at the rate of annas four per ton of eighty cubic feet of timber so felled and removed and provided also that in the event of the Company arranging for its own supply of the quantity of timber required for fuel purposes by their own agency such agency shall be under liability to carry work under the general control of the forest department of the Government and on lines laid down by that department so as to obviate all possible risk of injury to the forests.

(11) That the Government doth hereby agree to allow the right of free user by the Company of the water of the Kolathupuzhai river for their purposes and requirements except that of generating motive power and the free user of the said river bed for the purpose of keeping under water storage the timber that may be required by them to be so kept.

(12) That the Government doth hereby covenant and agree with the Company not to impose any duty whatsoever on the matches that may be manufactured, sold, or exported by the Company.

(13) That the Government doth also hereby covenant and agree with the Company to arrange for the grant of supplies bills free of any charge whatsoever at the Treasury of the Government at Poonalur on the Bank of Madras, Madras and *vice versâ* in respect of *bonâ fide* remittances of sums of money by the Company in the connection with its work.

(14) That the Company doth hereby covenant and agree with the Government that so long as they have not acquired full right of ownership as recited in clause 5 hereof over the lands that may be granted to them by Government under or by virtue of these presents the Company shall not alienate or cause to be alienated the whole or any portion or portions of such lands.

(15) That the Company doth hereby covenant and agree with the Government to pay to the Government for the soft wood that may be supplied to the Company by the Government as recited in clause (7) hereof at the rate of three annas and six pies per cubic foot of wood supplied during the first three years thereafter for the next five years at the rate of four annas and six pies per cubic foot of wood supplied and for the remaining four years at the rate of 5 annas per cubic foot of wood supplied.

(16) That the Company doth hereby covenant and agree with the Government to pay to the Government for the fuel timber that may be supplied to the Company by the Government as recited in clause (9) hereof during the first three years at the rate of (3) Three British Rupees and eight annas per ton of eighty cubic feet of timber supplied thereafter for the next five years at the rate of (4) Four British Rupees per ton of timber supplied and for the remaining four years at the rate of four British Rupees and eight annas per ton of timber supplied.

IN WITNESS WHEREOF the parties of these presents have executed the same the day and the year first above mentioned.

Signed sealed and delivered by the above-named the South Indian Match Factory Limited by their duly constituted Attorney V. Desikachari, Esq., B.A. and B.L., acting under the Deed Roll of Power-of-Attorney, dated the sixteenth day of December One Thousand and nine hundred and twelve in the presence of— (Sd.) V. DESIKACHARI.

Signed and sealed and delivered by the said Dewan Bahadur P. Rajagopalachari, Esq., M.A. and B.L., C.I.E., Acting for and on behalf of the Government of His Highness the Maharaja of Travancore in the presence of— (Sd.) P. RAJAGOPALACHARI.

(2) *Letter No. 19/2, dated the 13th December 1927.*

As desired in your letter No. 927 of the 28th ultimo, I have the honour to enclose herewith a statement prepared in accordance with Form II giving our latest works cost per gross of matches. This Company's year begins from 1st August and ends with 31st July of the subsequent year. The statement now prepared is based on the working of the first four months of the current year.

Statement showing works cost per gross of matches.

	From 1st August 1927 to 30th November 1927.
	Rs. as. p.
1. Cost of wood for splints and veneers . .	0 1 11
2. Cost of paper for labels and wrapper .	0 1 10
3. Cost of chemicals	0 3 1·80
4. Cost of other raw materials . . .	0 0 3
5. Factory labour	0 2 10
6. Power and fuel	0 0 7·30
7. Ordinary current repairs and maintenance of buildings, plant and machinery . .	0 0 4·40
8. General services, supervision and local office charges	0 1 4
9. Municipal taxes	0 0 0·30
10. Cost of packing cases	0 1 2·90
TOTAL .	0 13 6·70

Total production of matches for the period . . . 15,049 gross.

The Standard Match Factory, Sattur, Madras Presidency.

Letter dated 30th March 1927.

We are in receipt of your letter dated 7th March 1927 and the questionnaire regarding match industry. We beg to submit the following information:—

Introductory.—The firm which we represent was established on the month of September 1925 and it is an unregistered firm and the capital invested is Rs. 6,000 and the total number of directors are two and it is a purely Indian firm of twenty shareholders. We made contract with the factories which solely manufacture splints and veneers and finish the work by hand operation. There are 25 paid servants in our factory and our average out-turn is 40 to 45 grosses of ¾ sizes daily (diameter $2'' \times 1\frac{3}{4}'' \times \frac{3}{4}''$), each box containing 72 splints.

Our factory is situated in the town of Sattur and consider it of a suitable one because of abundant labour supply. We consider that match factories in India are to be done in two departments: (1) Manufacturing of raw materials, (2) Finishing the products. The former is to be situated in forests where suitable woods abound and the latter in towns where they may have abundance of cheap labour and good market.

We agree that Indian made matches are partly inferior to the imported matches with respect of best woods not being available. In other respects we are almost equivalent.

Wood.—The woods hitherto used are good for boxes and packing cases and for splints they earn a prejudicial name compared with imported matches as of its easy breaking. So we think it necessary to import splints from foreign places such as Japan. The woods used for manufacturing our boxes are Bombax Malabaria (called in Tamil) and Shenthanaku and pala. As for other details we are not in a position to answer them as we do not manufacture splints and veneers and purchase from others.

Other raw materials:—

Market price. Rs.	A.	P.	Quantity reqd. per 100 Gross.	
1.	0	4	0	1. 30 lbs. Potasium chlorate.
2.	0	5	0	2. 4 „ Do. dichromate.
3.	0	4	0	3. 4 „ Sulphur.
4.	0	3	0	4. 7 „ Manganese dioxide.
5.	3	0	0	5. 1 „ Rodamine.
6.	2	8	0	6. 3 „ Phosphorus.
7.	0	12	0	7. 3 „ Sulphide of Antimony.
8.	0	5	0	8. 2 „ Zinc, white.
9.	0	5	0	9. 3 „ Umber.
10.	0	3	0	10. 8 „ Ferric oxide.

Almost all kinds of chemicals are imported from Germany and none of these are likely to be manufactured here in India.

Labour.—As we manufacture matches only by hand operations there is no necessity of the employment of skilled labour imported from abroad and they are satisfactory.

Power.—No power is used.

Market.—Though our average daily output is 40 to 45 gross against the local demand for 25 gross our share is only 15 per cent. in the local demand and we market the remaining 85 per cent. in the mofussils.

Competition.—The keenest competitors are Swedish and Japanese, and they both compete with Indian matches manufactured from indigenous wood and with matches manufactured from imported goods.

It is understood from the reliable sources that foreigners have installed large factories in India with an addition of few Indians to be exempted from the excuse that, they have established the factories in India to suppress the Indian industry in the initial stage and to monopolize the market. They manufacture the matches with the ideal machines of their own country, with the expert labour, efficient machines, pure and cheap raw-materials and investing large capitals. So their cost of production becomes very low and they have ample scope to monopolize the market.

This too has been experienced by us in past three months and prices have fallen down from Rs. 2-4-0 per gross to Rs. 1-12-0 per gross.

Equipment.—Three-fourths of our capital is invested in machinery, *i.e.*, hand frames, racks, dipping trays, emptying machines, grinding mills, and other requirements, and we consider absolutely necessary to install machines for pasting, frame filling, manufacture of splints and all the departments to compete with foreign goods.

Claim for protection.—As our cost of production comes to Rs. 1-6-0 per gross of ¾ size and the market price is Rs. 1-8-0 per gross the profit realised is not decent for cottage industries as it covers the bad debts during the year.

Any reduction of the import duty, *i.e.*, Rs. 1-8-0 per gross, will surely affect our trade and sometimes it is hoped that it will put an end to this cottage industry even if the reduction be 4 annas per gross when the market will

be reduced to Rs. 1-4-0 which is below our cost of production. Reducing the duty, considering the only informations given by such concerns, will only protect such concerns from foreign competition and the fate of the small factories which really gives employment to the poor will be miserable. So the small factory should be protected both from foreign as well as Indian (factories conducted by foreigners equipped with foreign machines) competition. Further these large factories of India have twofold advantages: (1) The low cost of production, (2) Their higher rate of sale owing to the neat execution of the machines. So competition with such factories is not to be dreamed of. Even now as the price of the market is decreasing many small factories have vanished.

Therefore we suggest to protect these cottage industries from foreigners and the existing rate of import duties, *i.e.*, Rs. 1-8-0, should be declared as protective duty and to levy tax to all factories Indian or mixed turning out more than 100 gross per day.

Such excise should be fixed at a figure calculated equal to the difference between the cost of productions of the large and small factories *plus* 2 annas per gross, *i.e.*, the difference of price in the market. By adopting this sympathetic scheme, further recouping the difficiency in import duty and also increase the number of small factories all over India and thereby solve the problem of unemployment to a considerable extent. Then the match Industry will have the substantial footing.

Therefore we kindly request you to be good enough to grant full protection for match industry.

The Malbaar Match Manufacturing Company, Limited, Cochin, Madras Presidency.

Letter, dated 5th April 1927.

In response to the request contained in your circular letter No. 209, dated 7th ultimo, from Rangoon, we enclose herewith our answers to the Tariff Board's questionnaire with six spare copies as required. It has not been found possible to get them to Calcutta by the 4th April, but we hope that the short delay that has taken place will not result in any inconvenience.

It must be explained that the answers which this Company gives must necessarily be of doubtful value. The original idea of the Company was to manufacture matches out of Eota, but it has proved unsuitable as a raw material for match manufacture, and we are now reconstructing with a view to making matches out of timber. We have already given you information in this connection in our letters of the 29th October and 16th December 1926.

INTRODUCTORY.

1. 1923. Public Registered Company.

2. 1,431 shares of Rs. 10 each are held by Indians, *i.e.*, nearly $\frac{1}{4}$th of the capital.

5 Directors of which one is an Indian and the others Europeans.

One European employed as Factory Manager.

3. Whole process of manufacture.

4. Commenced in February 1926, but work stopped in June 1926, the raw material (Eota) used being found unsuitable.

5. 1,000 gross per diem.

6. $1\frac{7}{8}'' \times 1\frac{3}{8}'' \times \frac{5}{8}''$.—63.

7.

8. At Fudichal in the Travancore State.

(*a*) Yes.

(*b*) Yes.

(*c*) Yes.

(*d*) Yes.

Close proximity to a constant and lasting source of supply of suitable timber procurable at low cost.

9. (*a*) Yes. The principal respects in which Indian Matches fall short of imported (Swedish) Matches are :—

(*i*) *Splints.*

Faults of Timber.

(*a*) Strength.

(*b*) Colour.

(*c*) Paraffining (on account of low absorbing powers of timber).

Faults of Manufacture.

(*a*) Uniformity.

(*b*) Impregnation.

(*c*) Paraffining.

(*ii*) *Boxes*—

Faults of Timber.

(*a*) Colour.

(*b*) Texture.

(*iii*) *General.* Appearance.

(*b*) No.

(*c*) 12 annas to Re. 1.

RAW MATERIALS.

Wood.

10. (*a*) No.

(*b*) No.

(*c*) No.

11.

Botanical name.	Vernacular name.
(*a*) Bombax Malabarica.	Elavu.
(*b*) Bombax Malabarica.	Elavu.
(*c*) Tetrameles Nudiflora.	Cheeni.

12. No experience.

13. (*a*) Factory not working.

(*b*) 6,000 candies of 15 cubic feet.

14. 2 candies of 15 cubic feet.

15. Length 39″; Breadth 22″; Height 23″.

Say, 1½ cubic feet.

50 gross.

16. Malayattur Reserve.

Travancore Forests.

40 miles.

17. Manual labour and Elephants.

Road and river.

18. Unsettled.

19. No experience so far.

20. Unsettled.

21. No experience.

22. No experience.

23. Does not arise.

24. Yes.

Negotiations with Travancore Durbar for concessions over a period of years. No steps have yet been taken to plant timber, but it is intended to do so.

25. No.

Other raw materials.

26—29. No other raw materials used.

Labour.

30. No difficulty anticipated.

31. Not at all.

32. Does not arise.

33. Rely on Indian labour.

34. Estimate 150—200 including boys.

Machinemen, Mechanics, etc., Re. 1-8 per day.
Ordinary men coolies, 12 annas per day.
Ordinary boy coolies, 4 annas per day.
Ordinary women coolies, 6 annas per day.

35. Vicinity of the Factory.

36. Insufficient experience in match manufacture, but it has been found in other connections that labour does improve with training. An intelligent young man of the working classes with some vernacular education becomes a fairly efficient machine operator in about three months.

37. Clerical staff and foremen housed on the premises in very good pukka quarters.

Cooly labour live in own houses.

Power.

38. Steam.

39.

40. Wood, yes.

41. 2 tons per 1,000 gross in addition to waste timber.

42. Rs. 5 per ton delivered factory.

43. No.

Market.

44. No experience.

45. Yes, the smoking habit amongst the working classes of Malabar is increasing.

46—48. No experience.

Competition.

49. Sweden and Japan.

50. Both as far as Swedish matches are concerned on account of superiority of product. Japanese matches usually compete with matches manufactured from indigenous woods.

51. Unable to give information—no experience.

52.

53. (*a*) No.

(*b*) Yes, comparatively.

(*c*) Yes.

54. (*a*) Yes.

(*b*) Yes.

(*c*) Yes.

(*d*) Yes.

(*e*) Yes.

(*f*) No.

(*g*) Yes.

(*h*) Yes.

(*i*) Yes.

55. (*c*) Temporary—until ordinary labour becomes skilled.

(*d*) Temporary—until planted timber becomes available in, say, 12—15 years.

(*e*) So long as import duties on chemicals and paper remain at present levels, otherwise not important.

Equipment.

56. Yes—500 gross per diem.

57. 30 per cent.

58. A description of our present machinery would be worthless as it has been proved unsuitable.

59. (*a*) It is hoped it will be.

(*b*) No useful data available.

60.

61.

Capital Account.

62. As the Company is reconstructing, details would be of no value.

63.

64.

65.

66.

67. (*a*) Rs. 10,00,000.

(*b*) Rs. 10,00,000.

(*c*) Rs. 7,40,125.

All Ordinary.

68.

69.

70. No dividends.

71. No dividends.

72. *Nil.*

73. *Nil.*

74. *Nil.*

Works cost.

75. As the Company has not worked for full year, figures would be worthless.

76.

77. Same as Answer 75.

78. No.

Overhead charges.

79 and 80. No depreciation written off.

81. Rs. 50,000.

82. Yes.

83.

84.

85.

86. No, on account of easily available supplies.

(iii) Agents' Commission and Head Office expenses.

87. Yes.

88. *(i)* No useful information available.

(ii) 2 per cent. on gross sale price of Company's matches.

89.

90

Manufacturers' Profits.

91. 25 per cent. on account of extremely speculative nature of investment.

92. *(a)* 7½ per cent.

(b) 7½ per cent.

93. 20 per cent.

94. Yes.

(a) Yes.

(b) Yes.

(c) Yes.

95. *(a)* Yes.

(b) Yes.

96. The abundant supply of timber and the need of finding use for it to assist extraction of more valuable timbers and to develop systematic working of forests including planting of timbers.

The need of finding employment for labour.

The training of the Indian working classes in the use of machinery, thus enabling them to participate in industrial life generally under good factory conditions.

97. *(a)* Re. 1-8 per gross.

(b) No figures available.

98. The same as at present or greater in view of the progress already made all over India. If the Protective Duty were reduced or abolished, the industry which has been fostered by the imposition of duty would be ruined.

99. No.

The Madras Swadesh Match Works, Madras.

(1) Replies to questionnaire.

1. *(a)* In the latter part of the year 1923.

(b) Private concern.

2. Invested Capital Rs. 20,000. Indian owned. All the employees are Indians.

3. Splints and veneers are prepared in one place with a partner and the finishings are done in another place. All by our own.

4. Commenced in the year 1923.

5. Average output finishing is 40 gross daily.

6. ¾ and full sizes are manufactured. Contents in each box will be about 70 to 80 splints.

7. The average output for the years:—

	Gross.
1924	5,000
1925	7,000
1926	10,000

8. 143 Tiruvatiyore High Road, Washermanpet, Madras, and at Palghat.

(*a*) Somewhat convenient.

(*b*) Somewhat convenient.

(*c*) Best Market.

(*d*) Labourers can be got somewhat easily from the nearer places.

In selecting the site in spite of the above said conveniences the following are also essential:—

It should be near to the forest where the wood is supplied. It should also be nearer to the Railway station.

9. (*a*) Yes. Mainly in respect of splints and veneers which are made of native wood.

(*b*) No such bad remarks are being made by the public as regards our matches are concerned.

(*c*) People will buy the native article at a less price, *i.e.*, if they pay 3 pies for a box of imported matches they pay only 2 pies for the native one.

10. As far as our business is concerned it is not necessary to import wood for the purpose.

11. We generally use Bombax Malabarigam, Palai and Amathali.

12. No. In strength and also in the percentage of wastages in native wood.

13. About 200 to 250 tons per annum.

14. It is impossible to give a definite idea of the quantity required since much wastage takes place specially in this wood.

15. The goods are sold in loose. If necessary cases are purchased here locally. The contents will come to 50 to 60 gross as per size of the case.

16. Supply of wood comes from Davastanam Forest within 10 miles from our factory.

17. The trees are cut down for this purpose only. Plants will grow of their own accord.

18. Charges paid for the same is Rs. 3 to Rs. 4 per candy.

19. The cost of 50 c.ft. comes to Rs. 15 to Rs. 20 delivery at godown.

20. No concession allowed for the same. Have got private licence. The road is not good. If it were so there will be no difficulty.

21. Woods which are cut from sandy places are good and white; and woods which are cut down from hilly places are not so.

22. Sometimes scarcity of wood is felt for number of days together.

23. Almost the same, i.e., Rs. 15 to Rs. 20 per c.ft. delivery at our godown.

24. They grow of their own accord.

25. We are getting the same in carts.

26. The following raw materials are used besides wood :—

(1) Red Phosphorus, (2) Oxide of Zinc, (3) Gum (Glue and Gellatine), (4) Paraffin, (5) Chlorate of Potash, (6) Bichromate of Potash, (7) Manganese Dioxide, (8) Sulphur, (9) Glass powder, (10) Lamp black, (11) Black Sulphide of Antimony, (12) Ferric oxide, (13) Paper for wrapping, (14) Paper for packing.

27.

	Lbs.
No. 1	4
No. 2	2
No. 3	5
No. 4	22
No. 5	35
No. 6	4
No. 7	10
No. 8	5
No. 9	12
No. 10	1
No. 11	3
No. 12	2
No. 13	6
No. 14	2

28. We buy from Calcutta market.

(b) 1	Rs. 20	per cwt.
2	Rs. 99	,, ,,
3	As. 8	,, ,,
4	As. 5	,, ,,
5	Rs. 30	,, ,,
6	Rs. 60	,, ,,
7	Rs. 18	,, ,,
8	Rs. 15	,, ,,
9	Rs. 10	,, ,,
10	Rs. 100	,, ,,
11	Rs. 70	,, ,,
12	Rs. 18	,, ,,
13	As. 8	,, ,,
14	As. 10	,, ,,

29. We do not know
30. No.
31. We can hardly afford to pay for foreign labour.
32. No.
33. We have given quarters to some important persons.
34. 100 persons; 60 are children and female.
35. Within 4 miles.
36. If properly trained Indian labour will become efficient.
37. The labourers make their own housing arrangements.
38. Steam power is used for making materials only.
39. No electric power is used. We do not know.
40. Fuel and wastage of woods are used.
41. We are unable to calculate this.

42. Fuel will be purchased locally according to the fluctuation of the market.

43. We are buying fuel since the wastage of wood is insufficient.

44. We do not know.

45.

46. Locally as well as in Southern parts.

47. Practically no.

48. All our goods are sold at a lesser price.

49. Sweden.

50. No information available.

51.

52. We do not know.

53. This is a question of trade secret it seems.

54. (*a*) Yes.

(*b*) Yes.

(*c*) Our labour is very dear.

(*d*) Yes.

(*e*) Same disadvantage as machinery.

(*f*) Yes.

(*g*) Want of sufficient capital.

(*h*) Yes.

(*i*) Our greatest difficulty.

55. (*a*) Till we manufacture in India.

(*b*) People are trained in the line.

(*c*)

(*d*) Till we get concessions in railways, etc.

(*e*)

(*f*) People are trained in the line.

(*g*) This can be improved if proper steps taken.

(*h*) It is a matter belonging to the Government.

(*i*) This can be improved if proper steps taken.

(*j*)

56. Ours is not so big.

57. 20,000.

58. Splints pealing machine, Choping machine, Box pealing machine, Scoring machine, Cutting apparatus, Frame filling machine, Emptying machine, levelling machine, frames and carriers, etc.

(*a*) All Japan and German make. All were being used from 1925.

(*b*) All in cash.

59. No. We cannot if the present duty is not maintained and an excise at least annas 8 be not imposed on the products of factories in India financed by foreign capital.

(*b*) All the above machines are used.

60. In case if proper protection be got, we have a great desire to extend the line to some extent.

61. Nothing.

62 and 63.

64. We have not allotted any sum for depreciation.

65. We work with our own capital. (For 65 plant and machinery, etc., cost more owing to a rise in the imported one.)

66 to 74.

75. Enclosed herewith.

76 and 77. We are not adopting the same.

78. Unable to anwser.

79. Facts not available.

80. No depreciation amount allotted.

81. Rs. 5,000.

82 and 83. We are to buy on some occasions by 12 per cent. interest.

84. More than ½ the amount.

85. No stock will be stocked; all will be sold then and there.

(*b*) One month after delivery.

86 to 89. Have got agents. Their return commission is 2 per cent.

90 to 93. Our concern is a private one.

94. (*a*), (*b*) and (c) Yes.

95. Yes.

96. Many are unemployed in several districts who are educated even and who are satisfied with small earnings and who are living very cheap. The agriculturists also can work in an industry very cheaply.

97. (*a*) Re. 1-8 per gross on finished matches and Rs. 4-6 on 1 lb. of splints and 6 annas on 1 lb. of veneers of boss.

(*b*) We do not know.

98. The retention of the existing duty on matches.

99. An excise at the rate of at least 8 annas per gross on the goods of factories in India financed by foreign capital.

Facilities should be given to us by the Railway Companies, Steamship Companies, in all possible ways.

---

(2) *Letter, dated the 2nd December 1927.*

In reply to your letter No. 929, dated 28th ultimo, we beg to give you below the statement form duly filled up.

	1924-25	1925-26
	Rs. AS. P.	Rs. AS. P.
1. Cost of wood for splints and veneers	0 6 6	0 6 0
2. Cost of paper for labels and wrapper	0 3 0	0 2 6
3. Cost of chemicals	0 6 0	0 4 0
4. Cost of other raw materials . .	0 6 6	0 5 0
5 to 10. Factory labour, etc. . .	0 7 0	0 4 6
TOTAL .	1 13 0	1 6 0

We are selling the goods at Re. 1-6-0 per gross at present.

Punjab.

The Mahalakshmi Match Factory, Punjab.

(1) Representation, dated 30th December 1926.

With reference to your Press Communiqué, dated 29th November, 1926, regarding the protection of the Match Industry, we beg to submit our views on the subject as follows:—

The three conditions laid down in paragraph 97 of the Report of the Indian Fiscal Commission relating to industries claiming protection are that:—

The three conditions laid down in paragraph 97 of the Indian Fiscal Commission report are satisfied and that the industry should be protected.

(1) The industry must be one possessing natural advantages such as—

(*a*) abundant supply of raw material,

(*b*) cheap power,

(*c*) sufficient supply of labour,

(*d*) large home market.

(2) The industry must be one which without the help of protection either is not likely to develop at all or is not likely to develop so rapidly as is desirable in the interests of the country.

(3) The industry must be one which will eventually be able to face world competition without protection.

(1) Applying these tests to the Match Industry we find with respect to No. (1), "natural advantages."

(*a*) That in Bengal there are very large supplies of suitable wood in Sunderbans. In Assam there is also an ample supply of suitable wood. In Bihar and Orissa according to the report of the Government Expert there is sufficient suitable wood, and a Government Model Factory has been started in Patna. The United Provinces, we know abound in the supply of Simul wood. There are large quantities of Bluepine available in the Punjab and we know that even if the timber is secured at market prices it is possible for the industry to develop. Poplar wood is also to be had in the Punjab and though the results with this timber hitherto have not been very satisfactory, yet with the improvement of the growth of these trees it may be expected to prove a very useful raw material obtainable at comparatively more economic rates. Mango wood is also to be had in the Punjab and its utility as a match wood may be said to have added to its importance in this province. In Madras Forests plenty of suitable match timber is available. In Kashmir there is a plentiful supply of suitable Poplar, Spruce, and Willow wood; and recent experiments and examination have shown that inspite of the disadvantages of distance to rail head, it could be possible to work economically with these timbers.

(*b*) The question of cheapness of power will vary in different provinces, but it may be observed generally that in the existing conditions the cost of power does not handicap the manufacture of matches. In Western India, Tatas have launched upon a large Electrification Scheme and are supplying power at very cheap rates. In the Punjab the Mendi Hydro-Electric Scheme guarantees power at cheap rates, while in Kashmir, electricity for commercial purposes may be had at under 6 pies per unit. Thus with the electrification which is in progress in different parts of the country, power will be available at cheap rates. Moreover, India is a large coal producing country and Burma abounds in Petroleum.

(*c*) As regards the supply of labour, there is no doubt that there is plenty of it in all provinces of India and that the same may be had at low rates. In fact the earning of an Indian is the lowest

in the World. Our experience shows that they are quick at picking up technical knowledge. It is evident that the cost on labour forms a very encouraging factor for the Indian Match Industry when compared with the labour costs in other countries, and with the rise of efficiency it will, after a time form an important factor in enabling Indian Matches to withstand world competition.

(*d*) As to market, it is well known that there is a large home market which is at present in the hands of foreign capitalist manufacturers.

The Industry is one which without the help of protection is not likely to develop at all.

(2) It is abundantly clear from a study of the history of the industrial development of India for the past quarter of a century or so that inspite of various attempts made from time to time the match industry has not been able to develop at all, and it has not been possible for this industry until lately, when the Government of India levied an import duty on foreign manufactured matches imported in India, that the indigenous Indian enterpriser received an appreciable measure of encouragement to attempt developing the industry. The reason for this industry not being developed inspite of the fact that India possesses various kinds of timber suited for match manufacture is also apparent. Foreign countries have been masters of this industry and the trade connected therewith for a long time. They possess very large organization, and facilities both natural and commercial. Their financial resources make it possible for them, after their flourishing existence for scores of years, to reduce their working cost and profits to a minimum which though bringing them only a small return on their capital, ensure to them the control over the world market in which India furnishes a very large field. They are in a position to kill a new venture by even foregoing profits for a time or even drawing on their reserve and losing a little. Indian enterpriser in this industry has therefore naturally to combat against very powerful competitors; and it is therefore evident that unless he has some kind of support and protection from Government in its early stages of development, he has little or no chance of being fit to stand up to this keen competition.

It is an admitted fact that the match industry in India has been stimulated by the Re. 1-8 per gross duty; and that prior to this although various independent ventures were made, they did not meet with any success, and the few that survived existed through sheer perseverance. It is instructive to note that up till 1921 although the match industry had been in existence for over a quarter of a century the manufacture from Indian wood hardly reached 1,500 gross per day; and that too of a very inferior quality as compared, to the imported matches. Subsequent to the imposition of the duty, the manufacture from Indian wood received a steady impetus, and in 1924 25 the figure of production of matches in India rose to about 5,000 gross per day. Considering that there are certain factories under construction, while many are under contemplation, the industry may be fairly claimed to be a progressive one with the help of the duty, which, although it was given effect to only as a revenue measure, has acted simultaneously as a protective measure for the Indian match industry. It is hardly necessary in the peculiar circumstances of the match industry to prove that without the help of protection the industry is not likely to develop. The unsuccessful ventures prior to the levy of the duty and the successful and progressive work subsequent to it prove most conclusively that without the requisite protection the indigenous match industry in India cannot develop and must if left alone, die in a short time.

Appreciable as the effects of the duty were in protecting the growth of the Indian Match Industry, the delay on the part of Government in imposing a special duty on imported match *logs*, inspite of the repeated representations of the indigenous match manufacturers, has not only caused a fall in Government revenue, but has adversely affected the indigenous match manufacture. The duty therefore although it has acted as a protective measure, has not met

the aim and object for its imposition. It has been evaded by the foreign manufacturers by employing clever devices; and consequently the Indian manufacturers who took up the enterprise in right earnest, laying their faith in the protection afforded by the levy of this duty, have had to encounter extreme difficulty and to meet a severe handicap in the actual working of their manufactures.

The industry promises to be one which should be able eventually to face world competition without protection.

(3) To enable the indigenous match manufacturer to ultimately stand foreign competition he must effectively

(*a*) reduce the cost of production, and

(*b*) enable his products to compare favourably with foreign imports.

Considering that the first impetus received by the match industry in India was given only in 1922, a good bit of the last four years has gone in preliminary enquiries, erection of factories, and preliminary arrangements incidental to manufacture and marketing. The cost of Indigenous manufacture is therefore still comparatively high and the finished product less attractive to the market. It is premature to gauge the extent to which cost of manufacture can be reduced and the quality of the finished product improved, though we cannot doubt that with economic and careful work results will be appreciable. It will be instructive to study the handicaps which affect the cost of matches manufactured in India from Indian timbers and to show the prospects that may be anticipated.

(*a*) Chemicals and paper are at present very largely imported owing to the fact that India is not yet producing the paper nor the chemicals for the manufacture of matches. The chemical industry in India has a future before it and we may reasonably hope that the increasing demands of the match industry during its course of proper development will afford an impetus to the manufacture of superior chemicals in India. With the various attempts that are being made to manufacture paper in India on extensive and economic lines, the match industry may expect a certain economy in this item. The development of chemical industries and paper to an extent as to materially help the match industry is, however, a question of time; but we may assume that these will in due course form material factors in determining a competitive cost of Indian matches for world competition.

(*b*) Technical knowledge has to be obtained in the initial stages, at a considerable cost, but with the development of the industry in the country and with training being received by Indians, the expert technical knowledge will be obtainable at a much lower cost. With the experience, which is being gained of Indian conditions as applied to this industry, there is much that can be done to improve and organize the working with a view to economy and efficiency.

(*c*) Labour of which India has more than plentiful, is much cheaper than that available in other countries producing matches. Trained labour is of course essential for efficient and economic working. It is encouraging to note that Indian intelligence receives that training quite quickly.

(*d*) The question of inland tariff for raw material and finished products is one which deserves a careful and sympathetic consideration of the Government of India, and is one which is worthy of being taken up by Government in the interests of the Indian industries. Considering that the development of the match industry in the country, apart from transport of finished products, ensures to railways an additional revenue on account of the transportation of all raw materials incidental to manufacture; the railways by allowing concession freights to encourage the

industry, would be helping their own revenue. There could be a material reduction of cost as soon as concession freights can be had, and a decided encouragement to the manufacturer dealing with Indian timber.

(*e*) Timber which is of primary importance is abundant in India, and there is plenty that can be suitably employed for match manufacture while most of it at present remains unutilized for want of transport facilities. This is a severe handicap under which the Indian Match enterpriser is labouring at present.

It will be observed that although the question of obtaining timber at present at prices economic enough to withstand world competition is a difficult one, yet the difficulty is not such as to be unsurmountable. There is, however, another important feature connected with the cost of this raw material required for the manufacture of matches. In India the match enterpriser has to purchase it mostly from Government forests and in small quantities from third parties, and in both cases the suppliers of raw material have no direct interest in the development of the industry and consequently no serious effort is made to reduce the cost to a possible minimum.

We believe it should be practicable within a reasonable time to co-ordinate the interests of Government and other timber suppliers, with those of the match manufacture to an extent as will ensure—

(*a*) the improvement of the growth of suitable species;

(*b*) the manipulation of supplies to give timber in its most suitable condition;

(*c*) the reduction of extraction costs to a possible minimum.

In view of considerations such as these it will be clear that although the match industry in India has every prospect of being able in course of time to face world competition, it is premature at present to calculate with any precision the time this would take. Much depends upon the progress that can be made in the next five years.

सत्यमेव जयते

(B)

From a study of the figures given below :—

Year.	Government Revenue in lakhs.	Matches imported in grosses.	Matches in terms of daily production grosses.	Value in rupees.	Splints. lbs.	Value rupees.	Veneer. lbs.	Value rupees.
1921-22	103	13,680,801	45,602	2,03,80,469	...	...	...	...
1922-23	154	11,285,740	37,619	1,61,80,658	...	...	...	...
1923-24	138	11,243,745	37,479	1,45,91,813	...	...	...	...
1924-25	126	7,264,785	24,215	88,88,611	967,305	1,95,413	2,780,063	10,08,935
1925-26	118	7,928,522	26,428	93,45,036	25,521	4,809	1,128,751	3,86,910

We observe that since the duty of Re. 1-8 per gross was levied on matches, the import of finished matches began to fall. The decline of revenue was noticed in the financial year 1923-24 and to counterbalance the decreased revenue the import of splints and veneers in place of the finished matches that accounted for the drop was also taxed. In the year 1924-25 there was a large import of splints and veneer and presumably years also. But in 1925-26 a decided fall in the import of splints and veneer was noticeable which undoubtedly indicated an extensive import of match logs.

It is apparent that the first attempt to avoid the import duty consisted in replacing finished matches with splints and veneer, and when the latter were also included in the schedule of special duty, a fresh device was found to evade the duty by the importation of match logs, which has increased by leaps and bounds in the two years 1924-25 and 1925-26. It would be in keeping with the policy adopted by the Government of India in 1924, if they were to impose a special duty on match logs also to safeguard the interests of their revenue.

The fall in Government revenue may be attributed to—

(1) the growth of the match industry based on Indian timber,

(2) evasion of the duty by importation of match logs.

The former as a matter of fact, if at all, can account only for a very small portion of the decrease, while the latter is mainly responsible. If a special duty had been levied as was suggested at the time by the indigenous manufacturers Government would have been saved, we venture to observe, the loss of revenue. We therefore strongly urge the expediency of taxing imported match logs further, in addition to the existing *ad valorem* duty.

Another reason for the fall in Revenue is the suspected abuse of the right of transhipment of Native States. Matches are being imported to some of the Native States through their ports in a much larger quantity than the actual demand of those States and the excess quantities are sent to towns in British Territory a long way off from those States avoiding the custom duty legitimately due to the British Government.

(C)

The vested interests created as a result of this duty.

(*a*) Considerable capital has been sunk in the match industry during the last five years or so. We are alive to the fact that large investments have been made in this direction by the Swedish American Trust who control important match factories in different parts of the world and are therefore keenly interested in importing foreign matches into India. They are essentially out in India with a view to avoid the Re. 1-8 duty and to exploit the country to their own advantage. We cannot for a moment conceive that the Government of India will tolerate the idea of exploitation of the country by the foreigners who are anxious in their own interests to kill the prospects of an indigenous Indian industry and are capable of bearing substantial temporary loss to ensure their ultimate gain. It would be a great catastrophy both for the ultimate revenue to Government and for the industrial benefits that could accrue to the people of India. We do not therefore consider that the investments contracted in India by foreign enterprisers, as opposed to the Indian interests, deserve any protective consideration whatsoever. At their best, the foreign investments were a gamble undertaken to ensure the ruination of India's indigenous interests and should therefore be treated as such.

(*b*) There are however certain Indian firms and individuals who have hitherto developed a business with the use of foreign timber. We however consider that every inducement and facility should be offered to such Indian firms and individuals to employ their enterprise in the interests of Indian timber by which measure a substantial impetus will be afforded to the indigenous industry and a consequential gain to the Forest and Railway Revenue, and to a large amount of labour that could be employed on works preceding the actual manufacture in a factory.

(*c*) In addition to the factories already in existence and actually working with the Indian timber there are many fresh ventures either under construction, or contemplation. We have no doubt whatsoever that in addition to large investments actually made on these constructions considerable sums of money have been spent by Indian enterprisers on preliminary investigations and enquiries.

(*d*) There has been a decided gain to the Indian Railway owing to the establishment of match factories using Indian wood. Factories based on imported wood, to thrive, must be located on or near seaports, and hence no freight on carriage of Match Timber, Chemicals, Paper, Fuel, and other imported stores, can normally accrue to the Railways from them. Factories using Indian timber must invariably be situated inland, and thus to ensure the delivery of various materials incidental to manufacture a decided Revenue accrues to the railway. With the growth of factories using indigenous timber the increased railway revenue will become an appreciable vested interest.

(*e*) With the increase in the requirements of timber there is bound to be an increase in the labour employed on its extraction, and with the propagation of suitable species of match wood and their extraction, the increased employment of labour will be a material factor for consideration. Every endeavour is being made in various quarters to place on the market at economic rates timbers which are suitable for match manufacture. We understand that there are in Northern India extensive plantations of suitable timbers in hand which in the course of 10 to 15 years would, it is hoped, be able to furnish timber of very superior quality to manufacture about 10,000 gross of matches a day. Undertakings of this kind will doubtless follow in quick succession in other provinces if only the Indian enterpriser has the guarantee of protection to see him successfully through the period of experiment and development.

(*f*) With the fixation of the Re. 1-8 duty in the normal course there should have been a tendency for the market rates to have risen. It is the Indian manufacturer that has ensured a further decrease in the price and has ensured to the consumer the rate of 3 pies per box. He has thus materially safeguarded the interests of the consumer, which can by no means be considered to be a negligible factor in the interests of the country.

(D)

Whether the loss in revenue can be made up by other appropriate form of taxation of the industry.

We have discussed in a previous paragraph the difficulty under which the present Indian manufacturer is labouring in selling his goods against those imported or manufactured with imported logs. It will not be out of place to mention here that the actual fall of revenue due to the import duty is not so high as it appears to be. Match manufacture in India has increased the import of Chemicals. Papers, and Wood, etc., and has increased the consumption of wood from Government forests. The increased revenue on these heads considered along with its apparent fall on matches would show the figure much less. We do not consider it would in the circumstances be at all desirable or justifiable, at such a stage, to contemplate the taxation of the indigenous match industry with a view to make up the actual shortage of Government revenue. If our suggestions summarized at the close are agreed to, the Government will not only be safeguarding its own revenue, but very largely protecting the interests of the consumer. In the circumstances we consider that the question of taxing the indigenous industry does not arise.

It is an acknowledged fact that matches are more or less an indispensible necessity of life, and the match industry is of great economic importance, if India is to be self-contained. We are aware that with the expansion of the indigenous industry, there can be no danger of an undue rise in prices, as competitive conditions within the country will contribute to regulate the minimum price.

In addition to this, there is the important question of India being developed to be self-contained and self-dependent within the Empire. Want for this was prominently felt during the great war, and if on any grounds Great Britain is ever hereafter drawn into war with the match producing countries or there is any disturbance in the waters separating India from the foreign countries manufacturing matches, the condition of India would be pitiable, unless she has developed her indigenous resources and is self-contained. We believe it should be accepted as a principle that where the questions of the economic development of the internal resources of the Empire are concerned, and the conditions for the development of an industry are not unfavourable, the industry should as far as possible be adequately protected. There can be no gainsaying the fact that the indigenous match industry is decidedly one which comes under this category, and consequently any proposal for taxing it would be most detrimental to the interests of the country and the Empire.

The conclusions arrived at may be summed up thus:—

1. That the three conditions laid down in paragraph 97 of the Indian Fiscal Commission Report are satisfied in regard to the match industry and that the industry should be protected.
2. That the custom duty imposed at present on imported, finished matches, splints, and veneers, should be converted into a protective duty on the same scale.
3. That a suitable protective duty should be imposed on imported match logs.
4. That a suitable excise duty of not less than 8 annas per gross should be imposed on the production of factories of which three-fourths of the capital and Directors are not Indian.
5. That any fresh tax levied on the manufacturers using indigenous timber would be ruinous in the interests of the country.
6. That suitable measures should be adopted for increased facilities for Railway and Steamer transport of Indian match wood throughout the country.
7. That the import of foreign matches through Native States by transhipment methods requires very careful examination.

Mahalakshmi Match Factory, Shahdara, Punjab.

(2) *Letter dated the 4th April 1927.*

With reference to your letter No. 209, dated the 7th March 1927, we are herewith forwarding our replies to the questionnaire on the Match Industry.

Answers to questionnaire.

INTRODUCTORY.

1. Our match factory started working in March 1925. It is a private unregistered concern.

2. The concern is entirely Indian and is owned by Sir Daya Kishna Kaul Sons & Co. There is only one European employee, *viz.*, the Engineer.

3. The factory covers the whole process of manufacture from making splints and veneers to finishing of match boxes.

4. On the 11th March 1925.

5. 1,000 gross a day of finished match boxes.

6. The dimensions of our match boxes are:—

Length	53 m.m.
Breadth	37½ ,,
Height	17 ,,

and the size is the standard ¾ size. The average number of matches in each box is 60 (sixty).

7. We have only worked for two years and our output has been :—

In 1925-26	1,00,405	gross.
In 1926-27	1,80,478	,,
Total for 1925-27	2,80,883	,,

8. Our factory is situated at Shahdara (N. W. Railway) at a distance of 5 miles from Lahore.

(*a*) As regards vicinity to principal raw materials, it is centrally well situated, can draw timber from three important timber depôts and is itself located on the Ravi River. Under the present conditions it is the most suitable site in our opinion, but as exploitation of forests develops, it may be possible to go nearer the sources of timber supply.

(*b*) We are at a disadvantage as regards coal for steam purposes, but in our boiler we use about 25 per cent. coal and 75 per cent. of our own wood refuse. Crude oil is obtained at economic rates and electricity should soon be available at cheap rates.

(*c*) The factory is placed in the centre of the Punjab which is a large enough market. Shahdara adjoins Lahore which is the most important commercial centre in the Punjab. Moreover Amritsar, Gujranwala, Lyallpur, Ferozepur and Jullundur, all important centres in the Punjab, are within a radius of 40 to 100 miles from Shahdara.

(*d*) Labour supply is abundant and can be secured locally. From all point of view we consider Shahdara a suitable place for the Factory.

The most important factors in selecting a site are :—

(1) Suitability as regards the economic supply of suitable timber.

(2) Facilities for distribution of the manufactured product in the area which forms the market.

9. (*a*) Splints manufactured by us from wood, at present obtained are slightly darker than those of Swedish import, otherwise the general finish of our matches is claimed to be as good as that of the imported Swedish matches.

(*b*) Yes. There appears to be some prejudice on the score of colour against Indian matches in particular markets and with certain classes of buyers.

(*c*) The Swedish matches are selling at 6 pies and 4½ pies a box while we place our matches on the market at 3 pies a box. This we think represents a fair measurement of the difference due to colour and should be sufficient to overcome the prejudice against Indian matches.

10. No.

11.

Botanical names of wood.

Blue Pine	Pinus excelsa.
Simul	Bombax Malabaricum.
Provincial Poplar	Populus Cuphratica.
Silver Fir	Abies Webbiana.
Spruce	Picea Morinda.
Mango	Magnifera Indica.

We do not wish to state which wood we use for each purpose.

12. We have found Indian wood quite satisfactory for all three purposes. The only difference is in the colour of splints.

13. Our annual requirements of wood are:—

1. *Present rate of output 800 gross daily.*

	c.ft.
(*a*) Matchwood 285×300	85,500
(*b*) For packing cases	13,200
TOTAL .	98,700

2. *Full capacity 1,000 gross daily.*

(*a*) Matchwood 360×300	1,08,000
(*b*) For packing cases	16,500
TOTAL .	1,24,500

14. It is difficult to answer this question until proper experiment is made with suitable wood delivered under suitable conditions, as the condition of wood makes very great difference in the outturn of finished matches from it. Our results, however, with wood purchased in different conditions, generally unfavourable in the open market, give 35·7 c.ft. to 100 gross of boxes of finished matches.

15. Measurements of the packing case are on the inner side 33″×21″×24″. One packing case requires 1·9 c.ft. sawn planks and 2·75 c.ft. in logs. Each case takes 50 gross of match boxes.

16. Wood is available at

	Distance from Factory.
1. Shahdara on the Ravi	1 mile.
2. Dhilwan, N. W. Railway	66 miles.
3. Jhelum, N. W. Railway	98 miles.
4. Ghazighat, N. W. Railway	235 miles.
5. Wazirabad, N. W. Railway	58 miles.
6. Areas in United Provinces	300 miles appr.

A rough sketch is enclosed as desired, Appendix 2.*

17. We have been buying timber from the forest sales depôts which are on the various rivers of the Punjab on railway lines.

18. We have so far been purchasing in the open market.

19. We have not so far obtained any wood on royalty basis at all.

20. We hold no concession so far, and the position therefore is very unfavourable. What is required is for the Forest Department to try and work down match timber from their forests by special arrangement and at an economic cost.

21. The supply of wood has not been constant in respect of quality. The class of wood being the same, exposure to water and heat make very great difference in its economic value for match manufacture. Wood, which is exposed to heat and is cracked or such as has bad knots, automatically depreciates in its utility for manufacture. As far as the supply from the forests is concerned, wood suitable for matches has not so far been exploited exclusively for match manufacture.

22. The supply of wood has not been constant in respect of quantity. We have to purchase it as it becomes available. Sometimes when suitable wood

* Not printed.

is not available from Forest Depôts at economic rates we have to purchase in the open market far or near. So long as a sufficient supply keeps coming in from the forests, there is no roof for shortage. The Forest outturn is not affected by our requirements.

23. Such contingency has not arisen so far.

24. Yes. But the same quantity could be brought down at much cheaper cost. Steps are being taken by the Forest Department to experiment with plantation of suitable matchwood in their plantation areas.

25. No such concession is at present received and this is a great disadvantage for purposes of competition with imported matches. Concession freights for matchwood prevail on other Railways, but none are allowed yet by the North Western Railway.

26. The raw materials other than wood are given below with annual requirements.

1. Paper	1,35,000 lbs. per annum.
2. Chemicals	1,36,000 lbs. per annum
3. Glues and gums, etc.	14,000 lbs. per annum.
27. Paper	45 lbs.
Chemicals, etc.	50 lbs.

28. All the above materials are at present imported from abroad.

Statement of imported articles with particulars required is attached as Appendix 1. We beg that the information may be treated as confidential and not printed or published.

29. (*a*) Paper	All kinds.
Chemicals	All except Sulphur.
Glue, etc.	All kinds.

(*b*) There seems to be no insuperable difficulty in the manufacture of the paper required. We have not studied the manufacture of chemicals and cannot say if any particular chemical will be difficult to manufacture.

Labour.

30. No.

31. It is only necessary to employ a skilled Engineer from outside the country till such time as technically trained man capable of supervising the working of the machinery become available in the country.

32. No imported labourers are employed.

33. Imported labour was never employed. Indian labour is trained in the factory and every facility is offered to new hands to learn work.

34. Average daily labour employed in *1925*, 105 men, 43 boys.

Average daily labour employed in *1926*, 116 men, 51 boys

No women have been employed so far.

Average wages are:—

1. Men annas 12 to annas 13 per day.

2. Boys full timers over 15 years of age, Rs. 15 to Rs. 16-8 per mensem.

3. Boys half timers from 12 to 15 years of age, Rs. 8 to Rs. 9 per mensem.

35. Yes, from the vicinity of the factory.

36. We find that Indian labour improves with training. We have a record which shows the improvement.

37. Accommodation in paka quarters is provided for about 60 labourers, the remaining come from the neighbouring villages and from the city of

Lahore. Those who live at the factory are properly looked after as regards health, sanitation and hygiene.

Power.

38. The power is derived from crude oil.

39. Electric power is not used.

40. Steam power is not used for driving the machines. Steam is used for drying purposes. The fuel employed for generating steam is coal and principally timber waste. The latter is available in more than sufficient quantities.

41. We have not so far been able to determine correctly the quantity of fuel required per unit of output.

42.

	Distance miles.	Price f.o.r. colliery.	Transport cost.	TOTAL.
Coal . . .	1,025	Rs. 5-6-0 per ton.	Rs. 12-0-0	Rs. 17-8-0 per ton.
Crude oil . . .		...	...	Rs. 120-0-0 per ton at Shahdara.

43. Waste wood meets a large part of the fuel requirements but not completely. We have no concession for fuel from Government.

Market.

44. Total Indian demand may be gauged from the figure of imports in 1921-22 which was 1,36,80,801 gross of match boxes. Allowing for local production which was comparatively small at that time the total annual demand may be put roughly at 1,50,00,000 gross.

45. Yes, the demand is likely to increase but only gradually.

Reasons:—

1. Increasing facilities of communication,
2. Effects of the spread of modern civilization, and
3. Increased substitution of cigarette and cigar smoking for the Hukka.

46. Our markets are the Punjab and adjacent States, North-West Frontier Province, Sind and Baluchistan. The factory is situated at Shahdara, North Western Railway (near Lahore) which is central for these areas.

47. The markets most favourably placed for us with regard to foreign competition are the Punjab and places north and west of it. The daily demand in this area is over 3,000 gross.

48. (*a*) In the area which constitutes the market for our matches, there is no market served exclusively by imported matches.

(*b*) We have reason to believe that a certain amount of illicit importation of matches into British India does take place through some of the Indian State ports. But we are unable to adduce any proof of it.

Competition.

49. In the Indian markets competition is keenest from Swedish made matches and those made by the Swedish Combine in India marked (Wimco) as also from Japan made matches.

50. We venture to point out that the question should have been put the other way round. We think that a duty of Rs. 1-8 per gross on imported matches just enables the matches made from indigenous woods to compete

with imported matches. Any reduction in such duty is bound to severely handicap the former.

As to matches manufactured from imported woods, they may be divided into two classes, *viz.*:—

(1) Concern backed by foreign Capital, and

(2) those run by Indian Capital.

Both the classes owe their existence to evasion of the import duty on matches by importing matchwood which is liable to a much lighter customs duty. The matches manufactured from indigenous woods have to compete not only with imported matches, but also with these two classes of local manufacture. Class 1 being financially much stronger, class 2 is bound to die a natural death. The competition with No. 1 is on the other hand more serious under present conditions than that with imported matches. It is only by taxing imported matchwood adequately besides maintaining the duty on imported matches and making the duty on imported splints and veneers proportionate thereto that the indigenous match manufacture can be enabled to develop to the present and ultimate benefit of the local consumer who gets the indigenous matches at the cheapest price.

51. We came into the field in 1925 and the following are the wholesale prices from that year onwards:—

The prices having varied from time to time, the minimum and maximum figures are given for each of the two years.

	1925-26.							1926-27.						
	Rs.	A.	P.		Rs.	A.	P.	Rs.	A.	P.		Rs.	A.	P.
Size $\frac{3}{4}$ (*i*) imported matches	2	7	6	to	2	11	0	2	6	0	to	2	9	0
Size $\frac{3}{4}$ (*ii*) our Indian wood matches . . .	1	11	0	to	2	0	0	1	6	0	to	1	8	0
Size $\frac{1}{2}$ (*iii*) imported wood matches . . .	1	12	0	to	2	0	0	1	2	6	to	1	7	0

The f.o.b. prices in sterling for imported matches are not available with us nor the c.i.f. prices.

52. It should be possible to obtain information relating to the prices at which imported matches enter India from wholesale dealers at port towns, from the Indian agents of foreign companies such as Forbes, Forbes Campbell & Co., and from the Customs authorities.

53. We have no information as regards the prices of foreign matches in their respective countries, but for the following reasons we believe that the prices at which foreign matches are sold in India must be unremunerative to the producers if they do not actually involve a loss. It is a well-known fact that sale price of matches in Europe for similar quality and size is considerably higher than those which prevail in India. The reason is evident. The manufacturer of safety matches which at one time was Sweeden's exclusive monopoly has of recent years sprung up in other countries as well. But most of the important factories in Europe now form part of a powerful combine in one form or another so as to preclude competition. This combine known as Swedish combine has to fight against Japanese manufactured matches and the attempts at indigenous manufacture. For this purpose the prices have naturally had to be cut down to a very low figure and a powerful combine like that can well afford to bear a small loss on the Indian sales which can be recouped from the large profits which they derive from their world trade. It is evident that the manufacturers of foreign matches do not get more than Re. 1 per gross for their goods delivered in India after deducting Rs. 1-8 on account of the import duty. This figure is remarkably lower than what the foreign manufacturers got before the enhancement of the import duty. Allowing for freight charges, the net factory return on present sales must be

much lower than Re. 1 per gross. Unless therefore the foreign manufacturers were making fabulous profits before the enhancement of the duty, the present return cannot be considered remunerative. In any case the profits, if any, must be merely nominal. On the contrary it stands to reason that the Swedish combine are adhering to their present sale prices, even at a loss, in order to kill indigenous enterprise and to oust Japanese production from the market.

Working with imported logs has provided a loop hole for them to make some small profits on the one hand and to undersell the matches manufactured from indigenous woods on the other, with a view to gain the ultimate and of securing a monopoly of India's trade in matches. We therefore consider that a careful enquiry into the actual working cost of foreign manufacturers is essential from the Indian standpoint, and that therefore attempts made by foreign manufacturers and foreign capital working in India with imported woods to strangle the growth of the Indian industry should be carefully safeguarded.

54. This question requires to be divided into two parts:—

1. The Indian manufacturer as compared with the foreign manufacturer making matches in India with foreign wood.
2. The Indian manufacturer as compared with the foreign manufacturer making matches outside India.

In Case No. 1 the conditions for both are more or less the same under (*a*), (*b*), (*c*), (*d*), (*e*), (*f*), (*g*), (*h*).

Under (*i*) Indian capital bears a higher rate of interest.

In case No. 2.

(*a*) The Indian manufacturer is at a distinct disadvantage.

(*b*) and (*c*) Both these are temporary disadvantages, and it is hoped that the Indian manufacturer will overcome these within a few years by steady work, and with the growth of match manufacture in the country.

(*d*) To the Indian manufacturer the collection and transport of raw materials is at present a great disadvantage owing to the high railway tariff and lack of interest on the part of forest owners (*viz.*, Government) in co-operating to develop the industry.

(*e*) *Cost of stores* involves a disadvantage to the Indian manufacturer which may last longer.

(*f*) We have no concession freight at present on the North Western Railway. On the contrary we understand that imported matches enjoy the concession of specially low freights for railway transport from sea-ports. We are therefore at a distinct disadvantage.

(*g*) The Indian manufacturer is at a disadvantage as spare parts are not manufactured in India. As for wood the foreign manufacturers have a better control over their own sources of wood supply, while in India it will take some time for the Indian manufacturer to regulate and control the supply of Indian match timbers.

(*h*) Customs duty on imported materials other than woods is a distinct disadvantage to the Indian manufacturer and a reduction competible with the expected growth of the industry is a question which deserves the consideration of the Government of India.

(*i*) Capital in India is not difficult to raise, but the higher rate of interest prevailing at present in the country is a disadvantage.

55. It will be observed that case 1 of our answer to Question 54 does not require consideration. Our replies below therefore relate to case 2 dealt with in answer 54.

(*a*), (*e*) and a part of (*g*) relative to spare parts, are permanent disadvantages so long as machinery, spare parts, papers and chemicals are not manu-

factured in India. (*b*) and (*c*) are temporary disadvantages which should be overcome in another five years of steady growth. The disadvantage under (*d*) in respect of the collection and transport of raw materials should be considered temporary as this can be overcome with the help of Government and by employment of suitable device.

Regarding (*f*), *i.e.*, freights on finished goods, we hope that with the help of Government this will only be temporary disadvantage to Indian manufacturers using Indian wood.

(*h*) It might be considered temporary, if Government wish to help and promote the industry.

(*i*) This is a serious and permanent disadvantage as the interest bearing power of capital in India is much higher and this is bound to continue so long as the fiscal condition of the country remains what it is at present.

Equipment.

56. Yes, our factory is. We consider 500 gross to be the smallest unit of economic production.

57. Our total cost of plant and machinery works to about 60 per cent. of the total capital outlay.

58. (*a*) We have a full set of machinery for complete process of manufacture of 1,000 gross daily, supplied by Germany, and the entire machinery has been in work since March 1925.

(*b*) Our machinery has been purchased in the ordinary course and with no special arrangement.

59. (*a*) Yes, our machinery and equipment are absolutely up to date and of the latest European type.

(*b*) All our processes are carried out by machinery.

60. Yes, if conditions of taxation and market admit.

61. No parts of the machinery used by us are at present made in India.

Capital Account.

62. The Block Capital value of our property on 31st March 1926, was:—

	Without depreciation.	After depreciation.
(*a*) Leases and concessions	...	...
(*b*) Lands	...	...
(*c*) Buildings	84,096	81,153
(*d*) Plant and machinery	1,49,581	1,34,623
(*e*) Other miscellaneous assets	8,131	7,282
	2,41,808	2,23,058

63. The figures with and without depreciation as made out by us have been given above. But the depreciation figures are under discussion with the income-tax authorities who are not prepared to allow more than the scheduled 6¼ per cent. depreciation on match machinery, while we have charged 10 per cent.

64. In the case of match machinery, the depreciation put down by us is higher than that allowed by the income-tax authorities as we consider that a higher rate of depreciation is necessary in the preliminary stages owing to

considerable experimental work with difficult timber which effects the life of the machinery.

65. Our cost of erecting the factory to-day under the Head Buildings would be nearly the same for similar accommodation and of similar type.

The cost under plant and machinery would vary according to the prices which prevail at the time the order is placed. The prices had fallen last year, but the present quotations are again 12 to 24 per cent. higher than our cost.

The difference in operating cost would be small.

66. Our machinery was purchased in one batch in the years 1923-25, and the value has already been given above. The rate of exchange for our entire purchase was 1*s.* 4¾*d.*

67. Our is a private concern.

68. The same as above.

69. The same as above.

70. The same as above.

71. The same as above.

72. The same as above.

73. No reserve fund is maintained separately, this being a private owned factory.

74. Funds for extension or replacement would be provided by the proprietors according to requirements.

Works costs.

75. Apart from the undesirability of disclosing the details of our works costs, it is very difficult to give definite figures as the price of materials required for the manufacture keep varying. But the average for the period during which our factory has worked comes to nearly Re. 1-6 per gross of match boxes.

76. The works costs for the past two years are perhaps higher than what they would have been if our factory had worked all throughout its full capacity.

77. No.

78. No.

सत्यमेव जयते

OVERHEAD CHARGES.

(*i*) *Depreciation.*

79. The rates of depreciation allowed by the income-tax authorities are given below:—

Paka buildings	2½ to 5 per cent.
Boilers and engines	5 per cent.
Match machinery	6¼ per cent.

There is not much dispute over items other than that for match machinery. The life of match machinery is estimated by Income-Tax Officers at 16 years. This we believe is too long a life for machinery which has to bear the brunt of experimental work with various Indian timbers.

Eventually as things settle down, and suitable timber in suitable condition is obtained, the wear and tear on the machines would be less. For the present we hold that in the initial stages, *i.e.*, for 1st ten years at least 10 per cent. depreciation should be allowed or match machinery dealing with Indian timber.

80. At income-tax rates the depreciation on Block Capital would be approximately: —

	Rs.		Rs.
(*a*) Buildings	84,096	@ 3½ %	2,943
(*b*) Match machinery	1,20,640	@ 6½ %	7,540
(*c*) Other plant and machinery . .	28,941	@ 5 %	1,447
(*d*) Miscellaneous assets . . .	8,131	@ 5 %	406
	2,41,808		12,336

(*b*) Since the machinery came into use only in 1925, there is not much difference in the amount required for depreciation in our case.

(ii) Working Capital.

81. The Working Capital required according to present output is Rs. 1,20,000 and according to full capacity Rs. 1,50,000.

82. Already answered under 74.

83. Money borrowed in the market carries generally from 8 per cent. to 10 per cent. interest.

84. Cannot answer for reasons given under 77.

85. At present we have no stock of finished goods, but at times we have on our hands two to three months finished production. The period between production and payment is one to two months.

86. We have to hold large stocks of raw material but not of coal. The value of stocks thus held ranges from Rs. 80,000 to Rs. 90,000.

(iii) Agents commission and Head Office expenses.

87, 88, 89 and 90. The questions apparently pertain to companies and therefore do not relate to us.

Manufacturers' profits.

91. In the case of a limited company we are inclined to think that at least 10 per cent. dividend would be a fair return.

92. Question does not apply to us.

93. Same as above.

Claim for protection.

94. We consider that the three conditions laid down in paragraph 97 of the Report of the Fiscal Commission for industries claiming protection are satisfied in the case of the match industry.

(A) We do claim that the industry possesses natural advantage such as an abundant supply of raw materials, cheap power, a sufficient supply of labour and a large home market.

(B) We do claim that without the help of protection the industry is not likely to develop at all or is not likely to develop so rapid as is desirable in the interests of the country.

(C) We do claim that the industry will eventually be able to face a fair world competition without protection.

We have explained our reasons fully in our joint representation dated the 30th December 1926, printed copies of which are attached for ready reference (*vide* pages 2 to 6). We also enclose the view of the Northern India Chamber of Commerce on the subject. Appendices 3 and 4.*

* Printed separately.

95. We claim that the match industry satisfies both of the conditions mentioned in paragraph 98 of the Fiscal Commission Report, *viz.*:—

(*a*) That the industry is one in which the advantages of large scale production can be achieved, and that increasing output would mean increasing economy of production.

(*b*) That we feel hopeful that if proper protection and encouragement are afforded, the entire need of the country could be supplied by home production in a few years.

96. Yes, the match industry is peculiarly suitable to Indian economic conditions as :—

(*a*) it suits the Indian labour admirably as the work is of a light nature and the machinery is not too complicated to handle. The labour is moreover cheap and plentiful,

(*b*) the country possesses large possibilities in the line of manufacture of paper and chemicals, and the match industry will stimulate these,

(*c*) the country is very fertile, and many waste areas exist, which could be advantageously utilised for plantation of suitable matchwood,

(*d*) the general poverty of India calls for fresh avenues of employment and wage earning, and

(*e*) India has a distinct advantage over other countries manufacturing matches inasmuch as it can export more economically to countries which adjoin India and which are geographically placed at economically prohibitive distance from sea-ports.

97. (*a*) The existing customs duty is :—

Finished matches	Rs. 1-8-0 per gross.
Splints	Re. 0-4-6 per lb.
Veneers	Re. 0-6-0 per lb.

(*b*) We do not at present possess correct information regarding (*b*).

98. It is extremely difficult to gauge with accuracy the exact amount of protection that is necessary. The Indian industry is in a stage of transition and experiment. The results hitherto have been encouraging, but the working conditions are necessarily fluctuating. It is difficult to foresee with accuracy the future trend of conditions of sale and of other economic factor. There has been a systematic and continuous decline in sale prices of imported matches and of matches manufactured in India with imported woods by foreign companies. To what extent the foreign companies will carry on their present policy of working even at a loss to ultimately secure the entire Indian market remains to be seen.

The present duty of Re. 1-8 per gross on imported matches has no doubt handicapped the foreign manufacturer but it has stimulated Indian manufacture. The evasion of duty by importing logs has alone been helping them to produce their matches in India at a comparative cheaper cost and thus to kill the indigenous enterprise. We therefore think that for the present the rate of Re. 1-8 per gross on imported matches and a proportionate duty on imported splints, veneers and match logs should be levied to furnish the necessary protection.

99. In addition to the protective duty suggested by us we recommend the following forms of assistance being rendered by or through Government :—

(*a*) Cheapening the cost of wood.

(*b*) Encouraging and developing the cheap manufacture of chemicals and paper in India.

(*c*) Special concession rates of railway freight for match factories using indigenous timber should be given for all raw materials imported or transported inland.

(*d*) Special rates should be allowed for transport of finished matches manufactured from indigenous wood to sale markets in India and to principal sea-ports.

APPENDIX I.

Name of Articles.	Country of origin.	Price in Sterling c.i.f. Karachi.	Handling charges in Rupees.	Transport charges to Factory per Maund Rupees.
Inside boxes paper .	Germany	27 10 0 Kg.	20 4 0 Kg.	1 11 1
Outside boxes paper .	Germany	27 10 0 Kg.	20 4 0 Kg.	1 11 1
Half dozen packet-paper	Germany	16 5 0 Kg.	9 4 0 Kg.	1 11 1
Half gross packet paper.	Germany	34 0 0 Kg.	22 12 0 Kg.	1 11 1
Oil paper . .	Germany	0 5 5 per cent. metre.	0 1 10 per cent. Mr.	4 2 4
Phosphate of amonia	Belgium	46 0 0 per ton.	17 8 0 per ton.	4 2 4
Amorphous Phosphorus.	Norway	221 0 0 per ton.	47 8 0 per ton.	4 15 8
Black Antimony .	Germany	56 10 0 Kg.	24 0 0 Kg.	4 2 4
Red Lead . .	Germany	40 10 0 Kg.	6 5 0 Kg.	2 8 1
Peroxide of Manganese	Germany	28 0 0 Kg.	10 14 0 Kg.	4 2 4
Ferric Oxide . .	U. K.	23 0 0 Kg.	10 14 0 Kg.	4 2 11
Chlorate of Potash .	Germany	33 10 0 per ton.	6 5 0 per ton.	4 15 6
Bichromate of Potash	U. K.	50 0 0 Kg.	27 0 0 Kg.	2 7 9
Sulphur . . .	Germany	13 10 0 Kg.	15 0 0 Kg.	2 5 3
Glass Powder . .	Germany	7 8 0 Kg.	5 6 0 Kg.	2 7 9
Paraffin Wax . .	U. S. A.	36 0 0 per ton.	9 10 0 per ton.	3 5 1
Potato Starch . .	Holland	22 16 8 Kg.	5 9 0 Kg.	2 7 9
Dextrine . . .	Holland	29 15 0 per ton.	6 2 0 per ton.	4 2 11
Glue . . .	Germany	57 0 0 Kg.	5 10 0 Kg.	2 7 9
Gum Arabicum .	Germany	55 10 0 Kg.	6 2 0 Kg.	1 11 1
Gum Tragacanth .	Germany	177 10 0 Kg.	7 0 6 Kg.	1 11 1
Gun Accroides .	Germany	19 19 8 Kg.	6 5 0 Kg.	4 2 4

NOTE :—

(1) Kg. = per 1000 Kilograms.

(2) Customs duty in each case is 15 per cent., except for Sulphur which is duty free.

(3) *Letter, dated the 14th December 1927.*

We beg to acknowledge receipt of your letter No. 929, dated the 28th November 1927, asking us to send our works costs on form II.

Owing to the wide fluctuations in our working conditions and the difficulties involved in the preliminary stages of work, we have not been able to maintain a costing account. In our replies to your questionnaire we stated that our works cost may be taken at about Re. 1-6 per gross. We had arrived at this figure by broad calculation. Since receiving your letter under reply, we have attempted to prepare average figures for the two financial years 1925-26 and 1926-27 classified under the heads indicated in your Form II.

The results will appear as given in Form II attached from which it will appear that the average works cost for the last two financial years comes to Re. 1-5-4½ per gross. This is very near our broad calculation of Re. 1-6 per gross. This cost figure does not include interest and depreciation.

We are not able to give you our latest figures as we have yet to prepare these at the close of this financial year and we would not like to venture a calculation which may be misleading.

We are obliged for your kind assurance that our figures will be treated as confidential and will not be published unless we consent to such a course.

FORM II.—*Statement showing works cost per gross of matches for the two financial years 1925-26 and 1926-27.*

	Average for two years.
	Rs. as. p.
1. Cost of wood for splints and veneers . .	0 5 11½
2. Cost of paper for labels and wrappers . .	0 2 3
3. Cost of chemicals 4. Cost of other raw materials . . .	0 3 1
5. Factory labour	0 3 11
6. Power and fuel	0 0 7½
7. Ordinary current repairs and maintenance of buildings, plant and machinery . . 8. Miscellaneous, *e.g.*, rent, municipal taxes, insurance, etc. . . . . . 9. General service, supervision and local office charges	0 4 2
10. Cost of packing cases	0 1 5
TOTAL .	1 5 4½

(4) *Letter, dated the 3rd February 1928.*

We are herewith enclosing three statements giving information which was required by the Board during our evidence:—

1. Statement of labour required under frame filling system.
2. Statement showing c.i.f. cost of match machinery and other costs incurred on machinery.
3. Statement showing c. ft. contained in one gross boxes and splints.

(1) *Statement of labour required under Frame Filling System.*

For 1,500 gross in 10 hours—

15 Frame filling machine, each one man	15 men.
2 Splint steam heaters, each one boy	2 boys.
3 Splint paraffining stores, each one man	3 men.
2 Dipping machines, each two boys	4 boys.
8 Match frame emptying machines, each one boy	8 boys.
Transporting racks for drying chamber, each seven men	7 men.
TOTAL { Men	25
TOTAL { Boys	14
	39

For 800 gross in 10 hours—

8 Frame filling machine, each one man	8 men.
1 Splint steam heater, each one boy	1 boy.
2 Splint paraffining stoves, each one man	2 men.
1 Dipping machine, each two boys	2 boys.
4 Match frame emptying machines, each one boy	4 boys.
Transporting racks for drying chamber, 4 men	4 men.
TOTAL { Men	14
TOTAL { Boys	7
	21

(2) *Statement showing c.i.f. cost of match machinery and other costs incurred on machinery.*

	Rs. A. P.	Rs. A. P.
31st March 1926—		
1. Price of match machinery c.i.f. Karachi	1,09,871 6 9	
2. Handling and clearing charges at Karachi	5,700 2 6	
3. Railway freight and handling charges at Shahdara	5,071 9 9	
		1,20,643 3 0
4. Cost of shafting and pulleys		8,303 1 6
5. Cost of machinery purchased in India		17,107 5 9
6. Cost of machinery purchased from own concern		3,527 5 6
TOTAL		1,49,580 15 9

(3) *Statment showing c. ft. wood contained in one gross boxes and splints.*

	C. m-m in one.	C. m-m in one box.	C. m-m in one gross.	C. ft. in Gross.
Splint	180	10,800	1,555,200	·05
Cutter veneer	4,141·80	7,032·7	1,012,708	·03
Inner veneer	1,810 9			
Bottom veneer	1,080			

(5) *Letter No. 313, dated 14th February 1928.*

Sir Daya Kishan Kaul during his evidence at Dehra Dun promised to send his views in the form of a note, on the subject of duty on matches, and circular letter No. 946-A., dated Bombay, the 5th December 1927, communicating the observations made by the President of the Board. We are accordingly forwarding Sir Daya Kishan Kaul's note which deals with the questions under reference.

Note by Sir Daya Kishan Kaul.

In their Circular letter No. 946-A., dated Bombay, the 5th December 1927, the Tariff Board has communicated certain observations made by the President of the Board while resuming the enquiry into the Match manufacturing industry in India. They have also presented certain aspects of the enquiry inviting opinion thereon.

These are dealt with as follows:—

That the Match industry presents all the three conditions laid down by the Fiscal Commission as requisites of protection needs little illustration after what has been said in our previous representation.

Sir Padamji P. Ginwala has in his observations laid down the general principle which is applied in determining the amount of protection. The principle as enunciated by him would be perfectly fair where the imported article is identical in appearance and quality with that manufactured in the country. But in the case of the Match industry, certain important points affect the comparison, *viz.*:—

(*i*) the size of the manufactured matches,

(*ii*) the quality or finish, and

(*iii*) the prejudice in favour of the imported and against the Indians made matches. Allowance must be made for differences in arriving at the measure of protection needed.

The next question discussed is that the Government revenue based on the levy of the custom duty of Re. 1-8-0 on imported matches has been falling gradually, so much so that it is now feared that if the Indian manufacture continues to expand, it is not impossible that the total revenue under this head may vanish. The President has invited suggestions as to what course might be adopted consistently with the interest of Indian manufacture to make up this loss of revenue. One of the ways suggested by him to safeguard the revenue is the levy of an excise duty either by permitting the manufacture of the article in "Bond" or by requiring every box of matches sold in the country to bear an adhesive stamp. It was pointed out in the representation dated 30th December 1926, made to Government by us, in conjunction with some other Indian match manufacturers, that the Government revenue from import duty on matches was falling because devices had been adopted by foreign companies and others to avoid the taxation by importing foreign wood into India, and manufacturing in India the same quality of matches as the imported ones, at much less cost. It was also clearly shown in that representation how the revenue under this head had fallen gradually, and how clearly the same corresponded with the import first of finished raw material, *viz.*, splints and veneer, and soon after, when those were also taxed, by the import of match wood. The same Swedish combine is now manufacturing in India with imported wood, matches which are selling in the country at a cheaper rate than the matches manufactured with local wood by Indian factories. So, what has happened is apparent; and it is against this attempt of the foreign manufacturers to kill the indigenous Indian enterprise, that Government help and protection is sought. It is evident that if the imported wood had also been correspondingly taxed there would have been no advantage to the foreign manufacturers in establishing their factories in India for manufacturing matches with imported wood, and the amount of the import duty should not have fallen to the extent that it has done in recent years. With

all the impetus which indigenous match manufacture in India has received from this import duty on finished matches, the total quantity of manufacture with indigenous wood is we understand about ¼th the total consumption of matches in India. Matches manufactured in India with imported wood at present furnish, it is believed, somewhere about ⅓rd the total consumption of India and a little over ¼th the total consumption is met by imported matches. So, if this imported wood were taxed correspondingly with the import duty on finished matches, the diminution of Government revenue would have been only to the extent of ¼th and that again would have been partially compensated for by other indirect means, *viz.*, railway earnings on transport of raw material and taxation on income earned by Indian manufacturers.

One of the methods suggested for recoupment of Government revenue is the levy of an excise duty on manufactured matches. An excise duty whatever form it may take is bound to affect prejudicially the indigenous enterprise and, instead of affording protection to indigenous Indian manufacture, it would kill the enterprise to the benefit of the foreign manufacturers or enterprisers, particularly if the imported wood still remained free from an additional protective duty. This conclusion is evident from the following facts:—

The Wimco brand of the Swedish combine manufactured in India with the imported wood is selling in India at present at Rs. 1-4-0 to Rs. 1-7-0 per gross. The selling price of matches manufactured with Indian wood ranges from Rs. 1-5-0 to Rs. 1-7-0. The imported matches with a Rs. 1-8-0 duty per gross are selling at Rs. 2-6-0 to Rs. 2-8-0. Now if an excise duty say of Rs. 1-8-0 were levied on matches manufactured in India whether from indigenous or imported wood and the import duty on those of foreign manufacture were raised to Rs. 3 per gross, the result would be that the price of the first would rise to Rs. 2-12-0 to Rs. 2-15-0, of the second Rs. 2-13-0 to Rs. 2-15-0 and that of the third to Rs. 3-14-0 to Rs. 4. The first and second would thus pass the retail price limit of one pice per box, and must be either sold at 2 pice or at 1½ pice. Matches are not a commodity of which the price can be fixed in fractions of a pice. The third, *viz.*, the imported matches would even with an additional import duty of Rs. 1-8-0 be still within the limit of a retail price of 2 pice per box with a margin of 8 to 10 annas per gross. It is obvious that no one will buy indigenous matches for 2 pice per box or even at 1½ pice per box in preference to the foreign matches priced at 2 pice, while the Wimco brand may find custom at 1½ pice per box. The result naturally would be that the 2 pice foreign matches would sell or the Wimco branch of Swedish manufacture in India would survive but the indigenous matches would be wiped out of the market. It would thus be seen that the levy of excise duty as proposed may secure to Government its revenue but it would do so only by killing the indigenous enterprise.

Another way of making up Government revenue, the President observes, might be to establish a Government monopoly of the article by—

(*a*) the manufacture and sale of matches by Government agency, or

(*b*) Government making over the manufacture to private undertakings while retaining in its hands merely the sale of matches.

A point in favour of this suggestion urged by the President is that the quality of the matches manufactured in India varies very considerably and if the competition between factories efficient and inefficient continues and every manufacturer wants to sell his matches, the inevitable result must be that the quality of the matches will deteriorate for the time being, but that under Government control the quality would be maintained up to a certain level.

Now a Government agency of the nature suggested must in course of time become obnoxious. It could not be as economic manufacture as a private concern or a Company and moreover Government control would eliminate healthy internal competition which encourages enterprise and the products would deteriorate rather than improve. Take the case of France. Match industry is very backward in that country owing to Government monopoly.

A Government monopoly of sales is not likely to prove satisfactory either as it is sure to prove not only cumbrous and unsuited to the requirements of the trade but is also likely to kill the enterprise altogether. Government could in this way, no doubt, make as much revenue as they liked but the manufacturers would be placed entirely at the mercy of the Government machinery, and their profits are bound to be reduced to a minimum. The manufacturer will be left no inducement to develop, or may be, even to carry on the manufacture. He will become a mere manufacturing agency to Government—a position which cannot be justified nor advocated from an industrial or commercial point of view.

A third method is also suggested, *viz.*, that matches may be manufactured by private agencies and sold by another private agency. These suggestions, apart from the idea of ensuring Government revenue, are contemplated to benefit the consumer with a cheaper purchase price by the elimination of the difference between the price at which factories sell their matches at their works and the price at which matches are sold to the consumer, which at present forms the middleman's profit. Even with the system of an independent sales corporation, Government will have to safeguard against the possibility of such a corporation abusing the license, by virtue of the sale monopoly, in dictating the purchase price which will also have to be fixed in that case; and this proposal therefore resolves itself into Government fixing the maximum price that could be offered to a manufacturer for his quality of production and the prices at which it could be sold by the sale agency. The position of the corporation would be practically that of a licensed commission agent, and the objections which hold in the case of a Government monopoly of sale would apply equally in this case.

Another system has been suggested for preventing exploitation, *viz.*, that of establishing a monopoly in sale, the production by private agency being regulated by requiring that the manufacture of matches should be under license. The sale could then be entrusted either to a separate organization or retained in the hands of Government itself. Such a proposal would in the face of the variety of interests and the difference in size, quality and method of work of the numerous factories in India, appear to be impossible. A syndicate representing all these different interests could not be brought into being; and even if it were, it could not work satisfactorily. A sales corporation comprising interests independent of match manufacturers might be possible under Government licence. But it could prove useful only if the sale prices were fixed by Government on such a scale as would afford sufficient protection and encouragement to Indian match manufacture with Indian capital and Indian wood and other raw material available in India.

It is urged in favour of this proposal that the consumer would by this arrangement be able to buy his matches at a lower price because there would be no unnecessary competition between small factories to secure the services of the middleman. The question of sale prices has been discussed above. They can be either one pice, 1½ pice or 2 pice. There is no doubt that at present the middleman does make a considerable profit. But even if the control of sales sent to Government or to a corporation, the sale price of one pice could not be reduced any further. The only difference would be that instead of that profit going to the middleman, it would go mostly to Government and in the case of a corporation, partially to that company. But there is after all a limit to which the middleman's profit can be legitimately reduced, for considerable sale is done by hawkers and petty shopkeepers. Moreover, the present margin of profit to the middleman is already low as compared to what it was in 1921 and 1922 when the retail sale price was 6 pies per box or Rs. 4-8-0 per gross and the wholesale price was Rs. 3, thus giving the middleman Rs. 1-8-0 per gross. The reduction of the middleman's profit to a minimum could not therefore by itself make up the loss of Government revenue which it is intended by this device to recoup. It has been pointed out by the President, that, if the Swedish combine were to acquire a monopoly or to combine with the local manufacturers, the price of matches might in course of time be raised without necessarily bringing more revenue to Gov-

ernment. Such a possible contingency should all the more justify the protection of indigenous enterprise against foreign exploitation and imports. It would thus be seen that none of the methods suggested in the circular letter would satisfactorily meet the case.

As regards the levy of a special excise duty on foreign concerns, it is true that it is very difficult to devise any means to control the use of foreign capital or to say with certainty that any company operating in this country is a foreign company when it even partially employs Indian capital. But the criterion in this connection might be what has been advocated in the minority report of the Fiscal Commission, *viz.*, that any company of which at least three-fourth capital was not Indian should be looked upon as a foreign company. With three-fourth of the capital the voice on the directorate and management of that company must also be proportionate. With these restrictions it would be, it is urged, safe in the interests of the country to admit foreign capital in the country's development. Any concerns which did not come under this definition could be treated as foreign concerns and a special excise duty levied on their manufacture both to ensure Government revenue and to safeguard the interests of the country's own manufacture. A foreign company may employ mainly local labour and may use Indian materials as far as possible but unless the capital and the direction and management of the concern are mainly Indian, its activities and its manufacture cannot be legitimately claimed to be Indian.

It is an admitted fact that the Swedish Trust has in recent years tried to secure a dominating interest in the match trade of the world; and in pursuance of this policy the Trust aims at securing a predominant, if not an overwhelming, position in India by unfair competition. It is therefore evident that if this Trust is able to acquire that final and complete hold by killing indigenous enterprise, it would mean that India could never rise to be self-contained in respect of the supply of this article of manufacture which has become more or less a commodity of constant use in every household in the country and thus a necessity of life, and one which in time of trouble in the waters surrounding the Indian Peninsula, may become impossible to procure.

As regards the suggestion about recommending a licence for the erection of factories and the manufacture of matches in suitable centres in the country, it would perhaps be desirable that some restrictions should be placed to prevent erection of factories at unsuitable places. The simplest solution for this appears to be to subject the erection of new facories to sanction of Government who would satisfy themselves about the economic conditions before allowing the establishment of a new factory.

To sum up, the problems presented by the circular letter of the Tariff Board have been discussed above briefly and concisely. There are only two points involved in this enquiry, (1) relating to a protective duty if it is held that the Match industry is one which ought to be protected in view of the three principal conditions laid down by the Fiscal Commission, (2) relating to Government revenue estimated to accrue from the levy of import duty on foreign imported matches.

In connection with (1), the Indian match manufacturers have in their representation shown clearly how the industry fulfils the conditions laid down by the Fiscal Commission to warrant protection. It is said that the Swedish combine is an exceedingly rich combination, possesses enormous resources with factories established in more than 200 places in the world and with decades of practical experience and of technical knowledge. These considerations it is claimed should furnish all the stronger support to the Indian cause for receiving protection at the hands of the country's Government when it is admitted that the country possesses the raw material which can be manufactured in the country as cheaply as anywhere in the world, and when capital and enterprise for this industry can also be forthcoming without much difficulty. The activities of this foreign combination are in themselves a serious menace to the indigenous enterprise in India.

The case urged by the indigenous match manufacturers of India has been based on their claim to develop the manufacture with Indian capital and Indian raw materials and thereby to make the country self-contained in this respect. The development which the Match industry has undergone during recent years gives a clear indication that it is possible with further experience to establish the match industry in India with Indian capital and Indian wood so economically as to stand world competition and to be in a position to supply the requirements of the whole of India. To enable this infant industry to grow and establish itself properly in the country, in the face of an admittedly powerful counteracting force, the indigenous match manufacturers asked for help and protection from Government, and it is for the Tariff Board now to determine how much protection should be afforded with a view to save and help the indigenous enterprise.

It appears that much confusion will arise as a result of the present enquiry if, while considering the Indian claim for protection, the Swedish American Trust—which is the real danger—is identified in any way as a claimant for consideration, with the Indian interests needing protection. If this is done the whole enquiry will have hopelessly failed in the aim with which it was inaugurated, and no amount of Government monopolies or combination of indigenous manufacturers will succeed in averting the danger. The argument of a rates war will apply equally whether a Government monopoly exists or not, and the only method of safeguarding Indian interests can be found in creating an effective tariff wall. It must be clearly recognized that the Swedish American Trust as a powerful and well organized body have played their cards extremely well, and there is little likelihood that they will not continue to do so unless they are made conscious of playing a losing game. It is surprising that while it was principally against the machinations of this very Trust that protection was most earnestly sought for, they appear to be identified before the Tariff Board with Indian interests, a point which deserves serious consideration. If the aim of the enquiry is that the interests of Match industry with Indian capital and Indian match wood should be protected and helped against foreign exploitation, measures must be adopted to terminate, or at all events to limit, the activity of the Swedish American Trust in India as rapidly as possible. This could be secured only by the imposition of a heavy tax on imported match wood, restrictions against the grant of timber concessions to them by Government and a special excise. There is no doubt that a heavy tax on imported match wood would land several Indian match manufacturers in trouble. This however cannot be helped if the remedy is to be complete and effective. The trouble of such Indian manufacturers will however be a temporary one since proper facilities afforded by Government would readily divert their enterprise in the interests of Indian wood.

If the above measures are adopted, a sudden drop in Indian production will result, but this need not be a disturbing factor, since the balance of requirements will, as before, be supplemented by imported matches and Government revenue will incidentally revive.

As regards (2), *viz.*, Government revenue, the observations of the President of the Tariff Board have been discussed above and it has been shown that if the foreign imported wood had been taxed in proportion to the rate of duty on imported matches, the foreign manufacturers would not have had this big loophole and Government revenue would not have fallen to the extent it has. If the Indian manufacture of matches with foreign wood were eliminated from the total production of the country, it would be obvious that the indigenous Indian manufacture with Indian wood alone could not affect Government revenue seriously; and that other indirect benefits would perhaps justify the shortage.

The principles underlying the protection of an industry and Government revenue are by no means identical and therefore cannot be made interdependent. Government can make up the shortage in revenue in many other ways, and need not, for its sake, jeopardize an infant indigenous industry which has otherwise a hopeful future.

To meet both the ends in view, it is once more urged that the present customs duty of—

Rs. 1-8-0 per gross on imported matches;

As. 4-6 per pound on splints for match manufacture; and

As. 6 per pound on veneer for match boxes,

should be maintained as a protective duty, that a protective duty of Rs. 1-8 per cubic foot should be imposed on imported match wood and that a special excise duty of Re. 1 per gross should be imposed on manufacture of matches in India by companies of which three-fourth of capital and directorate are not Indian.

सत्यमेव जयते

THE MAHALAKSHMI MATCH FACTORY, SHAHDARA.

B.—ORAL.

Evidence of Raja Sir DAYA KISHAN KAUL, Pandit SHIV KISHAN KAUL and Mr. A. KROBOTH recorded at Dehra Dun on Sunday, the 22nd January 1928.

Introductory.

President.—Sir Daya Kishan Kaul, are you the sole proprietor of this Mahalakshmi Match Factory?

Sir Daya.—Yes.

President.—I think that in some part of your statement you propose that your evidence should be treated as confidential.

Sir Daya.—Only with reference to certain parts.

President.—Throughout this enquiry we have not treated any evidence as regards costs or anything like that as confidential and I think it would be very inconvenient if you insist upon your costs being treated in that way. All the concerns have now agreed that their costs should be published and they have given evidence in public.

Sir Daya.—Then, I don't object to my evidence being published.

President.—I hope that you would give us your more recent costs also.

Sir Daya.—Yes, whatever we have.

President.—I see that you have sent us an earlier representation which was a joint representation by you, the New Sunderban Match Factory Limited, and the Lakshmi Match Works, Bilaspur. Are you interested in the other two?

Sir Daya.—We had an association at that time and we are still carrying on some sort of correspondence. The idea at that time was that we should study each other's conditions and help each other and they selected me as the Chairman of that Association.

Dr. Matthai.—Was it formed on an all India basis?

Sir Daya.—Yes. As a matter of fact, the idea was to have a Northern India Association and the Guzerat Islam Match Factory people also joined us in the first instance but they became a little lukewarm in the end. So, the result was that the other three kept on working.

President.—Are you appearing on their behalf?

Sir Daya.—No, I am only appearing on my own behalf.

President.—It was simply a sort of amicable working arrangement.

Sir Daya.—With that object we started.

President.—You have no direct interest in the other two factories.

Sir Daya.—No.

President.—Mr. Kroboth, is your manager?

Sir Daya.—Pandit Shiv Kishan Kaul, who is my nephew, is the manager, attorney and everything. He runs the factory, Mr. Kroboth is the engineer.

President.—This factory has got a capacity of 1,000 gross a day, is that right?

Mr. Kroboth.—We can make 1,000 gross, but really it is 800 gross per day. If everything is all right—sometimes we have to open this machine and sometimes that machine—if all machines are working all right, then it is possible to get 1,000 gross a day.

President.—The average capacity is about 800 gross per day.

Mr. Kroboth.—Yes.

Dr Matthai.—You have been able to get out of it for some time now 1,000 gross per day.

Plant.

Mr. Kroboth.—Yes.

President.—Your plant is all Roller's machinery.

Mr. Kroboth.—Yes.

President.—It purchased about 1925.

Sir Daya.—It was purchased in 1924 and was fitted up in 1925.

President.—Did you buy it as a complete unit?

Sir Daya.—Yes.

President.—Excluding, I suppose, the power plant?

Sir Daya.—The power plant is separate.

President.—Could you give us the c.i.f. price of that plant?

Sir Daya.—We will send it to you later on.

President.—I want the cost of the match plant, because you will have a boiler, an engine, and other things. I only want to know the c.i.f. price of the match plant.

Sir Daya.—We can make it out and send it in the form of a statement.

President.—We have not very much time.

Sir Daya.—Immediately we go back, we shall prepare it and send it on to you.

President.—Then, I take it that the rest of the cost would be on account of the workshop, the boiler and engine and constructions?

Sir Daya.—Yes.

President.—Mr. Kroboth, have you seen the Bareilly Match Factory?

Mr. Kroboth.—I have not seen it.

President.—More or less it is on the same lines as yours except that it has got a slightly higher capacity. That I think is due to their having a bigger Simplex machine and a few more box making machines, is that right?

Mr. Kroboth.—Yes.

The Simplex.

Dr. Matthai.—When you say that your capacity is 1,000 gross or actually 800 gross a day, you mean your capacity as determined by the capacity of your Simplex?

Mr. Kroboth.—Yes, the whole thing depends really upon the Simplex. The output that I have given you is according to the Simplex we have. There will be no difficulty whatsoever once we get more matches turned out.

President.—The Simplex is Roller's patent.

Mr. Kroboth.—Yes.

President.—Have the Swedes got the Simplex?

Mr. Kroboth.—Of a different type, but the principle is the same.

President.—What do they call it?

Mr. Kroboth.—" Czerweny."

President.—The principle is the same?

Mr. Kroboth.—Yes. Actually this machine is made in Austria but the Swedish Match Company, has obtained the control over it. If anybody wants to buy it, it must be through the Swedish Match Company.

President.—It is not a Swedish patent, is it?

Mr. Kroboth.—No. The Swedish people don't allow anybody to buy it direct.

President.—Were you yourself in Roller's?

Mr. Kroboth.—Yes. I had also been in Poland, Czecho Slovakia and Finland.

President.—Where were you last?

Mr. Kroboth.—I was in Finland for three years just before I came out here.

President.—Were you working in Finland?

Mr. Kroboth.—Yes, I was there for three years. I may say here I have worked all my life in match factories.

President.—What was the capacity of that factory?

Mr. Kroboth.—Its capacity was 6,000 gross a day.

President.—Had they Roller's machinery or Swedish machinery?

Mr. Kroboth.—They had Roller's machinery; they had five Simplex machines.

President.—When the Simplex is bigger, what does that mean?

Mr. Kroboth.—It is a little longer and higher and gives more splints.

President.—How many rows have you got?

Mr. Kroboth.—Three rollers or six rows, in the bigger Simplex it is four rollers or eight rows.

Mr. Mathias.—This is the smallest size of Roller's which is on the market?

Mr. Kroboth.—Ours is not the smallest; ours is No. 3.

Mr. Mathias.—What is the production of the smallest type?

Mr. Kroboth.—500 gross a day. That is the output of a very small machine.

Mr. Mathias.—That is why you put the economic production at 500 gross a day, is it not?

Mr. Kroboth.—The Roller's people make four types. The first type has an output of 500 gross a day; the second 650 or 700 gross a day; the third 800 gross a day and it should be 1,000 gross a day, and the fourth about 1,500 gross a day.

Dr. Matthai.—Is that the largest size?

Mr. Kroboth.—Yes. Roller's say that the output of that size is about 1,500 gross a day, but I don't think that it really gives that much. According to the revolutions, it should give that output, but it never does, here in India.

Dr. Matthai.—In the Swedish Simplex also, the output of the largest size is 1,500 gross a day, or can you have anything larger than that?

Mr. Kroboth.—That is also about 1,500 gross.

Dr. Matthai.—Why is it that the Simplex is limited to 1,500 gross? Can't you make a Simplex which will have a bigger capacity than that?

Mr. Kroboth.—It will be very, very large.

President.—Does the Simplex give you any trouble?

Mr. Kroboth.—No.

President.—Does it require very much looking after?

Mr. Kroboth.—If it is looked after carefully, it will work all right.

President.—Do your workmen look after that?

Mr. Kroboth.—Yes.

President.—Have you trained them yourself?

Mr. Kroboth.—Yes.

President.—How many men have you actually got on the Simplex?

Mr. Kroboth.—We have one man and three boys.

President.—Are these three people mechanics or ordinary trained labour?

Mr. Kroboth.—Only trained labour.

President.—Do you have any special fitter to look after the Simplex?

Mr. Kroboth.—No. We have one man and three boys who work the machine.

President.—You will have other labourers to feed the machine and that sort of thing?

Mr. Kroboth.—These three boys do the whole thing.

President.—The splints have to be brought by somebody.

Mr. Kroboth.—That is done by the other boy who carries the splints.

President.—It is very near, is it not?

Mr. Kroboth.—Just close.

President.—But the labour on the machine itself is only three boys and one man?

Mr. Kroboth.—Yes.

Dr. Matthai.—Have you had any serious breakdown on the Simplex since you started?

Mr. Kroboth.—No.

Dr. Matthai.—Any kind of stoppage that you get can be remedied in a very short time?

Mr. Kroboth.—Yes.

Dr. Matthai.—What is the kind of stoppage that you might have on the Simplex?

Mr. Kroboth.—Only after three or four months' the comb must be changed. That can be done in about 5 hours.

President.—That you can do on a Sunday?

Mr. Kroboth.—Yes.

President.—Does the machine stop owing to some defect in it?

Mr. Kroboth.—No. Of course it will stop, if some nail or a piece of iron passes along with the splints through the channel, but it has never happened.

President.—During the day sometimes do you have to stop it to make some adjustment or anything?

Mr. Kroboth.—Yes, sometimes when the splints do not catch properly or when the whole thing gets jammed.

Dr. Matthai.—That is the experience of people in other countries also about the Simplex that you can work it without any serious breakdown?

Mr. Kroboth.—Yes.

Dr. Matthai.—What I am asking you is this, that in a factory like yours where there is one Simplex and no spare, is not there some risk that if the Simplex machine stops and if there is no spare Simplex machine, the whole work of the factory may stop?

Mr. Kroboth.—Yes.

Dr. Matthai.—You don't think that it is a serious risk.

Mr. Kroboth.—No. If it is kept in a good condition, it will never happen. But of course if something breaks, there is no help for it.

Dr. Matthai.—Ordinarily you don't think that there is any danger?

Mr. Kroboth.—Not if the labourers do their duty all right! In the last 2½ years there has been no breakdown.

President.—In a big factory, you will have a spare Simplex.

Mr. Kroboth.—The Simplex is very expensive, to have as a spare machine.

President.—What they will do is this. The total capacity of the Simplex will be a little more than they require. Supposing they had 6,000 gross as their daily output as they were having in Finland, they would have as you said 5 machines. Four machines if pushed hard might make 6,000 gross a day. So even if one machine did not work, the other four machines might produce 6,000 gross a day.

Mr. Kroboth.—Four machines cannot make as much as five machines. It is not a question of running a machine faster. You cannot run any machine faster than it will go.

President.—Is it all steel or are some parts made of cast iron?

Mr. Kroboth.—It is cast iron, and some parts are also made of steel.

President.—There is no wood at all, is there?

Mr. Kroboth.—No.

President.—It is all either cast iron or steel, is it not?

Mr. Kroboth.—Yes. In Europe it lasts longer, but here it will last at least ten years.

President.—You say that the chain may require renewing and some parts may require renewing but the frame will remain.

Mr. Kroboth.—And the wheels also will remain. Only the chain will require to be renewed after some time.

President.—Some parts may require to be renewed but the frame may last for many years?

Mr. Kroboth.—Yes.

President.—Nothing can happen to that. A good deal of the cost would be the cost of the frame.

Mr. Kroboth.—Yes. If the holes become bigger, the chain will have to be changed.

President.—In the Simplex is there any adjustment for different sizes or must you make only one size?

Mr. Kroboth.—We can make full size and three-fourth size but we can not change the thickness of the splints.

President.—There is a difference between the full size and the three quarter size in the matter of thickness?

Mr. Kroboth.—No, not in thickness but only in length. We have now 1·9 thickness, and if we want 1·7, the plates must be changed and it will become costly.

President.—The Simplex must be for one size.

President.—So that if there are factories here producing half size and three-quarter size, they must have different machines?

Mr. Kroboth.—It is better to have different machines; otherwise the plates will have to be changed.

President.—You get the best results by making only one size, is that right?

Mr. Kroboth.—Yes.

President.—Can't you do two sizes by adjustment?

Mr. Kroboth —In the case of the filling machine three-quarter size and full size you can, but not three-quarter size and half size, as in the case you can only use it for one size.

President.—You can use the filling machine for both three-quarter size and full size?

Mr. Kroboth.—Yes.

Dr. Matthai.—What about other machines? Can you use them for the full size and the three-quarter size?

Mr. Kroboth.—It is possible to do, but it will become costly.

President.—It will take more time and then it will become costly if you re-adjust frequently.

Mr. Kroboth.—Yes.

Dr. Matthai.—Supposing there is a bigger demand in your market for half size matches, that might make your position rather difficult, might it not?

Mr. Kroboth.—I think it would be very difficult.

Dr. Matthai.—If the demand is for full size, you can adapt your machinery to that?

Mr. Kroboth.—Yes, that can be done.

President.—The Simplex filling machine it is not possible to change, but it will be possible to change the whole Simplex for the half size and then there

must be some parts new. And it would not be as satisfactory as the Simplex for the original size.

Mr. Kroboth.—The Simplex will work all right but these other machines, *viz.*, filling machines, box-making machines, etc., must be new.

President.—What are the sort of wages you pay in Finland for ordinary labour?

Mr. Kroboth.—I don't remember it quite correctly because it is now three years since I left Finland.

President.—When were you in Germany last?

Mr. Kroboth.—I was in Germany in the Roller's factory, about three years ago.

President.—You have got one peeling machine just now?

Mr. Kroboth.—Yes, one splint peeling machine.

Labour.

President.—How many men do you have on the peeling machine.

Mr. Kroboth.—Three men.

President.—In Finland, how many men would you have?

Mr. Kroboth.—In Finland, labour is very expensive. We have only one man. We have to use here heavy simul wood. Aspen is never so big. It is much smaller and easier to carry, but simul is not so. It is both big and heavy and so we require three men. In Finland, we will have one man and three girls.

President.—For one machine you will have one man and three girls?

Mr. Kroboth.—Yes. Here it is not possible to do like that because the wood is bigger and heavier.

President.—How many peeling machines have you got for the boxes?

Mr. Kroboth.—One peeling machine.

President.—How many men have you on that?

Mr. Kroboth.—Four men.

President.—There how many men would you have?

Mr. Kroboth.—Two men and some girls one man to sharpen the knives and the other in charge of the machine, and two or three girls.

President.—I suppose you have got one chopping machine?

Mr. Kroboth.—Yes.

President.—How many men do you have on that?

Mr. Kroboth.—Two.

President.—And in Finland?

Mr. Kroboth.—Two girls. Three men only for heavy work are employed.

President.—How many inside box-making machines have you?

Mr. Kroboth.—Five.

President.—And outside?

Mr. Kroboth.—Four.

President.—How many have you on the inside box-machines?

Mr. Kroboth.—We have two boys each and for the outside box-making machines we have only one boy each.

President.—In Finland how many would you have?

Mr. Kroboth.—One for inside and one for outside.

President.—You have 5 boys extra here.

Mr. Kroboth.—Yes.

President.—What is the reason?

Mr. Kroboth.—With aspen there is no waste. Everything is quite clean. Here it must be sorted; I mean the veneer must be sorted.

President.—The inside machine is more difficult to work, is it not?

Mr. Kroboth.—Yes.

President.—The idea is that one boy will have to watch.

Mr. Kroboth.—Yes.

President.—But on the outside box there is only one.

Mr. Kroboth.—Yes.

President.—Do these machines give you any trouble?

Mr. Kroboth.—No.

President.—Did you have any difficulty in training your labour?

Mr. Kroboth.—In the beginning it was a little difficult; but there is no difficulty now.

President.—Do they look after the machines or do you have a fitter?

Mr. Kroboth.—If there is any repair work to be done, the fitter does it; otherwise the boys look after the machines properly.

President.—Do you have a special fitter.

Mr. Kroboth.—Yes.

President.—If there is any difficulty he goes and sees to it?

Mr. Kroboth.—Yes.

President.—How many labelling machines have you?

Mr. Kroboth.—Five labelling machines.

President.—How many boys have you got?

Mr. Kroboth.—Two boys and two children for half day.

President.—That means 3 boys.

Mr. Kroboth.—Yes.

President.—In Finland, how many would you have?

Mr. Kroboth.—Two, but I hope the same will be the case here. In the first year we had to engage more boys, but it will be possible to reduce the labour further.

President.—For putting the paste, you will have to keep one extra boy?

Mr. Kroboth.—Yes.

President.—There one girl will do the thing?

Mr. Kroboth.—Yes.

Dr. Matthai.—We were told the other day that labels printed in India are sometimes slightly larger than the boxes and therefore for pasting up the edges a little more attention is required and that was one reason why you had to employ a few people more here on the labelling machines. Have you had any difficulty with regard to your labels being larger?

Mr. Kroboth.—We had no difficulty with regard to our labels. If they are too big, the box would not look nice.

President.—If the labels were larger, it would not matter. If they are smaller, they have to be down in the centre.

Mr. Kroboth.—Yes. For feeding outside boxes. In the beginning we had three boys, now we have two boys and in the future it will be possible to do with one boy.

President.—How many box filling machines have you?

Mr. Kroboth.—Four.

President.—How many people have you got?

Mr. Kroboth.—2 boys each, or 8 in all.

President.—Does the box filling machine give you any trouble?

Mr. Kroboth.—No.

President.—Do the boxes break or is there much wastage?

Mr. Kroboth.—The percentage of wastage is very small.

President.—In the Simplex is there much waste of matches?

Mr. Kroboth.—There is no waste. If the splints are not cut clean we can say 5 per cent. If it is more than 5 per cent. then it follows that the machine is not in good order.

President.—You also do the packetting by machine?

Mr. Kroboth.—Yes.

President.—How many men have you for packetting?

Mr. Kroboth.—We have one machine and we have 4 boys and 2 children, that is 5 boys in all.

President.—In Finland how many would you have?

Mr. Kroboth.—About five. It is not possible to reduce this still further.

President.—You will have 5 persons on one machine in Finland?

Mr. Kroboth.—Yes. Here in the first year, it was very much more.

President.—How many side painting machines have you got?

Mr. Kroboth.—Only one. We have two boys, one to put the boxes in and the other to take them out.

President.—In Finland you will have only one girl?

Mr. Kroboth.—No, we will have two. The machine is very long and one cannot manage it.

President.—You have got a drying drum. Do you have anybody to look after that?

Mr. Kroboth.—2 men.

President.—Yours is not automatic?

Mr. Kroboth.—No.

President.—If it is automatic you would not have any man there?

Mr. Kroboth.—Even if it is automatic, you require one man for putting the splints in the drum. If the splints are impregnated, they become heavy and it requires great power to blow the splints into the drum. Moreover, the splints stick and get jammed in the tube leading to the drum. If they were completely dried, which is never the case, then there would be no difficulty. In Finland also they tried it but it was not quite successful.

President.—You have got two men on the drying drum?

Mr. Kroboth.—Yes.

President.—In Finland also you will have two men, if it is not automatic?

Mr. Kroboth.—Yes.

President.—You have a machine for cleaning splints?

Mr. Kroboth.—Yes, we have one.

President.—Is that automatic?

Mr. Kroboth.—It can be arranged but there is no saving in labour.

President.—There also you will have the same labour?

Mr. Kroboth.—Yes.

President.—What about the splint levelling machine?

Mr. Kroboth.—We have two boys on that.

President.—In Finland how many would you have?

Mr. Kroboth.—The same.

President.—On the waste levelling machine how many do you have?

Mr. Kroboth.—One boy: but he does not work all day. He only works for one or two hours.

President.—You have also got a drying chamber for boxes.

Mr. Kroboth.—Yes.

President.—Is that automatic?

Mr. Kroboth.—Yes.

President.—Do you have any men on that?

Mr. Kroboth.—We have two boys.

President.—You are employing all boys?

Mr. Kroboth.—Yes.

President.—In Finland what would you have?

Mr. Kroboth.—There also they must have one boy for cleaning.

President.—You have a grinding mill for chemicals. How many boys do you have there?

Mr. Kroboth.—Two.

President.—You have only one mill.

Mr. Kroboth.—We have three mills.

President.—How many boys have you on the three mills?

Mr. Kroboth.—Only two boys for the three mills. There must always be one boy in the chemical house to prevent anything from catching fire.

President.—In Finland also the number of men will be the same?

Mr. Kroboth.—Yes.

President.—As regards the Simplex you have already told us that you have one man and three boys?

Mr. Kroboth.—Yes.

President.—Do you work one shift only or do you have an extra shift?

Mr. Kroboth.—We are working really three-half shifts. Each shift works for five hours.

President.—That is to say you work for 15 hours?

Mr. Kroboth.—Yes.

President.—Do you work the whole factory for 15 hours?

Mr. Kroboth.—Yes, except the cross cut saws, peeling machine and splint chopping machine.

President.—What is the idea?

Mr. Kroboth.—We get veneer from Kashmir.

President.—How long have you been working three-half shifts.

Mr. Kroboth.—From the 2nd January last.

President.—Why did you find it necessary to work three-half shifts?

Mr. Shiv Kishan Kaul.—Because there has been a rise in demand.

President.—You thought perhaps some excise might be levied!

Sir Daya.—That was not the idea. We had been in arrears for contracted supplies and so we wanted to make up. The orders came in for more than we could manufacture and we had to meet them.

President.—Do you find it easy to get your labour to work at night?

Mr. Kroboth.—There is no difficulty.

President.—What are your hours of working?

Mr. Kroboth.—From 7 A.M. to 12 P.M.; then from 1 P.M. to 6 P.M. and then from 7 P.M. to 12 A.M.

President.—Do you change all the men for the three shifts? Do you have some boys working two shifts?

Mr. Kroboth.—Some boys work two shifts.

President.—I suppose you have separate boys for the night shift?

Mr. Kroboth.—The boy who works in the morning will not have to work in the night.

President.—They are not allowed to work 10 hours, are they?

Mr. Kroboth.—No.

President.—Really you have to keep three sets of boys?

Mr. Kroboth.—Really there are two sets of boys—one full shift and one-half shift.

President.—What is the law about boys?

Mr. Shiv Kishan Kaul.—Under 15 years they can only work up to 5½ hours, and we can not get them to work at night. So we get them to work in the day. We have arranged our shifts in this way that some boys start working at 1 P.M. in the day and we carry them on to the night. We have another set starting work in the morning and they finish in the evening. For the night shift we take only adult labour and pay only for 5 hours.

President.—Don't you find it difficult to work at night?

Mr. Kroboth.—No difficulty.

President.—Even in Europe, they don't have night shifts.

Mr. Kroboth.—It is better to have only one shift for this reason, that if only one boy works a machine, he generally keeps it in a better condition. If there are two or three boys handling the same machine, the tendency is to throw the blame on others and not to pay sufficient attention to the machine. But as I say it is possible to work two shifts. There is no difficulty in it.

President.—Your whole production depends on the Simplex. Even if you work 5 shifts you cannot get more out of your Simplex. There is a limit to your working two shifts.

Sir Daya.—Quite.

Dr. Matthai.—Would you be able to get more out of your Simplex in Finland than you do here?

Mr. Kroboth.—Not much more.

Dr. Matthai.—It is the same amount of work?

Mr. Kroboth.—If the wood is good, we get full output.

Dr. Matthai.—Then it depends on the wood?

Mr. Kroboth.—Yes.

Dr. Matthai.—Does the Indian wood make any difference?

Mr. Kroboth.—It makes a little difference.

Dr. Matthai.—What sort of difference?

Mr. Kroboth.—It is not quite good as in Europe.

Dr. Matthai.—Would you say that the difference would be roughly 20 per cent.?

Mr. Kroboth.—It would be too high. 10 to 15 per cent. would be about the difference.

Dr. Matthai.—Do you get the same number of revolutions on the Simplex?

Mr. Kroboth.—Yes.

President.—How long does it take to get one lot out on the Simplex?

Mr. Kroboth.—It takes about 45 minutes.

President.—In 45 minutes you say you complete one revolution. How many boxes do you get out of that?

Mr. Kroboth.—About 80 gross per hour. What we get at present is about 80 to 90 gross in one hour.

President.—One complete revolution means 60 to 63¼ gross?

Mr. Kroboth.—Yes.

President.—Have you any experience of those factories which have no Simplex and which use frame filling machnes?

Mr. Kroboth.—That system is also good but only needs more labour.

President.—You take 800 gross now. If you don't have the Simplex, can you tell me how many men you would require and how many frame filling machines?

Mr. Kroboth.—We would require about 8 to 10 frame filling machines.

Presdient.—How many men would you require to handle those machines?

Mr. Kroboth.—Each frame filling machine must have one man and after that we require extra men—about two—for dipping, and one man for paraffining. For bringing the matches into the drying chamber and then taking them out we would require two more men. On the whole we would need about 21 men.

President.—Yesterday we were told that it would be necessary to have 60 or 65 men.

Mr. Kroboth.—We don't have frame filling system in Europe now. I worked in one factory in Czecho Slovakia where they had Simplex and also frame filling machines. That was about nine years ago. It is a very expensive system and it is not possible to compete working on that system.

President.—Because of the larger number of men?

Mr. Kroboth.—Yes.

President.—I think that it is important to find out the number of men that you can save by using the Simplex. There is a very large difference between your figure and the figure we got from Mr. Wilkie.

Mr. Kroboth.—I shall make out a statement and send it to you later on.

President.—So far as you know hand dipping is not practised very much?

Mr. Kroboth.—Now not at all.

President.—Of course except in Sweden where they still use it. I saw it myself.

Mr. Kroboth.—That may be a small factory. In Japan it is done I think in some small factories.

President.—Even in bigger factories like those of the Swedish Match Company whenever they have to manufacture a special size, instead of going in for another Simplex it may pay them to use hand dipping for the time being. Can you use your Simplex for sulphur matches?

Mr. Kroboth.—Yes, we can, but we don't, you can make strike-everywhere matches also.

Wood.

President.—As regards wood, you use these different kinds of wood. You have mentioned them all here, *viz.*, blue pine, silver fir, spruce and poplar. These four kinds are used in your factory just now, are they not?

Sir Daya.—They had been used from time to time. As I explained the other day, we have come down to blue pine only for splints and simul for boxes.

President.—Now you use blue pine only?

Sir Daya.—Yes.

President.—Do you use blue pine by itself or do you mix it with any other?

Mr. Kroboth.—Only blue pine.

President.—Do you consider this wood to be superior to any other wood?

Mr. Kroboth.—It is good for splints. It is better than simul which breaks far too much. Further, if we impregnate the splints made out of simul, they become brown in colour.

President.—How does it take paraffining?

Mr. Kroboth.—Quite well.

President.—Impregnating?

Mr. Kroboth.—There is no difficulty.

President.—How do you find it in peeling?

Mr. Kroboth.—If boiled, it is nice, because there are sometimes knots.

President.—Do you always have to boil?

Mr. Kroboth.—It is better to do so.

Dr. Matthai.—Is there resin in it?

Mr. Kroboth.—Yes.

Dr. Matthai.—You get rid of that if you boil the wood?

Mr. Kroboth.—This wood becomes much softer and smoother when it is boiled. If it is not boiled, it is rough.

Mr. Mathias.—It is easier to veneer it if you boil the wood?

Mr. Kroboth.—Yes.

President.—Do you recommend boiling Indian wood for making matches?

Mr. Kroboth.—Only for this wood.

President.—As regards simul, you don't have to boil?

Mr. Kroboth.—No.

President.—Supposing you get fresh blue pine?

Mr. Kroboth.—There is no need to boil it if it has straight grains.

Dr. Matthai.—You don't have to boil any other kind of wood, do you?

Mr. Kroboth.—No.

Dr. Matthai.—What about hill poplar?

Mr. Kroboth.—We don't boil that.

President.—It is only blue pine that you boil?

Mr. Kroboth.—Yes. If we boil simul, it becomes very soft.

President.—How long can you keep this blue pine?

Mr. Kroboth.—For six months.

President.—You can keep it in the log?

Mr. Kroboth.—Yes.

President.—Then, it would be all right if you boil it?

Mr. Kroboth.—Yes.

Dr. Matthai.—Do you keep it in water?

Mr. Kroboth.—Yes.

President.—Do you boil it under pressure or in hot water?

Mr. Kroboth.—We put it in water and boil it, whereas in Burma I understand that they do it under pressure.

President.—I don't think that they do so in any other factory in India. I think the Ahmedabad Match Factory is the only other factory which boils. As you know, the grain is different as between blue pine and aspen. Do you see any objection on the ground of grain?

Mr. Kroboth.—In two or three years we will be able to make as good splints as aspen splints.

President.—But you have not got Aspen wood in India.

Mr. Kroboth.—We have wood which is almost as good as aspen.

President.—Which wood is that?

Mr. Kroboth.—Kashmir poplar.

President.—That is not the same as European poplar.

Dr. Matthai.—Are you sure that it is populus euphratica?

Sir Daya.—It is Populus Ciliata mainly and some Populus Nigra.

President.—The fact that it is not straight grained does not interfere with the Simplex.

Mr. Kroboth.—It makes no difference.

President.—So long as it is not thicker than the standard size?

Mr. Kroboth.—Yes.

President.—Have you tried splints made out of simul?

Mr. Kroboth.—Yes.

President.—On the Simplex?

Mr. Kroboth.—If it is fresh simul, it will be all right, because the splints made out of fresh simul are fairly strong. But if the timber is kept for two or three months, then the splints made out of that are not strong. Then again, if the timber is straight grained, it will be all right; whereas if it is cross grained, we are able to use splints made out of that on the Simplex but then there is more wastage, because they break. If it is impregnated, then the colour becomes brown.

President.—There are other woods. Take for instance Setkadon which is Trewia nudiflora. They find it suitable to use on the Simplex, because it does not break.

Mr. Kroboth.—It does break.

Mr. Mathias.—These have been made on the Simplex at Bareilly (shows samples).

Dr. Matthai.—Do you think that there will be much wastage if it is done on the Simplex?

Mr. Kroboth.—There will be more wastage than we have with blue pine.

President.—Setkadon does not seem to interfere with the Simplex. I want to know whether it would, in your opinion, be able to stand the Simplex.

Mr. Kroboth.—Yes.

President.—If they were to use simul, the sticks would break on the Simplex?

Mr. Kroboth.—The sticks do not break, but there will be 10 per cent. wastage. After that, the colour becomes brown, if impregnated. If the splints are 1·7 mm. they are not good; but if they were a little thicker, they would be all right.

Dr. Matthai.—The standard size is 1·7 mm.?

Mr. Kroboth.—The Swedish match is 1·7 mm.

President.—If you use 2 mm. it would be all right even if the wood is soft.

Mr. Kroboth.—It would not be good but still it might do. If it were 1·7, then it would break.

President.—That may happen if it is not strong enough. It can be made a little thicker and used on the Simplex in that case.

Mr. Kroboth.—Yes.

President.—You have given 35·7 c. ft. per 100 gross of matches. How did you work it out?

Mr. S. K. Kaul.—That is according to our actual consumption of wood.

President.—It is rather a high figure.

President.—As regards your wood supply, what is the position now? Have you made any permanent arrangements for your wood or are you entirely dependent upon the market?

Sir Daya.—We are so far entirely dependent on the market but I am trying to get into an agreement with the Punjab Forest Department and I am also trying to make arrangements in the North-West Frontier Province as well as Kashmir about the permanent supply of wood.

President.—The distance would be very great from Kashmir and from the North-West Frontier Province, would it not?

Sir Daya.—The distance from the North would not affect us, as far as distance is concerned, because we have got waterways.

President.—As far as what?

Sir Daya.—As far as Jhelum. The Jhelum river comes from Kashmir. The Kâghan river which comes from the Hazara district also joins the Jhelum river.

President.—Is there enough water all the year round in the river?

Sir Daya.—Yes, that is the main river on which irrigation depends.

Dr. Matthai.—When you say that you are dependent on the market, do you mean that you get your supplies by auction?

Sir Daya.—Either at the auction or at the timber sales depôts. The timber is brought down by the timber trading people to the depôts and then they are sold at the depôts. They have their depôt rates and they also sell by auction. If we are in need or urgent requirements, we go and buy at depôt rates but periodically they hold their auctions.

Dr. Matthai.—Mostly you buy at these auctions?

Sir Daya.—Yes.

President.—For 800 gross a day, you don't require more than three or four thousand tons of timber?

Sir Daya.—We require altogether about 80,000 c. ft. and we have to buy about 100,000 c. ft. a year.

President.—That would come to 2,000 tons a year.

Sir Daya.—Yes.

Mr. Mathias.—What proportion of your wood do you get actually on the spot at Shahadra?

Sir Daya.—Very little.

Mr. Mathias.—How much do you get from the United Provinces?

Sir Daya.—In 1926-27 we got 23,648 c. ft.

Mr. Mathias.—Roughly a quarter of your supplies would come from the United Provinces, would it not?

Sir Daya.—It would be about one-third.

Mr. Mathias.—And that is a journey of about 300 miles?

Sir Daya.—Yes. It is mostly between Luxar or Haridwar and Dehra Dun.

President.—That is a long distance to carry wood.

Sir Daya.—Yes, it is.

President.—Say within fifty miles of Lahore, how much wood can you get?

Sir Daya.—There is no wood within 50 miles of Lahore worth mentioning because our supplies come from Dhilwan which is on the Bias and more than 50 miles from Lahore and also from Jhelum which is about 100 miles from Lahore.

President.—Have you been finding any difficulty in getting your wood supply?

Sir Daya.—Not recently. In the first year we had difficulties.

Mr. Mathias.—Is that because you are bringing your splints from Kashmir?

Sir Daya.—No. When we first started, we started more or less at random and from the Forest point of view in the fag end of the year—that was in March. Then, most of the important auctions had already taken place and the fresh supply of logs would begin to come from June, so that it was towards the end of the year, the stocks were short and we had to get hold of whatever wood we could get from the market. Subsequently both the Punjab Government and the Kashmir State people came to know that we were one of the buyers and they sent us information in time for their auctions and we begin to get timber from auctions.

President.—From the Jhelum depôt how much wood can you get?

Sir Daya.—All our supplies have come from Jhelum and Dhilwan depôts so far.

President.—Does Government store wood in both these places?

Sir Daya.—Yes, and other people also bring down their wood, and these are their main selling depôts.

President.—Is the wood kept in water?

Sir Daya.—It is taken out of the water and stocked in the depôts.

President.—Do you buy the whole of your requirements at one time?

Sir Daya.—We don't buy practically the whole year's supply at one time because there are generally two or three auctions and we take just enough to carry on till the next auction.

President.—How much do you buy at one time?

Sir Daya.—We get about 20,000 c. ft. of blue pine and spruce. Spruce we are at the present moment using mostly for packing cases.

Dr. Matthai.—Is there a great demand for blue pine from other sources?

Sir Daya.—Yes, as a constructional timber.

Dr. Matthai.—That might affect your cost.

Sir Daya.—That is what is affecting our cost now.

Dr. Matthai.—What price do you pay?

Sir Daya.—12 to 14 annas a cubic foot landed Shahdara.

President.—That is not very much.

Mr. Mathias.—The price at Government depôts seems to be less than that.

Sir Daya.—11 to 12 annas in auctions. If you want to buy at depôts, the price varies from 12 to 14 annas.

Mr. Mathias.—Do you buy from contractors?

Sir Daya.—No, we don't buy from contractors. In all Government depôts, they have fixed rates which are called depôt rates, but auction rates vary from depôt rates.

Mr. Mathias.—The depôt rate is about 12 annas a cubic foot?

Sir Daya.—12 to 14 annas a cubic foot.

President.—That is at Jhelum, is it not?

Sir Daya.—Yes.

President.—From there you have to take your wood to Shahdara.

Sir Daya.—Yes.

President.—How much does that cost?

Sir Daya.—One or two annas more.

Dr. Matthai.—These two or three years, do you find the price steadily going up?

Sir Daya.—Not very much.

Dr. Matthai.—Yesterday when we asked the Forest Institute people they gave us a much higher figure than 14 annas for blue pine.

Sir Daya.—They might be talking about the United Provinces. Were they talking about the Punjab? The figures we have sent you are the result of the year's practice.

Dr. Matthai.—The figure they gave us was Rs. 1-4-0 or so.

Sir Daya.—That may be for sawn timber. Rs. 1-3-6 is the price for sawn timber in the form of beams and sleepers. I am talking of timber in the log.

President.—Where does the blue pine grow?

Sir Daya.—In the forests in the Kashmir hills. The lowest point would be, say, on the Kishanganga, and the nearest forest would be about 100 miles from Rawalpindi and about 200 miles from Jhelum. From Kaghan and the Murree Hills they are also bringing wood, which is also about 150 miles from Jhelum.

President.—What is the nearest forest from which you can get wood?

Sir Daya.—The nearest forest for blue pine would be about 100 miles from the Sales Depôt at Jhelum and from Lahore 200 miles.

President.—It means taking your wood partly by river and partly by rail?

Sir Daya.—Mostly by river and only the last 100 miles by rail.

President.—That must cost you something in handling?

Sir Daya.—Very little, because the river-borne timber does not cost much. There is not much difference for instance between timber purchased at Muzaffarabad and at Jhelum except the handling at the depôt. When they take out the wood from the river and stock it, it comes to not more than 3 to 4 pies or even half an anna per c. ft. That is the river handling.

President.—Is the depôt connected with the railway station?

Sir Daya.—Jhelum is a railway station. Both at Dhilwan and at Jhelum, there are railway sidings right in the depôt.

President.—If you can get the wood that you want at these rates, it does not seem to me that there is any good ground for your thinking of making splints in Kashmir.

Sir Daya.—The only thing is, as has been explained this morning, that blue pine does not give as good splints as we can get out of poplar. The quality is different in the two classes of splints.

President.—Does not poplar come at the depôts at all?

Sir Daya.—No, not at Jhelum. It is not an easily floatable timber. It is water-loggable and it would not be possible to bring down poplar logs to Jhelum although the cost of carriage would be infinitely smaller.

President.—This proposition of yours does not seem to me to be feasible because your costs would not be very much reduced.

Sir Daya.—It would not be reduced at present; but, as I tried to explain the other day, there are prospects which may reduce the costs, namely, facilities as regards means of communication and so on. Even as it is, with that heavy cost of carriage my own conclusion is that it will not be more expensive to land these splints in Shahdara than what it costs us to manufacture the same with blue at Shahdara.

Dr. Matthai.—The comparison is between poplar splints made in Kashmir and blue pine splints made in the factory at Shahdara, is it?

Sir Daya.—Yes. I am only speaking from the little experiment that we have done, but even with that my conclusion is that poplar sticks or sticks made from any other variety of wood in Kashmir and finished at Shahdara do not cost more than the finishing of matches in Shahdara with blue pine splints and simul wood boxes, so that as far as the cost per gross is concerned, I am inclined to think that if we cannot reduce it beyond our present cost at Shahdara, it certainly would not be more. On the other hand, the quality is by far better than what we are turning out with simul and blue pine.

Dr. Matthai.—Have you made experiments at Kashmir on a sufficiently large scale for you to depend on the results?

Sir Daya.—Yes, and on that I am speaking. I have been manufacturing off and on at 800 gross a day and exporting them by motor lorries.

President.—There also you cannot carry your splint factory from place to place. You will have to bring your wood to some central place.

Sir Daya.—Yes.

President.—As you go on cutting wood for splints, you will have to go farther afield for your supplies.

Sir Daya.—The wood cutting is done on a working plan system, on a sixteen year rotation.

President.—After 16 years you may have to shift.

Sir Daya.—No, we come back to the same block.

Mr. Mathias.—You have 16 coupes and you cut one coupe each year. By the time you finish the sixteenth, you come back to No. 1 again.

Sir Daya.—Yes.

President.—How long does it take to grow?

Sir Daya.—16 years to be used in the match industry.

Dr. Matthai.—How many feet girth would it attain?

Sir Daya.—4 feet girth and that is a very decent size from my own experience. I have taken up to 6 or 7 feet girth and I have also tried three feet girth and my experience is that four feet girth is the best with the local wood.

President.—From one coupe how much would you get?

Sir Daya.—A little over two lakhs of cubic feet.

President.—Does it grow in clusters?

Sir Daya.—It is grown in thick forests—six to eight feet apart—and they do it on the coppice cutting system.

President.—Are there any other trees in the same forest?

Sir Daya.—The whole forest consists of this species. There are two plantations—one of 1,000 acres and the other of about 1,500 acres.

President.—Whom do these plantations belong to?

Sir Daya.—They are Government plantations.

President.—Which Government?

Sir Daya.—They belong to the Kashmir Government.

President.—Is it willing to give you any special concessions?

Sir Daya.—Special concessions in this way that they allow me to buy timber on a seven year agreement and they are trying to give me the class of timber I want. In the past, they were not using that for any other purpose except fuel. It has to be improved upon now and as I am interested in this matter they receive advice from me and I am working with the Forest Department there to improve this into the class of timber that we want.

President.—Do you get uniform quality in the pine from that area?

Sir Daya.—We don't get any pine from these forests. They have only willow and poplar.

Dr. Matthai.—Your idea would be, I suppose, that if blue pine is found less satisfactory for splints, to give up blue altogether and to use simul for boxes and poplar and willow wood for splints.

Sir Daya.—Yes, if we can get in sufficient quantities.

President.—You are making splints from these?

Sir Daya.—Yes, we tried willow.

President.—Is that not more suitable for boxes?

Sir Daya.—For boxes, I consider willow would be on the whole better.

President.—Have you got any boxes made out of willow?

Sir Daya.—Unfortunately we did not think of bringing some with us, but I will send you some sticks as well as veneer for boxes, immediately I return to Lahore.

President.—The poplar does not float, does it?

Sir Daya.—It can float. If you can bring it down in a day or two, it is all right. But if you allow it to remain in water for a few days, it sinks. We fell the trees, cut them into logs, bring them down into the river bank and float them down quickly, within about 24 hours.

President.—What distance would it be?

Sir Daya.—The longest distance we have by the river above the factory is about 34 miles.

President.—That is rather quick.

Sir Daya.—We have done it. We have been cutting poplar on the 16th mile this last hot weather and it did not take us more than 10 hours to bring it down.

Dr. Matthai.—You can raft it?

Sir Daya.—We do. We bring it down to the factory site at the very outside in 24 hours. As soon as it is brought to the bank, the coolies working there carry the whole timber up and stock it in the yard.

President.—How long can you keep it in that stage?

Sir Daya.—We can keep it for six months easily in Kashmir without its being affected by the weather.

President.—If you were to bring it down here?

Sir Daya.—You could not bring it down as logs, that is impossible because of the heavy cost of carriage. Unless you make them into small billets you cannot bring them. There would be an extra cost per maund on the lorry which would be prohibitive. A maund takes about 2 c. ft.; that would be Rs. 2 per c. ft. landed at Rawalpindi and about Rs. 2-8-0 landed at the factory.

President.—How much would the splints cost at the factory?

Sir Daya.—The splint cost I have not actually worked out in detail, but I said, the cost of manufacturing splints *plus* the cost of carriage and everything else does not give a heavier figure than splints manufactured in the factory here with blue pine.

President.—We want to get some idea.

Sir Daya.—Roughly speaking you can take it this way. There, for instance, I estimate that we should be able to get per cubic foot something like 8 gross worth of splints and about 5 to 6 gross worth veneer, so that altogether it would mean, with an allowance for wastage, an average of about 4 to 5 gross per c. ft. and the carriage of one barrel of, say, 20 gross worth, costs at the rate of Rs. 3 per maund, taking a barrel at 15 seers each, Rs. 1-2-0.

President.—Do they charge by weight or measurement?

Sir Daya.—By weight.

President.—They take a lot of space in the lorry?

Sir Daya.—These are our contract rates. After all they are hard packed and they make up the full load of the lorry which can carry at the most one ton load, which is all that is allowed on that road.

President.—It would mean about 200 of these?

Sir Daya.—No, it would be about 70 barrels in a lorry.

Mr. Mathias.—There are five bundles in these barrels?

Sir Daya.—No, 10 bundles go in each barrel. Each tunnel has got 10 bundles in it. The barrel is about 15 seers in weight, so that the cost of transport really *plus* the actual cost on the wood—because there is a difference in the price of wood also; here blue pine costs us 12 to 13 annas per cubic foot and there we could get the same thing at 4 annas a cubic foot locally though the difference is made up by this heavy cost of transport—the two put together do not cost more than blue pine splints manufactured at the Shahdara (Lahore) factory.

President.—How do you get your power?

Sir Daya.—We have got a hydro-electric installation in Kashmir.

President.—Is it cheap?

Sir Daya.—Yes.

President.—What do you do about drying?

Sir Daya.—We have a sort of drying chamber, but I have not got a drying drum. I have now decided to do the thing properly and have ordered a drying chamber with drying drums in it, and instead of having one long drum which is very difficult to carry I have ordered a drum somewhat like this (sketch shown). This is easier to carry.

Dr. Matthai.—What amount of labour have you to employ in your splint factory to produce 800 gross a day?

Sir Daya.—It is very difficult to say because, as I have explained it has not been carrying on the work on a regular scale so far.

Dr. Matthai.—What do you estimate it at?

Sir Daya.—I can't give you any exact idea. It is something like the same as you noticed in our Lahore factory—altogether about 60 men.

President.—What sort of labour do you get there?

Sir Daya.—They are all Kashmiris. They are untrained labour.

President.—Do they come in for this sort of work?

Sir Daya.—Yes. There are some undergraduates at my factory working at the timber yards.

President.—After having brought them at the factory here you have got to boil the splints?

Sir Daya.—Not necessarily if we finish them there, after we get these drying drums, they will be impregnated and then they will be brought down here in bundles (in barrels) and will be taken direct to the Simplex, without any more polishing or impregnation, and then to the box filling. At present we send them as unfinished splints only, these have to pass through the drying drum again after being impregnated. They have to pass through the same process over again because I have no means at present in Kashmir of polishing them in the process of drying.

President.—Have you got any official report on the quantity of this kind of wood available in Kashmir?

Sir Daya.—There is no official report by the forest department nor have I been able to compile one but from the survey that I have made I have a rough idea of what quantity is available in the country.

President.—And you estimate it at 200,000 c. ft.?

Sir Daya.—That is only out of one block every year.

President.—There are two blocks which are being worked just now?

Sir Daya.—There are two forests and one of these has not been made available for this class of timber yet, but probably in 1929 it would be.

President.—200,000 c. ft. is 4,000 tons—that may be more than sufficient for you but it is not a very large quantity.

Sir Daya.—That is one block; if the second forest is opened it will be another 5,000 to 6,000 tons, making in all about 10,000 tons.

President.—That is the only wood available as far as you know?

Sir Daya.—Yes, in the valley.

President.—That is entirely poplar and willow.

Sir Daya.—Yes. Besides that what I am trying to get at is the feasibility of getting spruce from the nearer forests in the valley itself instead of waiting for that timber to come down all the way from Kashmir to Jhelum and selling at the depôts.

President.—Has spruce been tried and found satisfactory by you?

Sir Daya.—If spruce is in fresh condition, it makes very fine splints. I will send you some splints made out of spruce from Kashmir, but I should like to explain that they are not polished or finished. I made some experiments with spruce just to find out what sort of splints it made. The splints are quite good although not of the same quality.

President.—Is it available in large quantities?

Sir Daya.—Yes, in very large quantities.

President.—Does it grow in clusters?

Sir Daya.—In clusters in this way that there would be one continuous forest for miles having spruce only. Beyond a certain altitude you don't get anything but spruce.

President.—What altitude would it be?

Sir Daya.—It begins from 7,000 ft. and goes up to 10,000 ft.

President.—Is labour always available there?

Sir Daya.—Yes. The forest people are always working in the spruce forests. The forest contractors work other timbers; along with spruce you will find blue pine. They don't bring down the spruce because there is no demand for it.

President.—Has spruce any other commercial use?

Sir Daya.—As constructional timber it has little value because it cannot stand water.

President.—Then it must be different from the European spruce out of which they make paper?

Sir Daya.—I say it does not stand water as constructional timber, but if you want to make pulp for paper you can make it. For constructional purposes it is not good; it can't stand the weather and it deteriorates.

Dr. Matthai.—You have not tried silver fir for splints, have you?

Sir Daya.—Yes, we have. But spruce is a little better than silver fir. Silver fir gives whiter splints but spruce has got more strength and stands polishing better. As regards the quality of the wood they are more or less the same.

Dr. Matthai.—The Punjab Government in a note say "The Kashmir State will produce 5 to 6 million cubic feet per annum of which probably 1 million cubic feet could be exploited immediately".

Sir Daya.—I should think so. As a matter of fact the other day they offered me in connection with the pulp proposition to work these forests. The difficulty was to work them down to an economic rate, but as far as the quantity is concerned they have something like 3,600 square miles of spruce forest alone in the state.

Mr. Shib Kishan Kaul.—They gave an estimate of 2 million cubic feet altogether.

President.—That is about 40,000 tons.

Sir Daya.—Yes.

President.—That is not big enough for paper.

Sir Daya.—That is so.

Mr. Mathias.—Will there be any advantage in locating the factory in Kashmir and merely exporting your matches from Kashmir?

Sir Daya.—I say no, in the present circumstances, because the cost of transport is very heavy.

Mr. Mathias.—You mean it will be still heavier for finished matches?

Sir Daya.—I should think so because it will mean double carriage for everything—paper, chemicals, machinery and everything else—that will increase the capital outlay, and then everything that has got to be used there for the finishing of the matches will have to be carried and then brought back again. Then again, you could not carry a machine like the Simplex.

President.—Is there any difficulty about bridges?

Sir Daya.—The bridges there are allowed to bear 1½ ton loads; they don't allow heavier lorries to go on these bridges.

President.—In addition to the weight of the lorries?

Sir Daya.—Yes.

President.—That is not very much.

Sir Daya.—That is the trouble. As a matter of fact the peeling machines and so on which I carried out these experimental purposes—It was only

an experimental thing at that stage—it was an awful business to take them up. We split them up into as many small parts as possible and put them together there. Heavy machinery is not possible to transport.

President.—Owing to the difficulties about bridges?

Sir Daya.—Yes, the bridges are not strong enough.

President.—Are there many bridges?

Sir Daya.—There are many. There are small brooks and streams joining the river. The river you only cross once and you don't cross it again till you get into Srinagar.

President.—Are the Government of the Punjab interested in this proposition of yours?

Sir Daya.—Yes.

President.—What sort of assistance do they give?

Sir Daya.—To begin with when we started it was more or less a sudden surprise on them because I had not negotiated with these people as I did not believe in talking about things without showing them the *bonâ fides* of our wish to start the thing actually. Then after I started the factory I approached the Punjab Government—I saw His Excellency the Governor and he was interested in it—and Government have asked the Forest Department to render us such assistance by way of supplying suitable match wood as they can. During the last two years they have brought down a certain quantity which they asked us to try and we have tried that wood.

President.—What wood is that?

Sir Daya.—That is blue pine and we have found that blue pine certainly better than we could find in the market. We are trying to find an economic way of working it. The difficulty with blue pine is that there is a market for this wood for constructional purposes and the Forest Department feel diffident to sell it at a cheaper price for the match industry. Naturally it is not so paying for them to bring down blue pine for match factories.

President.—Poplar has no other use.

Sir Daya.—They have not got any poplar.

President.—Is poplar used for any constructional purpose?

Sir Daya.—No, except by the zemindars in the Kashmir valley. They use it for roofing purposes. They use the whole tree.

President.—I hope that you will be able to carry out your experiment successfully; it may lead to good results from your point of view. Have you ever contemplated the possibility of being able to manufacture splints and to supply them to other people?

Sir Daya.—I have, but I am not in a position to say yet how far we shall succeed in doing so. It all depends on what agreement I can arrive at with the Kashmir State on that point. If they guarantee to me the supply of the quantity which I have estimated now, I think I should be able to bring down 5,000 gross worth to Shahadara. Beyond 5,000 I should certainly sell to others if they find it economic to buy. I estimate in course of time, say, in five or seven years, we should be able to manufacture 5,000 to 7,000 gross splints.

President.—If anybody sold splint, he would not sell it unless he made a profit. It is all right for you to make your own splints and make a profit on the matches; whereas the other man would want his profit on the splints.

Sir Daya.—He would have to compare his own cost with what we would be prepared to sell him at. If he finds our splints cheaper, he would buy them from us.

Mr. Mathias.—The range within which you could sell your splints would be limited owing to the cost of carriage.

Sir Daya.—We could not go beyond a certain point.

Mr. Mathias.—You could not supply to Calcutta for instance?

Sir Daya.—That would be out of the question. After all I don't think there will be room enough to go beyond that stage.

Dr. Matthai.—Considering the market?

Sir Daya.—Considering the sources of raw material there is a limit to which it can go. My own feeling in the matter is that for each area the source must be such as can supply raw material to that area most economically. It may be economic, for instance, to make splints at cheap costs in the north Punjab for carriage up to Delhi, but if you take them down to the Central Provinces, it may not be economical.

Mr. Mathias.—The market in the Punjab and in the United Provinces is artificially protected by the railway freight?

Sir Daya.—Yes.

Dr. Matthai.—You don't regard mango seriously as a source of supply, do you?

Sir Daya.—We have tried it for boxes.

Dr. Matthai.—Does it not make good splints?

Sir Daya.—We have never made splints out of that.

Dr. Matthai.—We have got results of experiments made by a great many people and by the Forest Research Institute and they put blue pine and mango as the best for splints.

Sir Daya.—I don't believe in mango splints. It makes boxes all right.

Dr. Matthai.—Have you got it in sufficient quantities?

Sir Daya.—I don't think so. There is no regular plantation of mango trees which could be depended upon, but of course in the United Provinces there is.

Wood wastage.

President.—As regards your consumption of wood you put it down at 35·7 c. ft. per 100 gross. That is the highest figure we have got so far.

Sir Daya.—I can explain that at once. From what we had told you in our replies, the conclusion you have drawn is perfectly natural, but that was the inevitable result of buying our timber in the open market. When we started we bought whatever timber we could get irrespective of quality and the wastage was terrific. That accounts for this high figure. We know now that with the Kashmir timber the wastage is much smaller and we can get finished splints—about 8 gross out of 1 cubic foot.

President.—That means for 100 gross about 12 cubic feet of wood?

Sir Daya.—Yes, and this is for ¾ size. As a rough estimate you can take the ratio between veneer and splints as 1 : 2.

President.—We have been trying to arrive at it in a different way, that is by taking the cubical contents of the wood in a 100 gross of finished boxes and splints. The cubical content of boxes is 2·64 c. ft. against 3·82 c. ft. for splints: that is for half size. For the full size it is 4·16 c. ft. for boxes and 6·76 c. ft. for splints.

Sir Daya.—That is not quite 1 to 2.

President.—That is the cubical content. I think that for the three-fourth size would be just about midway.

Sir Daya.—Here the ratio comes to 1 : 1¼. Ours is a mere rough calculation.

President.—You can just give us the cubical contents of boxes and splints.

Sir Daya.—When you see the figures which we have sent you in the form of a statement you will find that the wastage was very heavy.

Dr. Matthai.—On your Kashmir figures you would get about 5 gross finished matches from one cubic foot of wood?

Sir Daya.—I should expect, say, 4 to 5 gross per cubic foot while with us here at Shahdara the average does not go beyond 3; it is actually 2·9.

Dr. Matthai.—That may be taken as between fresh and old wood. But in your case the difference will be very much greater.

Sir Daya.—Are they not using imported wood?

Mr. Mathias.—They are using imported aspen.

Sir Daya.—There is very little wastage on that.

Mr. Mathias.—They are using Indian wood too.

President.—If you take 12 c. ft. and 8 c. ft. it would give you 20 cubic feet for 100 gross.

Sir Daya.—Yes, roughly that.

President.—That would compare very favourably with aspen.

Sir Daya.—It ought to.

President.—In the case of the fresh aspen they require about 20 c. ft. for full size, for 100 gross.

Sir Daya.—So we are very near that.

President.—You would be very near that figure.

Sir Daya.—That is our experience last year. I think that we can improve on that slightly.

President.—In this enquiry there has been one very unfortunate feature, *viz.*, that nobody has kept proper accounts.

Sir Daya.—The difficulty is we have not tried to keep our accounts very much in detail.

President.—The position is very curious. The Swedish Match Company have kept their accounts but they have been rather unfortunate in the quality of the wood. Therefore their figures have gone wrong. As regards Indians, none of them has kept any accounts that may be depended upon and the result is that we really have not got any exact figure for the quantity of wood that is really required and that, as you know, does not affect merely the supply of wood but the costs.

Sir Daya.—As regards the question of finding out the exact quantity, I can work it out for you.

President.—This may be all right as regards fresh wood but our wood is neither fresh nor very old. How are you going to determine between the two?

Sir Daya.—We must admit that that is the difficulty.

Mr. Mathias.—Between the wood which is 8 months old and the wood which is three months old, the difference in wastage is enormous.

Sir Daya.—Yes. 35·7 is the figure taken from the actual records: yet when I look at it, it makes the proposition of match making in India absolutely impossible to my mind and that is why I started making experiments in Kashmir to see if we could reduce the loss. The results so far are very encouraging. But it must be remembered that we have now only two years' existence and we have just started the thing.

President.—It does not make our work any the easier.

Sir Daya.—I can work it out for you in detail if you want.

President.—There is the qualifying condition always as regards the freshness of the wood about which it is very difficult to judge.

Sir Daya.—As regards the Kashmir supply there is no question about it.

President.—The Swedish Match Company claim that even if aspen is kept for six months, it is fresh and that it does not make very much difference. You say that it is fresh for only a week or at the most two months.

Sir Daya.—No, not the Kashmir wood.

President.—Do you mean in Kashmir itself?

Sir Daya.—I said for 6 months. Last year's stock is still going on and it is only with that that I have been experimenting. It is only for three

months in the hot weather that we need be anxious about. The moment we get on to the end of September, there is no fear.

President.—What about the hot weather months?

Sir Daya.—If you get your supply of wood cut by the end of March or beginning of April, then you have got to protect it only during May, June or July, and if you have sheds or tanks you can keep your wood better. What I am trying at present is that I am growing trees to provide the shade. Once we get on to September, there is no effect on the weather.

President.—You have given us the average for two years.

Sir Daya.—We have got annual averages too.

President.—Would you mind telling us what your averages for 1925-26 and 1926-27 were? What was your production? In 1925-26, it was about 100,000 gross.

Sir Daya.—The average in the first year was 334 gross per day.

President.—In 1926-27, it was 180,000 gross.

Sir Daya.—Yes, about 600 gross a day.

President.—Does your year begin from April?

Sir Daya.—Yes.

Costs.

President.—Would you mind telling us what your costs for 1925-26 were?

Sir Daya.—The average for 1925-26 was Rs. 1-9-1; that is, without interest and depreciation. The average for 1926-27 was Rs. 1-3-5.

President.—Would you mind telling me under what heads you made the saving of 5 annas 8 pies chiefly?

Sir Daya.—These are our costs for the two years:—

	1925-26	1926-27
	Rs. A. P.	Rs. A. P.
Timber	0 7 3	0 5 4
Paper	0 1 9	0 1 7
Labels	0 0 5	0 0 10
Chemicals	0 3 0	0 2 6½
Cases	0 1 2	0 1 6½
Fuel	0 0 10	0 0 6
Lubricants	0 0 3	0 0 2
Labour	0 5 2	0 3 4
Staff and establishment	0 3 5	0 2 2
General expenditure	0 1 10	0 1 5
TOTAL	1 9 1	1 3 5

President.—There has been a reduction of Re. 0-1-11 under wood and of 2 pies under paper.

Sir Daya.—Yes.

President.—But labels have gone up.

Sir Daya.—Yes, because we have introduced coloured labels. We got those labels made locally and so we had to pay more.

President.—Is it a permanent addition?

Sir Daya.—No. We are now getting them in larger quantities and so the cost will be very much smaller than what it is now.

President.—As regards chemicals there has been a drop of 5½ pies.

Sir Daya.—Yes.

President.—But cases have gone up.

Sir Daya.—Yes, slightly. That depends on what sort of wood we can get and the rate.

President.—Labour has gone down.

Sir Daya.—Yes; so has staff because the outturn has increased from about 300 to 600 gross. Similarly general expenditure has gone down because of the larger production.

President.—I just want to see how you are doing. As regards your capital, your block value is Rs. 2,41,000.

Sir Daya.—Yes.

President.—Your working capital you consider to be Rs. 1,20,000 to Rs. 1,50,000.

Sir Daya.—Yes.

President.—Roughly we will take it as Rs. 3 lakhs in round figures.

Sir Daya.—Roughly it would be Rs. 4 lakhs.

Dr. Matthai.—It is really Rs. 3,60,000.

Sir Daya.—Yes.

President.—You want 10 per cent. on that.

Sir Daya.—Yes.

President.—That is Rs. 36,000.

Sir Daya.—That is right.

President.—As regards depreciation you consider that insufficient.

Sir Daya.—The rate allowed by the Income-tax people we consider to be very low.

President.—We follow another method. We don't go by the figures given by the manufacturers. We allow 6¼ per cent. on the whole block. If you take the whole block value as Rs. 2,40,000 it would come to Rs. 15,000.

Sir Daya.—We worked it out at Rs. 18,000.

President.—It will come to about that. We allow 6¼ per cent. on whole block value.

Sir Daya.—That would be about right.

President.—Then, it comes to Rs. 51,000 (Rs. 36,000 *plus* 15,000). You have got to earn this in addition to the cost. If you take the capacity of your factory at 1,000 gross and spread it over the whole capacity, it comes to 2·72 annas.

Sir Daya.—That would be about right.

President.—We have to add that 2·72 annas or 2 annas 9 pies to Rs. 1-3-5 which is your present cost. It comes to Rs. 1-6-2. That amount should be your nett realization.

Sir Daya.—Yes.

President.—Now for marketing, you have to add some commission because you have to deal with commission agents.

Sir Daya.—We call them distributing agents. We give them 5 per cent.

President.—You give 5 per cent. on Re. 1-6-2?

Sir Daya.—It is 5 per cent. on the sale price.

President.—What is your selling price?

Sir Daya.—In 1925-26 it was Re. 1-12-4 and in 1926-27 it was Re. 1-7-0.

President.—The commission on Rs. 1-7-0 would be about 1 anna. Your fair selling price would be Re. 1-6-2 and if you are getting Re. 1-7-0, you are all right.

Sir Daya.—We ought to be all right.

President.—What is the foreign price of ¾ size matches?

Sir Daya.—Rs. 2-6-0 to Rs. 2-8-0 per gross.

Dr. Matthai.—In answer to question 51 you have given the prices of imported matches as Rs. 2-6-0 to Rs. 2-9-0.

Sir Daya.—Yes.

President.—The prices that you give are very much lower than the prices that they gave us. If you take Rs. 2-9-0 as their selling price and if you deduct Re. 1-8-0 duty, that gives them Re. 1-1-0. Under our terms of reference we have got to report whether you will eventually be able to do without protection. Now you can see the difference between Rs. 1-1-0 which would be their price without the duty and your fair selling price, which is Rs. 1-6-2, is higher than their price by Re. 0-5-2. It is a serious thing from your point of view.

Sir Daya.—Exactly.

President.—I want to know how you can reduce your cost by 4 or 5 annas.

Sir Daya.—To begin with, is Rs. 2-9-0 the correct figure?

President.—You have given me that.

Sir Daya.—This is what we have found out by trying to buy from wholesalers.

President.—Is it the Karachi price?

Sir Daya.—There are different prices for different ports. We got our agent to purchase some; that is how we discovered their price.

President.—I will give you their prices. They have not given us recent prices, but they have given their prices of last year. You have not seen their prices which will be published in course of time. They gave us 1*s.* 5*d.* to 1*s.* 6*d.*; that is c.i.f. If we take the exchange at 1*s.* 6*d.* to the rupee, that gives Re. 1.

Sir Daya.—That is near it.

President.—Then they add three annas for other charges.

Sir Daya.—That comes to Rs. 1-3-0 at Karachi.

President.—Then, the difference between you and them is 3 annas. There is the freight from Karachi to Lahore.

Sir Daya.—It would cost them another three annas I should think.

President.—That would make their selling price at Lahore Rs. 2-14-0.

Sir Daya.—Yes, with the duty of Rs. 1-8-0. The outward freight from Shahdara to Karachi is Re. 0-3-10 per gross.

President.—It cuts both ways. You may establish a case for doing without protection. Our position may be that there is no need for protection.

Retail prices.

Sir Daya.—Nowhere near it. Even at these figures it only shows you that as far as the price to the consumer is concerned without protection the price will probably be the same but there is this difference in the quality. If they were selling at Rs. 1-6-0 we could not sell in the market and we would be washed off.

President.—What do you put the difference at?

Sir Daya.—I should certainly think there is no gradation between prices. Either it must be one pice or it must be two pice. You can't quote 1½ pice or anything like that.

Dr. Matthai.—Take the wholesale price?

Sir Daya.—It again affects the consumer. The wholesaler must sell it to the retailer. The retailer must sell it at one pice or two pice. They have started an intermediate stage of 1½ pice but it is not convenient for the consumer to buy a box at 1½ pice.

Dr. Matthai.—Take the price at which the dealers buy from you?

Sir Daya.—Even then it must depend on how it sells retail, because the wholesaler stocking it has to dispose of it. When he disposes of it, he must do so through the retailer.

Dr. Matthai.—He need not necessarily sell by the single box.

Sir Daya.—The wholesaler never does.

Dr. Matthai.—The actual consumer may not buy matches in single boxes.

Sir Daya.—At the most he will do it by the dozen, half a dozen or a quarter dozen. He might come down to that. But again the position is this. If he can get it at Rs. 1-6-0 landed, on that he will want his rebate and the price must either be Rs. 2-4-0 or Rs. 3-6-0 or Rs. 4-8-0. These are the only three possibilities. His rebate or commission must come from Rs. 2-4-0, Rs. 3-6-0 or Rs. 4-8-0. Therefore if they can get their landing cost here in Lahore reduced to Rs. 1-6-0 then they stand exactly on the same footing as the local manufacturer with the same margin for the retail sale as we have. That means they will reduce it to one pice for retail sale and still have the margin between Rs. 2-4-0 and Rs. 1-6-0 which practically means a margin of 14 annas, and 14 annas is quite good enough for them. If their matches begin to sell at one pice each, in this competition the Indian manufacturer will be wiped off.

President.—It is only because there is this difference of Rs. 1-8-0 in the shape of duty between him and you that you are able to carry on?

Sir Daya.—Exactly. That has enabled the Indian manufacturer to sell at one pice, while it has made their price 1½ pice per box.

President.—One-half pice is the least margin of difference with which you can do.

Sir Daya.—As regards the difference, yes the very least for the same size.

President.—On the contrary, it may not be enough.

Sir Daya.—It may not be enough. I tried to explain in my answers what my reading of the situation was. Once the indigenous manufacturer is out of the market, they can raise the price. They have got a world monopoly. They may not be making large profits here on Indian sales, but if they are making larger profits elsewhere, their profit on the whole may be quite reasonable.

Mr. Mathias.—I don't quite follow how you arrive at 14 annas as the minimum protection.

Sir Daya.—I did not say that. I said that was the margin of rebate which they had to give to the stockists. The retailer cannot sell at more than Rs. 2-4-0 per gross or one pice per box. We sell it to the stockists at Rs. 1-6-0 or Rs. 1-7-0. Supposing we sell at Rs. 1-7-0, that leaves a margin of 13 annas between the man who stocks wholesale and the retailer.

Mr. Mathias.—Supposing the duty was reduced from Rs. 1-8-0 to 4 annas that would make their selling price about Rs. 1-11-0. Rs. 1-11-0 would not leave sufficient margin for the retailer's commission and the retailer will have to sell at 1½ pice per box.

Sir Daya.—The quality being better, the wholesaler may still find a better return on this because it will be a quicker return for him.

Mr. Mathias.—Supposing on the other hand you raised the price to Rs. 2, you raise it up to such a position that the retailer would have to charge 1½ pice per box and yet the duty would be considerably below what it is at present.

Sir Daya.—You can make it so just to bring it to Rs. 2-4-0. Supposing you made this cost come to Rs. 2-4-0 the retailer could not sell at one pice per box because there would be no profit.

Mr. Mathias.—Supposing we made it Rs. 2?

Sir Daya.—They might cut their profit down. They might agree even to sell at a loss.

Mr. Mathias.—If they had to sell at Rs. 2, the retailer would have to sell at 1½ pice.

Sir Daya.—Yes. The point is that so long as you keep him out of the boundary of one pice, it will be a sort of protection to the indigenous manufacturer.

Mr. Mathias.—But then, as Sir Padamji said, these figures would theoretically indicate that the present duty could be reduced.

Sir Daya.—Speaking theoretically it would, but practically, and from the trade's point of view, I say that it would not be safe. The reasons are obvious. For instance, supposing they decided that in the competition with the duty reduced they would flood the Indian markets with their manufactured articles and bear a certain amount of loss on them for a little while, what would be our position?

Mr. Mathias.—You base your case really on the possibility of their selling below the cost of production, without profit?

Sir Daya.—Yes, below their cost of production only for a time. If they continued that game for about three years that would kill every indigenous factory.

President.—On the other hand if this duty is kept at Rs. 1-8-0 it would put them to such a heavy loss that they cannot reduce the price below the present level.

Sir Daya.—You can't put them to any loss because we know that with this duty they have easily come down to Rs. 1-3-0, (including what they call handling charges)—

President.—Burma takes about 1½ million finished matches to-day. So far as India is concerned, their imports have fallen.

Sir Daya.—They are manufacturing locally, are they not?

President.—I am just talking of foreign competition. This is as far as they can apparently go; they can't reduce their prices any more.

Sir Daya.—Below Rs. 3-6-0?

Dr. Matthai.—Below a margin of Rs. 1-2-0 between your price and their price?

Sir Daya.—How do you work that out?

Dr. Matthai.—I just deducted from Rs. 3-6-0, which is their price, Rs. 2-4-0 which is your price.

Sir Daya.—Yes.

President.—If it is possible for them to go below the present nett price which they get now, then they can increase the sales and kill the industry.

Sir Daya.—That would so, but my point is that it is only with the present duty of Rs. 1-8-0 that you are able to keep them at that stage. Reducing the duty might enable them to sell it still cheaper and that would be a greater inducement for the wholesale stockists to buy their manufactured articles rather than the indigenous goods. That is the point. We have now enough experience that with duty they have not been able to cut any further in spite of the fact that the indigenous industry is rising daily. The stage at which they could kill the Indian enterprise has to my mind been tested for two or three years now.

Dr. Matthai.—You are putting it on this ground that this duty is the duty which you more or less require in order to overcome the prejudice against locally made matches?

Sir Daya.—That is one point, and a very important point too, and I would supplement it by one more—and that is to enable the indigenous manufacture to improve his quality. Talking from my own experience—two years ago we had not the same experience as regards the quality of splints and veneer which we have to-day—we are trying now to economise expenditure and there again it will take some time before we get really to the best finish we can with our available raw material and when we

reach that stage we shall be in a position to say that this is the lowest limit to which we can go.

President.—How do you expect to effect economies in the future in the costs which you have given us?

Sir Daya.—We have given you our costs.

President.—Where do you expect economies? The Western India Match Company have given us their costs as Re. 0-15-1 for half size. The cost of their wood—they are using aspen for splints—is Re. 0-5-3. Their cost above wood is pretty nearly the same as yours. As regards other things, it is not going to make any difference whether it is half size or three quarter size, is it?

Sir Daya.—That is almost negligible.

President.—The cost above wood in their case is Re. 0-9-10 against yours Re. 0-14-1. That is nearly a difference of 4 annas 3 pies.

Sir Daya.—Yes.

President.—Already they have brought down their costs below yours by 4 annas 3 pies.

Sir Daya.—I think we can reduce our costs too. I have not worked them out here in absolute detail to show what the possibilities are. That you can verify from the results which I have obtained without going into absolute details. I have touched in 1927 the lowest cost which is Re. 0-15-4.

President.—What month was it?

Sir Daya.—April, 1927; that is against without depreciation and interest.

Dr. Matthai.—Give us a figure excluding wood.

Sir Daya.—It will be Re. 0-11-8 (0-15-4 *minus* 0-3-8) and theirs is Re. 0-9-10. The cost of paper and labels was (0-1-7 *plus* 0-0-10) Re. 0-2-5. This month it has come down to Re. 0-2-1 against an average of Re. 0-2-5 in 1926. There again I believe we can still lower the cost, if we order paper and labels in larger quantities. Then again their cost is for half size and ours is for three quarter size. Paper and labels would make a difference—though not much owing to the size. Packing cases also would make some difference.

President.—Your labour is very much higher than theirs. Their factory labour is Re. 0-2-1.

Sir Daya.—Our labour was Re. 0-3-4 and it was even lower in April.

President.—How do you account for it? The Swedish people are not even using the Simplex.

Dr. Matthai.—Probably the Bombay rates are higher?

Sir Daya.—Do they employ women?

Mr. Mathias.—Yes.

Sir Daya.—Then they are not paying higher rates than we are.

President.—The Simplex alone will make a lot of difference. If they are to use the Simplex they will require about six or seven of these machines.

Sir Daya.—Their chemicals and other things must be cheap.

Dr. Matthai.—In regard to chemicals also the size of the match would make a difference *e.g.*, as regards parafining?

Sir Daya.—Paraffining will not make much difference.

President.—In your case, railway freight on other things—paper chemicals and so on—would make a pretty good difference in the cost but I can't understand about this labour at all.

Sir Daya.—The lowest labour figure that we have touched in any month is Re. 0-2-5, that being in May 1926.

Mr. Mathias.—What was the output in that month?

Sir Daya.—19,875 gross.

President.—Your average output was 600 gross a day. If you got your full output of 1,000 gross a day, except the men in the yard I don't think your labour would go up.

Mr. Mathias.—I think your expert told us this morning that with further experience you would be able to reduce the number of men on some of the machines.

Sir Daya.—Yes.

President.—What was your wage bill in 1926-27?

Sir Daya.—Rs. 36,594.

President.—That was for 600 gross a day.

Sir Daya.—Yes.

President.—If your output went up to 1,000 gross a day, I suppose you would require only a few more men for the handling of materials, and nothing more?

Sir Daya.—Yes, but not on the machines.

President.—If we divide Rs. 36,594 by your actual output it comes to Re. 0-3-4 but if we divide it by the full output, it would be just under two annas.

Sir Daya.—Yes, so you see we can reduce it there. It may be interesting for you to know that in August 1927 it worked out to Re. 0-2-6, the same as in May.

President.—What was your production then?

Sir Daya.—May—27,326 gross. August—18,468 gross. I would not depend upon May for your purposes but August is a certain figure.

President.—Would you agree that if we were to take your wage bill as you have given it and then take your full output as 1,000 gross, we would be justified in saying that your wage bill would not increase appreciably?

Sir Daya.—I should think so. It would make a little difference but not an appreciable difference.

President.—But then you are working three half shifts, that does mean a little increase in the wage bill.

Sir Daya.—That we only started in January 1928. That is not included in these figures at all.

Dr. Matthai.—You can do 1,000 gross a day by working 10 hours.

Sir Daya.—Yes, by pushing the machine to its utmost limit. 800 gross a day which our engineer gave you this morning is the easy output which we can do.

President.—There is one figure which is missing. Is the land your own?

Sir Daya.—It is Government industrial land and is leased to us—6 acres at Rs. 96 per acre.

President.—Roughly it would be Rs. 600 a year?

Sir Daya.—Yes.

President.—In 30 years it would be about 20,000 rupees?

Sir Daya.—Yes.

President.—Do you think that you could buy a piece of land for that amount?

Sir Daya.—I offered to buy it but they have not decided it yet.

President.—You ought to have taken it in your block value.

Sir Daya.—We have included it in the general expenditure.

President.—There is this question about internal competition. You made certain statements about the Swedish Match Company. Of course we are examining them but there is one point in the earlier representation that you sent jointly with others in which you ask for a sort of discriminat-

ing excise duty against foreign capital. The point has been raised by you and it has also been raised by other people.

Sir Daya.—When you asked me this morning whether I was representing others also here, I said "no". This clause 4 was put in really at the instance of the Ahmedabad people.

President.—You are not pressing for that, are you?

Sir Daya.—No.

President.—That is not a very practical proposal.

Sir Daya.—It is not our point.

President.—What I wish to know is, you don't want to press the point about the discriminating excise duty, do you?

Sir Daya.—No.

President.—As regards the Swedish Match Company, have you any proposals to make?

Sir Daya.—As a matter of fact our idea is No. 5 which is that any fresh tax levied on the manufacturers using indigenous timber would be ruinous in the interests of the country. That is the view I take.

President.—What fresh tax are you contemplating?

Excise duty.

Sir Daya.—Anything by way of excise duty or anything else for balancing the budget.

President.—Supposing an excise duty were levied and the import duty was also raised by the same amount so that the difference remained the same, what would be your view?

Sir Daya.—My feeling would be that it would not encourage the local manufacturers because that would raise the price. The criterion would be one pice or two pice.

President.—Supposing for the sake of argument we said Re. 1-8-0 excise duty and Rs. 3 Customs duty, it would mean that the difference would be the same. The excise duty of Re. 1-8-0 will put the price up by 1½ pice.

Sir Daya.—It would mean that our selling price of Re. 1-7-0 to-day goes up to Rs. 2-15-0 which makes it prohibitive to sell at 1 pice.

President.—You may sell it at 1½ pice.

Sir Daya.—What would they be selling at?

President.—They would sell at 2 pice because the duty also goes up by Rs. 1-8-0.

Sir Daya.—Over and above what they are paying now?

President.—What I mean is that the Customs duty goes up by the amount of the excise duty.

Sir Daya.—The great point of the indigenous manufacture is its catching price of one pice per box. That is going to the secret of its success.

President.—Supposing your costs came down to 15 annas and 3 annas was added for your other charges, depreciation and so on, that means Re. 1-2-0.

Sir Daya.—You want to add Re. 1-8-0 to that, do you?

President.—Yes.

Sir Daya.—With the excise duty of Re. 1-8-0, it would be Rs. 2-10-0.

President.—Yes.

Sir Daya.—Let us examine the position of the importer then.

President.—We have taken the price of the importers as Rs. 2-15-0 to which we add Re. 1-8-0. That brings their price to Rs. 4-7-0.

Sir Daya.—So that they cannot sell even at 2 pice per box.

President.—That is all right for you.

Sir Daya.—If those figures are correct. It means that the local manufacturer cannot sell his matches at one pice per box.

President.—The Indian manufacturer will sell at 1½ pice and the other man will sell at 2½ pice, or say you sell at 2 pice and the other man sells at 3 pice. How are you worse off in that case? You are put exactly in the same position as the importer.

Sir Daya.—What about the consumer?

President.—We can only deal with one evil at one time. The consumer does not come in where taxation is concerned.

Sir Daya.—I was only trying to get at the root of the thing as to what effect it will have on the trade. If Re. 1-8-0 is added to what is declared to be their cost price at present.....

President.—Take Rs. 2-8-0.

Sir Daya.—Rs. 2-8-0 *plus* Re. 1-8-0 makes Rs. 4, and as I said that would give them a margin. They could easily afford to lose a little.

Dr. Matthai.—When they sell at 2 pice, you sell at 1½ pice.

Sir Daya.—1½ pice will not catch the market. The competition started with one pice against their two pice with the result that they brought it down to 1½ pice.

Dr. Matthai.—If the difference between the two prices is less than 1 pice, then you think that your position might be in danger.

Sir Daya.—I think so. They will find some other device. On the other hand the position that I allege, as far as the consumer is concerned it makes absolutely no difference whether the price is Rs. 4-8-0 in retail or Rs. 3-6-0 in retail because it does not go beyond two pice. He has been buying at 2 pice. He does not feel the burden. Against the two pice he is getting for 1 pice a match which is very attractive so that it gives the indigenous manufacturer a market. Therefore it is to my mind a very important factor for the indigenous manufacturer to find a sale for his products.

Dr. Matthai.—Let us take the excise duty as one rupee. Your fair selling price is Re. 1-2-0. If you add the excise duty to that, it comes to Rs. 2-2-0. In that case at what price would you sell to the consumer?

Sir Daya.—Not less than 1½ pice.

Dr. Matthai.—At present the price is 1 pice to the consumer, that is to say Rs. 2-4-0 per gross. What is the margin that ought to be allowed in any case between your price at the factory and the selling price to the consumer that would keep the price at 1 pice?

Sir Daya.—13 to 14 annas.

Dr. Matthai.—Supposing the margin is reduced to 8 annas?

Sir Daya.—If the importers could not afford to give up 8 annas this eight annas on the indigenous manufacture would certainly retain the sale at 2 pice.

Mr. Mathias.—If you push up prices in this country beyond a certain level—no matter what the quality is—the consumers are averse to take it. If they charge for the imported matches, say, 4 pice, no one will buy it.

Sir Daya.—Exactly.

Mr. Mathias.—So that even if your price is 1½ pice and theirs is 2 pice, there is quite a chance that it will divert a large portion of the market from the imported to the indigenous product.

Sir Daya.—I quite agree there and I think that is the criterion on which every indigenous manufacturer can base his efforts. But the point is between 1½ pice and 2 pice the difference is so small that for a time they may feel tempted to lose something on it and cut down the figure to 1½ pice.

President.—You may assume that if they do that, the import duty goes up.

Sir Daya.—Then, I say 'yes'.

President.—We assume that these prices will continue. As you know in our reports we always say that. We assume that the prices will remain at the level at which we put them. If they don't Government have the power to increase the protective duty, so that you must leave that out of account, the question of their reducing the price any further.

Mr. Mathias.—Apart from that it is correct to infer is it not that with the present import duty of Rs. 1-8-0 it has been impossible for the Swedish Match Company to further reduce their price?

Sir Daya.—That is what I understand to be the position.

Mr. Mathias.—So that if you put another Rs. 1-8-0 on, they can't reduce their price.

Sir Daya.—My objection to the duty of Rs. 1-8-0 is this. It places the Indian manufacturer in the somewhat awkward position of having to sell his matches at 1½ pice.

President.—You say the man would sell at one pice.

Sir Daya.—Yes, the retailer.

President.—He gets it from you just now at Re. 1-7-0. It pays you to sell at Re. 1-7-0 and it pays him to sell at Rs. 2-4-0. Now there is a reduction in your costs. You bring your costs down to Re. 1-2-0. That reduction of 4 or 5 annas per gross does not benefit the consumer at all. It goes into the pocket of the retailer.

Sir Daya.—Not necessarily into the pocket of the retailer.

President.—Who pockets it?

Sir Daya.—What will probably happen will be that if the competition goes on like this we shall have to give a little more commission to the middlemen, that is to the wholesalers.

President.—The middleman pockets it. The consumer and the Government do not get the benefit. You don't get the benefit either. It is the middleman who pockets the benefit. You cannot construct any scheme of protection merely for the benefit of the middleman, can you?

Sir Daya.—Not for the middleman.

President.—This is the ridiculous position. Supposing he is to sell always at 1 pice—no matter what your wholesale price is—he simply pockets the money.

Sir Daya.—Yes, for some time to come. This protective duty will be only for a time and it will not be for all times.

President.—The protective duty will continue if protection is required.

Sir Daya.—That is till such time as the Indian manufacturer knows that he has got a market as much as he can economically keep, and he has to give the wholesaler some inducement to create a market for him.

President.—At present he is satisfied with the difference between Re. 1-7-0 and Rs. 2-4-0, that is 13 annas. But when your costs have come down, he would want Re. 1-2-0. That seems to me to be rather an unnecessary position.

Sir Daya.—Your objection is why give him a larger profit?

President.—Yes, he does not do anything more.

Sir Daya.—But that will be the position in any case.

President.—If the duty is so adjusted that the price goes up by say half a pice or 1 pice for both you and the Swedish Match Company, then instead of the middleman pocketing a certain amount, Government gets the revenue.

Sir Daya.—Would not that be the case even if you put on the excise duty because your rate is the same whether the costs come down or not. For instance we are now at Re. 1-7-0 and Re. 1-7-0 *plus* Re. 1-8-0 would be Rs. 2-15-0. In course of time we hope to get down from Rs. 2-15-0 to Rs. 2-10-0. We are at present at Rs. 2-15-0 and at Rs. 2-15-0 they would

be selling at 1½ pice. But when it is reduced from Rs. 2-15-0 to Rs. 2-10-0, the difference of five annas would still go to the same man.

President.—That is the pity of it.

Sir Daya.—Can you help it?

President.—You increase the price by half a pice and it will enable the Government to get some revenue. But if the price always remained at 1 pice, Government could not get any revenue at all.

Sir Daya.—That is from the Government revenue point of view.

President.—According to our terms of reference we have to go into that question, and I am discussing it from that point of view.

Sir Daya.—I see the point, that by giving additional Re. 1-8-0 on the Indian manufacture also you would keep the margin whereby you would encourage the indigenous enterprise.

President.—If you are going to keep your price always at 1 pice and the middleman requires 13 to 14 annas, Government can never get any revenue out of that at all. If Government wanted any revenue the price of Indian matches must go above 1 pice to the consumer. That is the position.

Sir Daya.—I am trying to find a solution for that. On the present figures it costs him Rs. 4-7-0.

President.—Take it as Rs. 4-8-0.

Sir Daya.—What would you wish him to sell at?

President.—He cannot sell it at less than 2½ pice.

Sir Daya.—That is a very awkward figure. He may have to sell at 3 pice.

President.—At 2 pice, he goes out. At 3 pice, he will not find anybody buying his matches. The Indian consumer may not pay twice the amount.

Sir Daya.—What about Government revenue? It goes out in that case.

President.—There is the excise.

Sir Daya.—The Indian manufacturer has not gone to that extent.

President.—I am not talking of the present moment. Supposing the Indian manufacturer is able to sell his matches, before long he may be able to reduce his costs. At that stage he will sell at 1½ pice and Government will get Re. 1-8-0.

Sir Daya.—I quite see the point, but I am looking at it from a different point of view. At present the Government revenue is I believe estimated on something like 50,000 gross daily of imported matches.

President.—Government revenue to-day is very little because imports have gone down to 3 million gross.

Sir Daya.—That is because of the imported logs.

President.—The revenue from imported logs is Rs. 3 lakhs and that is nothing.

Sir Daya.—It means practically that all the revenue from the import duty of Re. 1-8-0 per gross has got to be made up from the excise duty on the indigenous manufacture of matches and unless the quantity of the indigenous manufactures reaches the stage of being able to shut out the imports completely, the Government revenue will not benefit.

President.—What would happen if the imports are shut out?

Sir Daya.—The entire consumption will be supplied by the country itself and that means Government will get Re. 1-8-0 on the total quantity consumed in the country. In that case, it would be all right; but till such time as that position is reached, levy of excise duty would injure indigenous manufacture.

Mr. Mathias.—Last year the outturn of matches in India was at least 10 million gross.

Sir Daya.—Is it really as much as that?

President.—The imports have come down to nearly 3 millions.

Sir Daya.—My feeling about this is that the majority of the stuff that used to come in the form of finished matches are now manufactured from the imported wood, because the costs are smaller.

President.—The imported wood is used where indigenous wood is not available.

Sir Daya.—What quantity has the indigenous wood produced?

President.—Half and half. The local manufacturers say that in Bombay they are using practically all imported wood for splints but they use very little of it in Calcutta so that you see there is not much in that.

Sir Daya.—In that case I should personally feel inclined to think that an additional duty in the shape of excise would be a harmful thing.

President.—The import duty is put at such a level that the imports practically die out.

Sir Daya.—Or if they wish to come into competition, it would be very costly for them.

President.—It would be much more expensive for them. Supposing the duty goes up from Re. 1-8-0 to Rs. 3 they have got to lose in any case if they want to compete.

Sir Daya.—If it comes to Rs. 3 they cannot apparently have much margin of profit left for sale at six pies a box. To the duty of Rs. 3 must be added the actual cost *something in the shape of cost* Rs. 4 is the very lowest at which they can land at a seaport. That leaves them on the 2 pice rate only 8 annas. Whether that would give sufficient inducement to the wholesale and retail dealers is a doubtful problem.

President.—I am talking of your market.

Sir Daya.—In the Punjab another Re. 0-3-10 has got to be added to that.

President.—If he is not able to maintain his position with Re. 1-8-0 duty, in India, is it likely that he will be able to maintain it with the duty at Rs. 3.

Sir Daya.—At present he is.

President.—He is not able to maintain his position. The imports are going down very rapidly.

Sir Daya.—The imports of finished matches are no doubt going down; because the same Foreign Co. is manufacturing largely in India and selling similar matches without paying the Re. 1-8-0 duty.

President.—Of the 3 million now imported, 1½ millions are for Burma.

Sir Daya.—We notice that the WIMCO brand is selling well in the Punjab, and that is the production in India of the Swedish combine that I have just referred to.

President.—That is Indian made. I am talking of the imported matches. So, you don't think that if the ratio is maintained, it will make any great difference.

Sir Daya.—Except as I say that there is a sentiment about this one pice.

President.—That is perfectly true. You cannot expect that price to be maintained for ever. If Government does not want the revenue now, it may want it some day. Matches are liable to be taxed and are taxed in all parts of the world.

Sir Daya.—Either it is 1 pice or 2 pice because a man does not go with a half pice in his pocket to buy a match box.

President.—He may buy an Indian made match box at 2 pice and he may not buy any foreign match box.

Mr. Mathias.—Is it your argument that we should put an excise duty which would bring the price of Indian matches to 2 pice and that of the imported matches to 3 pice? That would suit you better?

Sir Daya.—I don't mind that.

Dr. Matthai.—Supposing it went up to 2 pice and 3 pice, would it react on the consumption of matches in this country?

Sir Daya.—Very much in outlaying parts. For instance in Kashmir if the price went up as high as that, people might go back to the old system of flints.

President.—It is possible to sell even three boxes for an anna or he could buy a dozen at a time.

Sir Daya.—Dozen and half dozen purchases are possible.

Retail Sales.

President.—We have been trying to find out how much is sold by the dozen and how much by the single box, but it is very difficult to get an idea. The Swedish Match Company thinks that it is probably 10 per cent. and one of the dealers has told us that it is 25 per cent.

Mr. Mathias.—It is impossible to get any definite information.

Sir Daya.—I can't say what happens.

President.—Would it not be right to say that the bulk of the matches will be sold by the dozens and half dozens in India?

Sir Daya.—Dozens, half dozens and quarter dozens.

President.—So that the pice business is only a small percentage, and therefore in making any recommendations don't you think that we should really take not the wholesale price but the price per dozen?

Sir Daya.—Dozen or half dozen packets.

President.—Then we now come to the Swedish Match Company. You propose an increase in the duty on logs.

Sir Daya.—Yes.

Duty on logs.

President.—You must remember that you are rather fortunately situated. You have got the advantage of the distance. But take the case of the ports where factories may be established. If you put up the price of aspen—at present they are not using aspen except in Bombay and a little in Calcutta—you may raise the price of Indian wood correspondingly.

Sir Daya.—Why?

President.—It would be raised because the contractor or anybody who is dealing in Indian wood knows that either you must buy his wood or aspen. You can now use aspen up to a limit of Rs. 70. If the price goes up by another Rs. 25, he may say "why should I not get a bit more? I would also raise my price"?

Sir Daya.—Who is that supplier of wood?

President.—Contractors?

Sir Daya.—Is that from Government forests or private forests?

President.—If Government supplies it direct from the forests, the price may not go up. What it does at present is that it gives the wood to any contractor who likes to take it.

Sir Daya.—That only wants an organisation.

President.—Government does not do any business departmentally in soft wood and therefore allows contractors to extract whatever they want now. The contractors know that the price of aspen has gone up and they will put up the price of Indian wood. There is that chance.

Mr. Mathias.—Take Genwa which is used almost exclusively in Calcutta. It comes from the Sunderbans. The fishermen bring it up in small boats to Calcutta and sell to the middlemen. The whole of it goes to the middlemen, and these middlemen are bound to put up their price as soon as they know that the price of aspen has gone up.

Sir Daya.—On the contrary the trouble is if aspen is cheap, they will be only liable to an excise duty of Re. 1-8-0 and no other import duty.

Mr. Mathias.—The duty on aspen is 15 per cent. already.

Sir Daya.—It does not hit them much.

Mr. Mathias.—15 per cent. duty means 3/4 anna per gross. That is not a small duty.

Sir Daya.—It only means ¾ pie per dozen boxes, which is nothing. My only fear is that it would then encourage not the indigenous manufacture with indigenous wood but manufacture of matches with imported wood.

President.—At present it has not done so. It is only where Indian wood is not available for splints in large quantities, as for instance in Bombay, that it is used and there it is mainly used for splints only.

Sir Daya.—They use aspen because they cannot get any local wood.

President.—For boxes everybody uses Indian wood.

Mr. Mathias.—The Ambarnath people prefer to use Indian wood if they can get it.

Sir Daya.—The question reduces itself to this whether it is desirable, if it comes to depending entirely on local manufacture, to have match factories where there is no local wood available.

Mr. Mathias.—They will go out in competition against factories whose costs for wood are cheaper.

Sir Daya.—You say that in Bombay they cannot get materials.

President.—Only for splints. They have got wood for boxes.

Sir Daya.—So they cannot manufacture splints except with imported wood. If the costs are not prohibitive, it will encourage the manufacture of matches with foreign materials. With the imported wood they get a better finish and find a better market. There will therefore be a certain territorial area which they will always command with a very fair prospect of competing favourably all over India with the indigenous wood products.

Mr. Mathias.—I don't quite follow. It seems to me that if you raise the price of aspen wood by putting on a very heavy duty for a time—perhaps a few months or perhaps a year—that would give the manufacturer from Indian wood an advantage, but in course of time the price of Indian wood would be pushed up correspondingly and then aspen would come in again.

President.—It would be a vicious circle.

Mr. Mathias.—Perhaps not in your own case but in bigger places like Calcutta or Rangoon?

Sir Daya.—I quite see your point; it does not affect us.

President.—I want your opinion. We are faced with this difficulty that we may make the Indian wood unnecessarily expensive for Indian manufacturers by putting up the price of aspen.

Sir Daya.—I must admit that I have not studied that question. But probably before I go away to-morrow I may be able to give you a reply. Meanwhile what strikes me is, if you don't tax any wood from abroad, how would the imported aspen, without any extra duty, affect the indigenous manufacture?

President.—It has not affected it so far.

Sir Daya.—It has perhaps not because there is the protective duty and the manufacture from aspen in India is still well under the total requirement.

President.—As I was telling you, half the matches are manufactured in India out of Indian wood. Last year it was so and this year it may be more.

Sir Daya.—With the 15 per cent. *ad valorem* duty on aspen you think that they can't go any lower than the present price and swamp gradually the whole of Indian market to the exclusion of matches from Indian wood.

President.—We can't say. They may reduce their costs in other directions.

Mr. Mathias.—At present it is only profitable to use aspen for the manufacture of matches because the extra cost paid for aspen including the duty is counter-balanced by the extra price they get for the whiter splints.

Sir Daya.—They are selling at Re. 1-4-0 in Bombay. Supposing an excise duty of Re. 1-8-0 is added to that, it would be Rs. 2-12-0 only; that is a very favourable rate against Rs. 2-10-0; even in the markets where the Rs. 2-10-0 man can go. He will be washed off.

Mr. Mathias.—At present the opinion of the market places an extra value on white splints of about 3 annas, and it will continue to do so. The difference between Indian wood splints and aspen splints, both manufactured in India, is 3 annas per gross.

President.—They can't get more than three annas. The Swedish Match Company manufactures both and they get about three annas more for their aspen wood matches than for their Indian wood matches.

Sir Daya.—Still their selling price is within 1½ pice. Whether it is Rs. 2-10-0 or Rs. 2-13-0 they will sell at 1½ pice.

Mr. Mathias.—At present they are selling at 1 pice.

Sir Daya.—Re. 1-2-0 is their cost. They are landing here at Re. 1-7-0 and selling at Re. 1-4-0 in Bombay. Take for instance the Bombay area. This Re. 1-4-0 in Bombay would probably mean Re. 1-7-0 up to a certain area. Two annas extra would bring them up to Central India. We are already Re. 1-7-0 here, and so we can't go any further than that.

President.—Their bringing down the price of matches is not determined by the price of aspen. That is the point. Supposing we put 50 per cent. duty on aspen, if they were going to compete with you in that way, they would undersell you if they wanted to do it, but commercially speaking they could get only 3 annas more for their aspen splints than they could for Indian wood splints. What I am suggesting, to you is this, that the price of aspen is not going to determine the selling price of matches, if they are bent on competing against you.

Sir Daya.—Not the selling price; but my feeling is this that it does certainly determine the market that they will capture.

Dr. Matthai.—You are again thinking of the sale price—the price at which the retailer sells to the consumer?

Sir Daya.—Exactly.

Dr. Matthai.—That is to say, the difference of 2 or 3 annas between aspen matches and Indian wood matches would not actually reach the consumer.

Sir Daya.—He would prefer the white thing; he gets a better quality for the same price and therefore the manufacturer of the aspen splint matches is sure to capture the market.

Dr. Matthai.—That assumes that the bulk of the sales is done on the basis of the single box.

Sir Daya.—Either single, or dozen, half dozen or quarter dozen. My feeling is that although there may be a difference of 3 annas between the two products, yet the price for the retail buyer remains practically the same; and the consumer will rather have the whiter splint than anything else.

President.—Supposing we find that at present Indian wood is not available for the whole of the market, what will happen? They would simply import more matches because the demand has to be supplied by somebody. The point is this; supposing we are satisfied that Indian wood is available in sufficient quantities for the whole demand, then in that case we can say, "all right, we don't want any aspen wood", but supposing we are not able to come to the conclusion that at present Indian wood is available in sufficient quantities then we put this duty on aspen so that aspen matches cannot be manufactured in the country.

Sir Daya.—They will still be manufactured.

President.—They will sell at a higher price.

Sir Daya.—Perhaps at the same price as the imported matches.

President.—Your price will go up?

Sir Daya.—Why should it?

President.—Because there will not be a sufficient quantity manufactured. Supposing India wanted 15 million gross and the wood available in the country is only enough for 10 million gross. Now the other 5 million is manufactured out of aspen. You propose that we should put a heavy duty on aspen and then when aspen is not able to compete against you, you put up the price of your own matches.

Sir Daya.—Supposing we put up the price of our matches, the result would be that there would be no difference between ours and imported matches, and therefore imports will begin again.

President.—But that must happen.

Sir Daya.—You cannot help it.

President.—Therefore would it not be more advantageous to the country that until wood was found in sufficient quantities for the entire demand of the country, some aspen should come in?

Sir Daya.—It will never be found because there will be no encouragement for it.

President.—Supposing there were other means by which wood could be made available here say after a few years, would it not be better to wait?

Sir Daya.—I look at it this way, there must be a steady growth of manufacture with local wood. It cannot be done suddenly after foreign aspen has gained ground.

President.—We are assuming a position in which there is no wood available in the country to supply the whole of the demand; in that case a certain quantity of matches has either to be imported or to be made out of aspen.

Sir Daya.—The way I look at it is this. India is not a small country; it is almost a continent.

President.—Please don't get away from the point.

Sir Daya.—I am bearing that in mind, I am coming to the point.

President.—What happens? The wood available in the country is only sufficient for 10 million gross whereas the country wants 15 millions; you at once put up your price?

Sir Daya.—Who puts up the price?

President.—You.

Sir Daya.—5 million gross must come from outside in any case.

President.—Yes.

Sir Daya.—There is an economic border to which 10 million can reach from the various centres.

Mr. Mathias.—It would mean this. If a heavy tax is put on imported aspen, the price of aspen matches would go up, but so far as Bombay is concerned, it may not be profitable for Bombay to import from Calcutta or Rangoon as compared with imported Swedish matches.

Sir Daya.—Aspen can also be imported from Japan. You mean as compared with aspen matches manufactured in India?

Mr. Mathias.—As compared with imported or home manufactured aspen matches it will not be profitable to import Indian wood matches from Calcutta or Rangoon.

Sir Daya.—Not exactly that. If the cost of carriage of indigenous wood matches from say Calcutta to a particular area comes to the same as the imported matches, it will be no advantage to import.

Mr. Mathias.—So far as Bombay is concerned the whole of that area would be served by aspen matches.

Sir Daya.—Yes, because under the present tariff it is not possible for the North to supply.

Mr. Mathias.—I take your proposal to be this, that aspen should be taxed to such an extent as will make the difference in the cost of production corresponding to the cost of railway carriage of Indian matches from Calcutta and other parts of India to Bombay.

Sir Daya.—So as to eliminate the extra advantage that aspen wood matches would have over the indigenous manufactured article bearing in mind the difference in the quality of wood.

Mr. Mathias.—That would naturally be limited by the cost of exporting matches from Calcutta.

Sir Daya.—The cost of export is one item and the quality is the other item playing an important part.

Mr. Mathias.—Once you get the export of Indian matches the price of Indian wood goes up, does it not?

Sir Daya.—If the Indian match people were to raise their price to such a pitch as to bring it at par with the price of imported matches, what would happen is this, that the imported thing having a better quality would again find a sale and then the indigenous product would lose the market and its price must come down and therefore the price of wood also must come down.

Mr. Mathias.—The difference in quality is already measured by the extra 3 annas they get.

Sir Daya.—That is the present criterion. Whether that 3 annas will present sufficient inducement to the buyer remains to be seen, but, on the other hand, the point that you have illustrated makes the conclusion very easy to draw, namely that what will happen will be this. Supposing a particular area is getting imported matches; they will keep selling at a certain price till these people begin to raise the price of wood so as to come at part with the imported aspen. If that is the position the result is that the desire of the purchaser would be for the latter wood than the former, and then the one will drop and the other will raise.

Mr. Mathias.—Your proposal really amounts to this, that if there is Indian wood sufficient to cover the demand of the Indian market excluding Bombay, then there is a good case for puttting a duty on aspen.

Sir Daya.—That is up to a territorial point to which it is economic for the indigenous wood to sell at a favourable price. That would be the demarcation line. It would be a case of self-adjustment in that case. (Illustrated by a sketch.)

Dr. Matthai.—Taking your original point, namely, the difference in the price paid by the consumer to the retailer, at present aspen matches get a price of 3 annas above Indian wood. That is the advantage that aspen made matches at present possess. You are suggesting an import duty on aspen wood. Supposing as a result of that duty on aspen, the price of Indian wood goes up correspondingly, in that case this problem would still be left?

Sir Daya.—In what way?

Dr. Matthai.—Supposing the price of aspen wood goes up, that is to say matches made out of aspen go up in price, I am assuming that the result of this import duty on aspen wood is that, and the price of Indian wood goes up correspondingly. Then the price of matches made out of Indian wood also goes up correspondingly to aspen made matches. This import duty being on logs there might still be a difference of 3 or 4 annas left.

Sir Daya.—You mean by raising the price of Indian wood?

Dr. Matthai.—Yes. That difference would have to be represented at the consumer's end because there is the monetary limit, and therefore even if we had this duty on imported logs the original difficulty remains.

Sir Daya.—What would happen?

Dr. Matthai.—What would happen is that the present position would continue.

Sir Daya.—There is only a difference of 3 annas. It does not affect the consumer.

Dr. Matthai.—No. The point is this. As far as the Indian consumer is concerned, he might still prefer matches made of aspen because it is only a difference of 3 annas. That will happen inspite of the duty.

Sir Daya.—What will happen next?

Dr. Matthai.—The point I am trying to suggest is this. If you want to meet that difficulty, there is only one way in which you can do it and that is to levy a prohibitive duty on the import of logs.

Sir Daya.—No. I am not quite prepared to recommend total prohibition because we do not know whether the indigenous supply can at once meet the entire demand of the country. There is weight in what you have just suggested. It means this, that it must either be indigenous wood matches or imported wood matches, or imported finished matches to meet the present requirements. It would be very unfair to encourage this element of imported wood, that has come in to create mischief against the indigenous when the balance of country's requirements can be met by imported matches.

President.—It does not seem to have affected you yet?

Sir Daya.—It will affect us the moment it does not give the indigenous manufacturer a larger scope for expansion.

President.—You would get less scope if the price of Indian wood goes up as it might if the price of aspen goes up.

Sir Daya.—Supposing there was no aspen wood imported, it would be either a case of imported finished matches made of aspen which would sell or the indigenous wood matches manufactured in India.

President.—We are assuming that there is not enough wood at present to supply the whole demand for India.

Sir Daya.—Then you get imported matches for the balance of your requirements.

President.—How are you benefitted?

Sir Daya.—Indigenous manufacture has a very wide field for development.

President.—What would happen is this, you would get a very much higher for your matches than you get now.

Sir Daya.—How?

President.—You supply only 10 million gross and the country wants 15 million gross. This 5 million gross cannot be produced at all; they must be imported.

Sir Daya.—I say they must be imported.

President.—Then the imports come in. The import price has gone up under our scheme and therefore you may raise your price for Indian matches to just below the import price.

Sir Daya.—Yes, so long as it can sell.

President.—It will undoubtedly sell.

Sir Daya.—You also assume another important factor that there is an absolute combine between the internal manufacturers.

President.—India cannot produce more than 10 million gross.

Sir Daya.—The internal competition amongst the various manufacturers in the country will keep the price under control.

President.—There is no room for any competition because the market is available.

Sir Daya.—Supposing a man is selling at Rs. 2-15-0 and I could afford to sell at Rs. 2-10-0?

President.—If the internal competition keeps the price down, the industry cannot expand at all. If the internal prices are so fixed that they are not remunerative then there is no expansion of the industry and we must continue to import.

Sir Daya.—There must be expansion because there is scope.

President.—You cannot have it both ways; then you must get a much higher price than you need.

Sir Daya.—But there is the same difficulty that exist to-day that the difference in price will be exactly the same as it is to-day. If the protective duty is Re. 1-8-0 and the excise duty is the same, the difference is only up to the same margin.

President.—The price of aspen is put up so high that no aspen matches are manufactured in the country. 5 million gross is required by the country. Either you must keep up your price for the 10 million gross just below the level of the foreign price or if there is a lot of internal competition amongst you which prevents the rise in price of Indian matches still the 5 million gross will continue to come in.

Sir Daya.—The 5 million gross will come in till the country produces the full amount.

President.—What is the advantage?

Sir Daya.—It gives them a good margin to develop larger production in the country.

President.—In the meanwhile the price to the consumer goes up.

Sir Daya.—The price to the consumer may go up, but it will remain absolutely within the limit of the price of imported matches.

President.—I am just discussing with you the position, that the 5 million which India cannot manufacture will come into the country at any price practically. You manufacture 10 million gross. You say " Now that the price of foreign matches has gone up I would keep my matches at a higher figure than I need do."

Sir Daya.—But there is internal competition.

President.—If there is internal competition the industry does not expand. I could understand if you said that it would expedite the growth in the Country of the wood by protecting the Indian wood.

Sir Daya.—That is our idea.

President.—This is not a thing which can be done in a day.

Sir Daya.—It will take time. We know the possibilities of this country. A vast country as it is, its resources are not sufficiently developed and if in course of time you reach that limit India may be able to produce all its requirements.

Development of supply of Indian wood.

Dr. Matthai.—In order to develop sufficient wood supply, considering the transitional difficulties during the next five or ten years would not the best way be to encourage the use of Indian wood by some kind of direct assistance rather than by tariff against imported wood? Supposing for example there is an organization by the Forest Department to run plantations, and to encourage an increase in the production of Indian wood, that would be a much more effective way of increasing the supply of indigenous wood than starting straight off with a prohibitive duty on imported wood, because that would affect the consumer and this would not.

Sir Daya.—That is perfectly true. As I have just said before, the position as regards the development of the indigenous resources of wood through the Forest Department is that you must give us some relief for a time, because if you neglect the other part of it, namely protecting the industry with a duty, it would mean that while this development is going on there is no encouragement, there is no margin, which will keep the indigenous manufacturer encouraged enough to carry on his development. He would be

killed in the very early stages if there is no duty, while the duty helps him up to a certain point and enables him to carry on. We are therefore asking for both.

Dr. Matthai.—Supposing it was possible for Government to supply, let us say Bombay factories, with larger quantities of Indian wood at economical prices compared with aspen, apart from any question of duty on imported logs, they would be induced by that very reason—because they are business people— to use Indian wood and the consumer would not be touched.

Sir Daya.—If Government would supply them with indigenous wood at such economical rates as would from the very start compare very favourably with the imported wood, it would be all right. That stage cannot also be lost sight of. That is why I say both these things are absolutely essential. The very fact that during the five years since this import duty has been levied so much of indigenous manufacture has come into being should by itself afford sufficient proof of what might be done if encouragement were continued. Now take the case conversely. During the last 5 or 7 years you have seen so many million gross manufactured in India. Supposing the duty was cut off, what would be the result? No Indian manufacturer would be able to stand the competition. The result would be that in the course of one or two years all indigenous wood manufacture would be washed off completely. The factories would be closed down. Although the forest people and Government may wish to sell all their resources at economic rates, the Indian manufacturers, won't have survived to see the benefit of that development.

Dr. Matthai.—That is so as far as the import duty on matches is concerned. We are just now discussing the question of having a duty on imported aspen. The real difference is this that here as far as the wood supply is concerned it is primarily Government which is responsible for increasing the wood supply. It is Government which can do it. It is after all Government that has got to levy this import duty on logs. Now in both cases it is Government that has got to act.

Sir Daya.—Yes.

Dr. Matthai.—Supposing we say to Government, instead of manipulating the tariff with regard to imported logs, you give direct assistance yourself in this matter, the supply of which lies in your hands': it is possible for us therefore by asking Government to give direct assistance to give you precisely what you want without affecting the consumer.

Sir Daya.—Do you think that Government will entertain that idea? My analysis of this proposition is this. Government will not only lose its revenue from the import duty but also its revenue from forest resources. For instance take the case of blue pine. To-day Government are selling at 12 annas. You want them to reduce it by 5 annas. Their forest revenue drops down from 12 annas to 5 annas. That is one of the serious objections presented to me by the Punjab Government when I was discussing with them this question. Then say " when we can get as forest revenue this price in the market, what justification has Government got for reducing its price for the timber that is supplied to the Match industry." This timber has a market already and therefore there would be no justification because it reduces the revenue. Government revenue would suffer.

President.—The whole point is this. Before Government makes up its mind to shut out aspen matches, it must satisfy itself that there is enough wood in the country for the Indian manufacturer; otherwise it would be a leap in the dark.

Sir Daya.—No. In spite of the Government not taking any notice of this thing, by virtue of the import duty as it stands to-day.....

President.—We are not talking of the import duty. I am talking merely of the duty on logs.

Sir Daya.—I am showing the relative position. In spite of Government not taking up this question with the same interest as they might have, the result has been that a certain amount of protection in the form of this import duty has been given to the Indian manufacturer to develop and he has

developed. You cannot ask Government in giving you facilities to cut down its revenue. They won't cut down its revenue in order to give you facilities but what they can do against competition which does not in its retail price affect the consumer is that they can give you facilities without cutting down the revenue.

President.—What facilities?

Sir Daya.—For instance, they find that there are certain classes of timber which have not got a market and they have not made proper research of those kinds of timber. Take the case of spruce, blue pine, and so on which have not been exploited economically so far and which can be exploited and can be brought. In those cases they can enter into small agreements with or give concessions to match manufacturers for working those timbers for match manufacture. That would not be in any way affecting the revenues of Government. If anything, it might be adding to the revenues of Government. In the meanwhile the indigenous manufacturer has to receive a sort of protection to help him in his experimental stage till Government have developed the full resources. There is a stage between this and the stage where the resources of India can be tapped.

President.—That is true. That is what I mean. Government must be satisfied that the industry would continue in the country on indigenous wood or any other wood.

Sir Daya.—Yes.

President.—Before it satisfies itself on that point, would it be wise to shut out its source of supply?

Sir Daya.—My feeling is that it is desirable in this way because, without that, it does not afford sufficient encouragement for developing the manufacture from indigenous wood. Where for instance aspen can be had cheap enough, why should people bother to find out what is available in the country? The difference in the cost and sales is not enough; it does not afford sufficient encouragement.

Mr. Mathias.—Could you give us a definite figure as to what you think should be the duty?

Sir Daya.—I will think over it and let you know. I had not all this information before me, and so I could not give an answer straightaway. I don't like to give anything which I don't consider myself to be satisfactory. Now that I have discussed all these points with you, I shall think it over and let you know.

Mr. Mathias.—I gather from the general argument which you have advanced that you would approve of something corresponding to the extra cost of production of aspen made matches,—something like two or three annas.

Sir Daya.—Something on those lines; but I shall give you a definite reply to-morrow after thinking it over to-night.

Mr. Mathias.—Would you mind sending us a short note on that?

Sir Daya.—I don't mind at all.

Cottage Industry.

President.—Are there any cottage industries in the Punjab?

Sir Daya.—Not that I know of. They started a small thing in Patiala but it ended in smoke.

Mr. Mathias.—Do you consider that a cottage industry for matches has any future?

Sir Daya.—I have seen it tried in Lahore to a small extent and also in Patiala but I don't think that it has any chance of success against machine made matches.

President.—Have you ever considered that point, Sir Daya? In Bengal there are a number of cottage industries. They think that some concession should be given to them.

Sir Daya.—What for?

President.—To encourage these cottage industries?

Sir Daya.—In what way?

Mr. Mathias.—If an excise of 12 annas was levied on Indian matches, no excise should be levied on cottage industry matches.

Sir Daya.—I would not be for it.

Dr. Matthai.—Do you think that it is really a suitable cottoge industry?

Sir Daya.—I don't think it is a thing which can be taken up as a cottage industry in India.

Dr. Matthai.—Why do you think so?

Sir Daya.—To begin with, they cannot give the same finish to all their matches; again, they would be using not enough quantity of Indian wood to bring the price of timber under control; they would not be using the same stuff—for example chemicals—as could be used in factories producing on a very large scale. If they did, the cost would then be very heavy. If they wanted to reduce their cost by a discrimination in the duty, then it would be a very unfair competition.

President.—Your proposal is that the present duty of Rs. 1¼ per gross should remain.

Sir Daya.—About that.

President.—I understood you also to say that if an excise duty was levied, the difference should be so kept that it was not less than Re. 1-8-0.

Sir Daya.—The present equilibrium should not be changed.

President.—You think in that case that it would not be a great hardship if Government really wanted that revenue.

Sir Daya.—Yes, although I would add a rider to that, *viz.*, that if Government are not anxious to get that revenue, it would be better to leave it at the one pice rate.

President.—Matches are a good source of revenue.

Sir Daya.—They are.

President.—In some ways they are even better.

Sir Daya.—With India becoming the source of supply there is no reason why Government should not make its revenue from matches.

President.—It has not the same sentimental objection as any increase in the duty on salt. People don't mind paying a little more for their matches.

Sir Daya.—After all, match is not so much a necessity of life as salt is.

Organisation of the supply of Indian wood.

President.—I would like to ask you one or two questions about forest matters. At present, each local Government is trying to do a little to help the match industry by trying to find wood and so on; but the total requirements of wood for the Match industry are very small from the forest point of view. If you had 100,000 or 150,000 tons in the country, it would be practically sufficient for the whole industry. That being so, no local Government seems to take a sufficiently large interest to develop its forest resources. Would it not be better in that case for the Government of India or some one provincial Government which is well situated, to undertake the work and to supply the wood? You are not affected in any way because you are situated far from the other factories and forests. I am asking you a question from the general point of view. Don't you think that it would be better if the Government of India undertook it or if they asked any particular local Government which had good forest resources to undertake it? Would not that expedite the supply of indigenous wood better than if every local Government endeavoured to work independently?

Sir Daya.—It would certainly, if the railway freight was not an important factor. What I mean to say is this. Supposing they found that the Punjab forest or the United Provinces forest had resources enough to meet the requirements of the whole industry, it is not economic to carry either the

finished splints or the wood to distant parts of India at the present moment. Therefore a central place would not serve all India.

President.—No, it may serve most of India.

Sir Daya.—Yes, that might be possible.

President.—Supposing a place is found, it can serve all the ports but it cannot serve you. You have got your own forests. So far as you are concerned, it does not affect you in any way. So far as ports are concerned, would it not be better for some central authority or for some local Government which is favourably situated to undertake a survey of its forests and also undertake the supply of wood by plantation or any other way?

Sir Daya.—I would say, yes. But one thing should be borne in mind. They should divide these areas—the Government of India could do that—into economic territorial divisions.

President.—How do you mean?

Sir Daya.—For instance, they find that in the Bombay Presidency there is a certain place which can supply the Bombay area most economically as compared with any other part of India. Instead of getting their supply from Madras, they can develop and distribute the wood from that place to the whole of the Bombay area. It would be more economic. The Forest Department has so far been a reserved subject except in one or two provinces, and therefore central Government can take up the question.

President.—As time goes on the manufacture of matches will be concentrated in large factories; there is no room for very many large factories, so that there is no question of supplying wood throughout the province.

Sir Daya.—Only at certain centres.

President.—There may be only one factory or two factories in a province. In that case it would not pay a provincial Government to undertake the work for one province but it may pay some Government or Governments to undertake this supply of wood for several provinces.

Sir Daya.—It would certainly be an advantage. The economic factor will have to be determined. You cannot make it too expensive at the same time.

President.—The idea is to make it cheap by producing this wood on a sufficinently large scale.

Sir Daya.—Then, it would be certainly economic and it would be desirable to have economic centres.

President.—That would be one solution of the difficulty.

Sir Daya.—Yes. To give you an idea, I was discussing this question from the point of view of Northern India with the Punjab Government and I thought that in suitable parts of the Punjab plantations could be resorted to which in course of time—say 10, 15 or 20 years hence—would be able to supply all the timber required. It would reduce the costs and the quality would be better.

President.—Northern India would have to be treated on an entirely different footing from the ports.

Sir Daya.—The same think could be done in Southern India. As far as the ports are concerned, if we have got a good central place in the Punjab, it will go right down to Karachi. Karachi is not very far. If we can find a central place say in South Punjab, the distance left would be about 400 miles. It is not prohibitive. Moreover the match timber is a floatable timber and it can go down by the river. The same thing could be done in Northern India. You can find suitable timber near about. But as regards Southern India, I do not know the forests there but it would certainly be an advantage to have a central plantation or to have a central arrangement which would result in reducing the cost of extraction. If it is done on a small scale in different provinces, the cost of extraction would be high.

Dr. Matthai.—Practically what you call an economic area is a province. It practically amounts to that.

Sir Daya.—Not the present divisions.

Dr. Matthai.—From the point of view of the Match industry, you have only four areas, centering round Bombay, Calcutta, Rangoon and Lahore.

Sir Daya.—Yes; for the whole of Southern India, you can have one central place.

The Swedish Match Company.

President.—We issued a circular letter sometime ago to most of the Chambers of Commerce and it also appeared in some of the papers—I do not know whether you have come across it—asking for their views. There were many points raised in that letter, but the main point was this; there were these statements made against the Swedish Match Company that they were trying to get a monopoly, and so on. One of the proposals that we were considering was that supposing that were so, how Government or the public could take steps to meet that situation. One of the proposal was that Government could have a monopoly either as regards manufacture or as regards sales.

Sir Daya.—To control the sale price?

President.—Yes. For the manufacture there is an excise—like ordinary abkari excise—or Government can have a monopoly as regards sale. That is to say they buy these matches from manufacturers and sell them at a fixed price. Government may buy them at a fixed price from each individual manufacturer or at a flat rate from the manufacturers who are already carrying on the business. The erection of factories has to be licensed, that is to say Government will restrict the number of factories and see that the factories are not placed in wrong places. They will buy from you matches at such and such a price and will sell at such and such a price. They can deal with the Swedish Match Company in the same way.. The idea is that the whole monopoly does not pass into the hands of the Swedish Match Company. That is one proposal.

Sir Daya.—Where would be the necessity for this if you regulate them with this taxation?

President.—As regards internal competition you cannot have any control except by having another discriminating excise duty. That I told you was impracticable. That being so, the only other alternative is that Government should take the monopoly in its own hands to prevent it from passing into the hands of the Swedish Match Company.

Sir Daya.—It cannot, because you are restricting them with that difference in the duty.

President.—They are manufacturing matches in the country. They will manufacture more and more matches in the country and if they compete against all Indian factories, all the Indian factories go out.

Sir Daya.—That is what we have been discussing.

President.—We have not discussed the question of their manufacturing in the country itself.

Sir Daya.—Why not restrict the capital as recommended by the Fiscal Commission?

President.—Both the Fiscal Commission and the External Capital Committee reported against it and the Government of India took no action on it. That being so, Government say "if it is passing into foreign hands, we will take the monopoly and get the benefit by fixing a price and taking the difference between the price at which we purchase and the price at which we sell". That is one scheme, manufacture being carried on in the ordinary way.

Sir Daya.—I see the point.

President.—Or Government can say "we don't want to do this: let it be done by a private company." If a private company to which the monopoly of sales is given is floated—such a system is in force in Germany—the sales syndicate has to sell at a price which would include the excise duty

that Government may impose. But Government have a right to control the price and will see that no excessive price is charged. The sales syndicate arranges with the factories which are in existence or which may be erected.

Sir Daya.—Will this be a syndicate representing Government or will it be a private syndicate?

President.—Supposing a private company comes forward to take up the question of sales for the whole of India? That is what precisely the Swedish Match Company does, the idea being to centralise sales and manufacture.

Sir Daya.—There they are themselves manufacturers.

President.—Not necessarily! Take the case of Germany.

Sir Daya.—What is done in Germany?

President.—The Swedish Match Company have 65 per cent. interest under the control and the German group has 35 per cent. The sales syndicate consists of the Swedish interest and the German interest—half and half: it buys matches at fixed prices and then distributes. The idea is to eliminate uneconomic competition. By that you eliminate the middlemen who take away very high profits and who are necessary when you are pushing one label against another and so on. You reduce the price to the consumer and increase the profits of Government. We ascertain your fair selling price as Re. 1-6-0. Supposing a sales Syndicate is formed, it will buy all Matches manufactured in the country at Re. 1-6-0, and you have nothing to do with the

Sir Daya.—Will the syndicate come in if the taxation has been levied or will the syndicate work the match industry as regards sales after Government have announced the taxation.

President. I don't understand.

Sir Daya.—We have been contemplating here the levy of a protective duty.

President.—Supposing Government decides that a sales syndicate be formed?

Sir Daya.—That would be a private syndicate and Government has no control over that?

President.—Government would keep a general control to see that prices are not fixed at any uneconomic level. The sales syndicate would be responsible for giving the excise duty to Government.

Sir Daya.—Is it that whatever tax is levied, it will be settled between the syndicate and Government and that the syndicate will buy matches from local manufacturers at a certain price?

Dr. Matthai.—Supposing the import duty was Rs. 2-8-0 and the excise duty Re. 1, then the sales syndicate pays to Government Rs. 2-8-0 per gross on whatever it imports and pays Re. 1 on whatever it buys locally.

Sir Daya.—That is to say Govenment deal only with the Syndicate and the syndicate is really the selling agent whether it imports or buys locally. Would it be possible to have such a body?

President.—That is one of the best ways of doing business.

Sir Daya.—Yes, in other countries where there are representative institutions.

President.—That is not the point. Supposing Government said that, would you be willing to accept such a Time?

Sir Daya.—If such a syndicate would be made truly and properly representative, I say, yes, certainly.

President.—Its character is essentially Indian.

Sir Daya.—If it is Indian and properly representative, I should say, yes.

President.—Representative in what sense?

Sir Daya.—Representative of various manufacturers and consumers.

President.—There Government keeps the control.

Sir Daya.—I don't follow you there.

President.—Suppose the manufacturers are paid Re. 1-6-0; than Government wants one rupee excise; that makes Rs. 2-6-0 and the cost of the Syndicate for distribution and profits is 4 annas and the total comes to Rs. 2-10-0. If the syndicate fixes the selling price at Rs. 3, Government will say "you cannot do that; you can only charge Rs. 2-10-0."

Sir Daya.—That would mean constant Government interference.

President.—Why?

Sir Daya.—On the representation of the consumer.

President.—How can he be represented?

Sir Daya.—As a representative of the people, each province may have a member on the syndicate.

President.—By being a shareholder he can be on the syndicate.

Sir Daya.—He must be a non-shareholder. The constitution of the syndicate would be repesentative of manufacturers and consumers. Such a body to my mind is an impossible constitution.

President.—There is no question of the manufacturer. It is a question of the sales syndicate which will simply undertake the sales on behalf of Government.

Sir Daya.—Before the Syndicate every manufacturer has got to represent his own case every time. Bearing in mind the present conditions of India, it will be impossible.

President.—It is worked in Germany.

Sir Daya.—The conditions in Germany are very different from the conditions in India.

President.—What alternative would you suggest to prevent the Swedish Match Company from acquiring the monopoly, if none of these would suit you?

Dr. Matthai.—As soon as this new protective scheme is sanctioned, if they started a new factory producing $\frac{3}{4}$ size with a capacity of 6,000 or 7,000 gross a day, what would happen to the United Provinces or the Punjab factory?

Sir Daya.—What will they make their matches from?

Dr. Matthai.—From imported aspen.

Sir Daya.—Your recommendation would be to tax the aspen, so that they cannot use aspen cheaply.

President.—Supposing they make up their mind and are prepared to lose Rs. 2 crores, they will kill all the Indian industries. Then, they will throw the duty, whatever it is, on the consumer. What alternative would you suggest?

Sir Daya.—You say that the recommendation of the Fiscal Commission as regards the limitation of foreign capital is not acceptable.

President.—Government have not taken any action on that.

Sir Daya.—Why not press that point?

President.—Supposing we pressed that point and Government turned that down?

Mr. S. K. Kaul.—Then raise the duty still further.

President.—They don't import anything scheme they manufacture in the country. They will buy your wood at a higher price and will manufacture and sell at a loss?

Mr. S. K. Kaul.—Do you mean that they will manufacture and sell at a loss?

President.—It is not after all a very big sum for them. I am assuming an extreme case.

Sir Daya.—If things reach that stage, then that would be the stage for Government to step in.

President.—Why should not Government anticipate that?

Sir Daya.—We can do without it.

President.—You must remember that they have already got 50 per cent. in their hands including imports. Imports may cease and they may manufacture more in the country. I am simply asking you for your opinion. You must make a reasonable proposal.

Sir Daya.—It requires a little thinking.

President.—We shall give you a copy of the circular. In that circular we are not expressing any opinion. The points raised therein are only points for discussion. The point to be borne in mind is that you must not pin your faith on Government taking special action against foreign capital. If you did that, and supposing Government turned that down, there would be no alternative left.

Sir Daya.—I will go through your circular and give my opinion on that to meet this aspect of the case.

सत्यमेव जयते

United Provinces.

सत्यमेव जयते

Bhargava Dipshalaka Yantram, United Provinces.

Letter dated the 4th April 1927.

With reference to your No. 209, dated the 7th ultimo, I have the honour to inform you that because our factory is still in the experimental stage and we have started working only about a month back we are not in a position to furnish you with the answers of the series of questions you have sent. However we may inform you that the capacity of our plant is 150 gross per day, but we are not turning out even that quantity at present.

THE BAREILLY MATCH COMPANY.

B.—ORAL.

Evidence of Mr. H. WILKE and Mr. RANJIT SINGH recorded at Dehra Dun on Friday, the 20th January, 1928.

Introductory.

President.—It is rather inconvenient for us not to have received any written statement from you about your factory.

***Mr. Ranjit Singh.*—You never asked us to submit a written statement.**

President.—We published a notice in all the papers and we also sent copies of the questionnaire to all match manufacturing firms including yours. Didn't you get a copy?

Mr. Ranjit Singh.—No. Perhaps the address was not right. We are very sorry to have inconvenienced you but I can assure you that if we had received a copy of the questionnaire we would have sent you our replies. It was only at the end of last year that we came to know that the Tariff Board was enquiring into the match industry.

President.—Didn't you think it necessary to tell us that you are interested in the match industry and that you would like to be heard?

Mr. Ranjit Singh.—It was new to us and we were too much engaged with the erection and other things. That was how we failed to represent our case.

President.—The name of your factory is The Bareilly Match Factory.

***Mr. Ranjit Singh.*—Yes.**

President.—Is it a limited liability company?

Mr. Ranjit Singh.—No.

President.—By whom is it owned?

Mr. Ranjit Singh.—By Rai Bahadur Narain Singh and Sons.

President.—How many partners are there?

Mr. Ranjit Singh.—We are four brothers.

President.—Are you one of the sons?

Mr. Ranjit Singh.—Yes.

Dr. Matthai.—What other business is your firm doing?

Mr. Ranjit Singh.—We are doing contract work and we have also got ginning factories. We have also got our own land.

Mr. Mathias.—Are you forest contractors?

Mr. Ranjit Singh.—No.

Dr. Matthai.—A good deal of your business is done in the Punjab, is it?

Mr. Ranjit Singh.—The United Provinces, the Punjab and Delhi.

Premises.

President.—Did you take over any business from the North India Matches Company?

Mr. Ranjit Singh.—No.

President.—They had a factory there?

Mr. Ranjit Singh.—Yes.

President.—Did you take over their site or anything?

Mr. Ranjit Singh.—We are in the same building in which the North India Matches were located. The buildings belonged to the India Corporation of Cawnpore.

Mr. Wilkie.—They were empty buildings.

President.—These buildings belonged to the North India Match Company?

Mr. Ranjit Singh.—Yes.

President.—You did not put up the buildings yourselves?

Mr. Ranjit Singh.—No.

President.—Are they rented by you?

Mr. Ranjit Singh.—Yes.

President.—What is the rent you pay?

Mr. Ranjit Singh.—Rs. 500 per month besides insurance charges for the building.

President.—**Have you got a long lease?**

Mr. Ranjit Singh.—Only for five years; after that we can again enter into a contract with them or build our own factory.

President.—The buildings seemed to be specially erected for a match factory.

Mr. Ranjit Singh.—Yes. First of all there was a match factory there.

Mr. Mathias.—What match factory was that?

Mr. Ranjit Singh.—North India Matches Ltd.

Mr. Mathias.—In the same building?

Mr. Ranjit Singh.—Yes.

President.—**That was worked by Messrs. Allen and Company?**

Mr. Ranjit Singh.—Yes.

President.—Did you take any forest concessions? The North India Matches had forest concessions; did you take these over?

Mr. Ranjit Singh.—No; they never gave us those concessions.

Date of commencing operations. Purchase of machinery, etc.

President.—When did you first start?

Mr. Ranjit Singh.—We placed orders for machinery in 1925.

President.—About what time?

Mr. Ranjit Singh.—August or September 1925.

President.—**Before that, had you done any match business?**

Mr. Ranjit Singh.—No.

President.—**What made you take up this business?**

Mr. Ranjit Singh.—**There was this duty of Rs. 1-8-0 per gross and there was no other match factory in the United Provinces, there was only one match factory in the Punjab so we thought that it was a good proposition.**

President.—Did you consult Rollers?

Mr. Ranjit Singh.—First we had correspondence with them for about six months.

President.—**Roller's representative was in India at that time, wasn't he?**

Mr. Ranjit Singh.—He was not in India; he was in Burma at that time. Mr. A. P. Ghose who is the agent came to see us two or three times.

President.—Did you buy your machinery through Mr. A. P. Ghose?

Mr. Ranjit Singh.—Yes.

Dr. Matthai.—He generally arranges for the supply of Roller's machinery?

Mr. Ranjit Singh.—Yes. The orders were placed through him when he was in Dehra Dun.

President.—**Did he charge any commission?**

Mr. Ranjit Singh.—Not from us; Rollers might have given him commission but we don't know anything about it.

President.—Who designed the factory for you?

Mr. Ranjit Singh.—Sardar Puran Singh, who was a Professor in the Forest College, gave us some advice and we had an agreement with Mr. A. Roller

that if we placed the order with him, it would be on the understanding that the machine would produce 1,500 gross a day.

President.—And then Roller's sent out a man to put it up?

Mr. Ranjit Singh.—Yes, Mr. Wilkie was sent.

President.—They recommended Mr. Wilkie to you, or was he in their service?

Mr. Wilkie.—I was in Germany as Manager of a match factory at Riesa in Saxony and from there I was asked by Mr. Roller to go out to India.

President.—What was the capacity of that works?

Mr. Wilkie.—About the same capacity as we have here.

President.—Was that a new factory?

Mr. Wilkie.—It was a very old running factory.

President.—Has it been closed down by the Swedish Match Company?

Mr. Wilkie.—No. The proprietor was against joining the Swedish Trust. Of course Sweden already had 60 per cent. of this industry and he was requested to join; they wanted to put their machinery there but he refused. Perhaps he might have joined them later on, I don't know.

President.—He might be in the German group?

Mr. Wilkie.—Probably.

President.—Did you enter into an agreement with the Bareilly Match Company?

Mr. Wilkie.—Yes.

President.—Did you set up the machinery?

Mr. Wilkie.—Yes, I started the whole show.

President.—Afterwards the Roller people did not assist you?

Mr. Wilkie.—I was alone here and I had an Indian engineer to help me and we both managed the whole show. It is necessary in the beginning to have one man with some experience. Now if I were to go away there would be no difficulty at all.

President.— This machinery you have is of the latest type?

Mr. Wilkie.—Yes.

President.—Have you any experience of Swedish machinery?

Mr. Wilkie.—Yes.

Dr. Matthai.—Where did you get your experience?

Mr. Wilkie.—In Saxony, and other match Factories in Europe.

Dr. Matthai.—You have not actually worked the Swedish machinery?

Mr. Wilkie.—I have worked with Box making, Box filling and Packeting machinery made in Sweden.

Dr. Matthai.—You came out to India really in connection with the Rai Bahadur's enterprise?

Mr. Wilkie.—Yes.

Dr. Matthai.—You went to Burma also in connection with that?

Mr. Wilkie.—No. But I had been to Burma before.

Dr. Matthai.—When were you there?

Mr. Wilkie.—In 1924.

Dr. Matthai.—What took you there?

Mr. Wilkie.—I erected the match factory of Messrs. Adamjee Hajee Dawood and Company.

Dr. Matthai.—That was after you had accepted the engagement of the Rai Bahadur.

Mr. Wilkie.—At that time I did not know that the Rai Bahadur wanted to erect a match factory. I had to go home from Rangoon because at that time

the stay for a German in India was limited. I had to go home when my permit expired.

President.—How much did you have to pay for the machinery?

Mr. Ranjit Singh.—£8,000, or Rs. 1,07,000. Besides that we had to purchase engine, motors, dynamos, lathes, etc., from Calcutta.

President.—£8,000 for the match machinery only?

Mr. Ranjit Singh.—Yes. Erection and other machinery cost us about Rs. 1,00,000.

President.—As much as that?

Mr. Ranjit Singh.—Yes. Besides that we had to pay duty, and railway fare. They gave the machinery c.i.f. Calcutta and then we paid the duty and took delivery of it.

President.—And the rest cost you about a lakh of rupees?

Mr. Ranjit Singh.—About Rs. 1,10,000, for equipment, erection transport charges and duty.

President.—You have got an oil engine?

Mr. Wilkie.—Yes, two boilers, one portable engine, which is itself a boiler and a vertical boiler for drying.

President.—Those are small boilers?

Mr. Wilkie.—Yes.

President.—I think the motor works the match machinery, doesn't it?

Mr. Wilkie.—No. Our portable engine works the whole factory except the peeling department. Previously we had another arrangement. We wanted to work the peeling department with electric power but we found that our dynamo was not powerful enough to drive it and that was why we had to buy specially an oil engine.

President.—You make no use of your electric power?

Mr. Wilkie.—We work the dynamo for light and a big water pump.

President.—For power?

Mr. Wilkie.—Power comes from the steam engine and the oil engine.

President.—It is rather unfortunate that you have these three different things.

Mr. Wilkie.—Our steam engine is somewhat small and they had already purchased all these.

President.—An oil engine might have done the whole thing?

Mr. Wilkie.—In any case we will have to make the steam for drying purpose it not in the hot season, in the wet season certainly and we burn the waste.

Details of equipment.

President.—I want just a brief account of your match machinery.

Mr. Wilkie.—We have the following machines :—

2 Peeling machines for boxes.
1 Peeling machine for splints.
1 Chopping machine for splints.
1 Chopping machine for boxes.
5 Inside box making machines.
5 Outside box making machines.
5 Labelling machines.
5 Box filling machines.
2 Packeting machines.
2 Side painting machines.
1 Drying drum for splints.
1 Cleaning machine for splints.

1 Splint levelling machine.
1 Simplex machine.
1 Waste levelling machine.
2 Drying chambers for boxes.
4 Grinding mills for chemicals.

Capacity.

President.—Your nominal capacity is 1,500 gross a day?

Mr. Wilkie.—Yes.

President.—That is working one shift?

Mr. Wilkie.—That is the outturn of 10 hours work.

Dr. Matthai.—But you have not reached that yet?

Mr. Wilkie.—No. We can make without any trouble 1,250 or 1,300, not more, due to irregularity of labour.

Dr. Matthai.—Just now it is practically 1,500 gross?

Mr. Wilkie.—That is because we have an extra half shift for boxes and we have made 1,700 with that.

Mr. Mathias.—Since when are you having an extra half shift?

Mr. Wilkie.—From the 18th or 19th December.

Mr. Mathias.—What is the reason for that?

Mr. Wilkie.—The reason was that I wanted to train more labourers and raise the capacity to reach at least 1,500. I tried my best but I could not succeed and therefore asked the proprietor to make arrangements for an extra half shift.

President.—What it means is that you want a few more box making machines.

Mr. Wilkie.—Yes; I want more box making machines—one inside and one outside and one more labelling machine—and then I can reach a capacity of 1,500 gross. The box filling machines and the Simplex can produce 1,500 gross without any difficulty but the inside and outside machines and the labelling machines are not turning out sufficient.

Mr. Ranjit Singh.—The whole trouble in the beginning was with our labour. They were very often absent and the output was never more than 700 to 800 gross a day and so we wanted to have a few spare men trained.

President.—You have had experience of match making in a very old factory in Germany.

Mr. Wilkie.—I have 20 years' experience in this business.

President.—Was the machinery that they had at Riesa older than this?

Mr. Wilkie.—Yes. They had old machinery and new machinery too. That factory was about 30 years old and had many slow running machines.

Labour employed in the different processes.

President.—You have got one peeling machine for splints; on that how many men do you have?

Mr. Wilkie.—3 men only.

President.—In Germany how many men would you have there?

Mr. Wilkie.—2 men only.

President.—How many men would you want?

Mr. Wilkie.—In Germany, on one machine 2 on 3 machines that comes to 6 men and one mate which I have not got here.

President.—For peeling machines for boxes how many do you have here?

Mr. Wilkie.—Three men on each machine, that is 6 for the two.

President.—In Germany how many would you have?

Mr. Wilkie.—On 3 machines I would have 10 men including the mate.

Mr. Mathias.—Why do you want an extra man?

Mr. Wilkie.—They must work faster; they cannot work as they do here because they are more highly paid. If they did not work faster than here the proprietor would lose.

Mr. Mathias.—If they work faster, you want fewer men on the machines

Mr. Wilkie.—No. The extra man is the supervisor.

Mr. Mathias.—You mean a foreman?

***Mr. Wilkie.*—Yes. He is there to supervise the men. He would see that the knives are in working order and so on, because the labourers are unskilled.** We would have to employ the cheapest labour we could get and even then their wages would be too high. In Germany the cheapest man would take much more salary than an Indian.

Mr. Mathias.—What it comes to is that you require more supervision in Germany than in India?

Mr. Wilkie.—No, only for this particular department.

Dr. Matthai.—If you had a supervisor here perhaps you could get more work out of the men?

***Mr. Wilkie.*—Yes. I should think so, here the trouble is, that the men absent themselves too frequently.**

Dr. Matthai.—Therefore you would need more men here than in Germany.

Mr. Wilkie.—I would.

Dr. Matthai.—But so far you have not felt the need for it?

***Mr. Wilkie.*—So far not. I myself supervise and they seem to work all** right.

President.—How many men have you got on the chopping machine?

Mr. Wilkie.—Two men and in Germany also two, but mostly girls.

President.—How many on inside box making machine?

Mr. Wilkie.—One man per machine.

President.—The same in Europe?

Mr. Wilkie.—Yes. We have a paste carrier for 10 machines more here, that we save in Europe.

President.—**On outside boxes?**

Mr. Wilkie.—One man per machine; the same in Europe except that you have one extra here.

Dr. Matthai.—11 men altogether?

Mr. Wilkie.—11 men on 10 machines and 10 in Germany.

Dr. Matthai.—You have not got a paste carrier in Germany?

Mr. Wilkie.—No; the girls carry it themselves.

President.—This inside and outside box making is one of the most important processes, is it not?

***Mr. Wilkie.*—It is.**

President.—Did you find much difficulty in training your labour for this work?

Mr. Wilkie.—Yes, there was difficulty. Perhaps I was the cause of the difficulty myself. I treated the labour as well as I could but sometimes I had to use hard words when I found that they were going wrong, then I found they would absent themselves the next day and I had to recruit new labour. I have given that up and they come and work all right. They are working regularly now and I am quite satisfied.

President.—Is there any difference between these German machines and the Swedish machines?

Mr. Wilkie.—Yes.

President.—**What is the difference?**

Mr. Wilkie.—Not so much difference. The idea of the machines is nearly the same, but I might say, that the Swedish machines have got more levers, and are more delicate. On the German machine I can make my fitters work perfectly well in three or four months if they are somewhat clever but on the Swedish machine I am sure it would take them double the time.

President.—How many fitters have you got to look after these machines?

Mr. Wilkie.—One fitter is looking after 10 machines.

President.—What you mean to suggest is that the German machines are more fool proof than Swedish machines? What I mean is that your machines can be handled by less highly skilled labour?

Mr. Wilkie.—I must say so because my whole knowledge is certainly more of German machines. Another man from Sweden may say that the Swedish machines are better. My opinion is confined to the box making, packeting and box filling machinery particularly and I don't think I can turn out on the Swedish machines what I am turning out now on the German machines. Perhaps another gentleman may do differently.

President.—How many revolutions do you work?

Mr. Wilkie.—The peeling machines are making between 250 and 300 revolutions and the box making machines are running at 93 revolutions.

President.—Both inside and outside?

Mr. Wilkie.—Yes.

President.—In one factory we saw the inside box machine making more revolutions?

Mr. Wilkie.—You cannot do that. I tried with 105 revolutions but had to reduce the speed again. On account of the revolution the man is forced to look into the machine always and not look anywhere else and afterwards when I saw there was very little success I came down to 93 and I am working at that speed now: I won't go up nor will I come down.

President.—One revolution means one box?

Mr. Wilkie.—Yes.

President.—What I want to know is this. Have you found that owing to want of care on the part of the operator the boxes break and consequently there is more wastage on these machines?

Mr. Wilkie.—Yes, there is much waste if no good attention is taken.

President.—Is it due to the wood being different or is it due to want of care on the part of the operator?

Mr. Wilkie.—It cannot be due to the wood. If it was due to that I could not have decreased the waste. The waste in my factory was no less than 90 per cent. in the beginning and I have now decreased to 25 to 35 per cent.

President.—Do you mean in the box making department?

Mr. Wilkie.—Yes, and I say it is not due to the quality of the wood only but due to the care of the labour.

Suitability of aspen and Indian wood.

Mr. Mathias.—How does the Indian wood compare with aspen?

Mr. Wilkie.—With aspen I would have about 15 per cent. less wastage.

Mr. Mathias.—Would the wastage be 30 per cent. with Indian wood and 15 per cent. with aspen?

Mr. Wilkie.—Yes, with bombax it is 30 and with aspen 15 per cent.

President.—Then there is a difference in the wood?

Mr. Wilkie.—Certainly there is some difference, Sir.

President.—Aspen is stronger, is it not?

Mr. Wilkie.—Yes and in the case of aspen we would be able to run the machines a little faster. When the veneer is coming to the formshaft of the machine it can be taken and turned at once without breaking. Simul is not strong enough to stand this strain so well as aspen.

Mr. Mathias.—Do you think that the wastage in Indian wood can be reduced by making perhaps some slight alteration in the machines so as to make the machines which are now suitable for aspen more suitable for Indian wood?

President.—By changing the machinery a bit by adjustment?

Mr. Wilkie.—Perhaps.

President.—What causes the boxes to break?

Mr. Wilkie.—It is the turning.

President.—If the turning is made slowly?

Mr. Wilkie.—It may help, but the outturn will decrease.

President.—You mean it will take more time to produce the boxes?

Mr. Wilkie.—Yes, you will have to keep more machines, and our machines have to run fast that cannot be changed. The whole machines should have been built specially, and no expert can do it.

President.—If all the machines are made for India the manufacturers may think of doing it themselves?

Mr. Wilkie.—I do not think so.

President.—Why not? All that you have got to find out is in what respect the Indian wood is weaker, and having found that it should be possible to devise machinery by which the Indian wood can be better handled?

Mr. Wilkie.—I might say that this is the second time I am in India and have studied all these machines and if it were possible to make any better arrangements or to change any eccentrics I would have done it. I have tried everything possible but I have not succeeded.

President.—Can you not change the speed?

Mr. Wilkie.—The speed can be reduced but then you won't have the capacity. There are so many levers in the machines—I don't know the names of these parts in English—I have tried my best to improve the machines and to make less waste but it is not possible to make the machine better than it already is. I am also of the opinion that not only I—but even other experts who have more experience have already considered what can be done but have not been able to devise any improvements.

President.—Even in the case of aspen there are some factories in Europe where there is practically no wastage at all?

Mr. Wilkie.—That is not quite correct. There is a big factory in Groba in Saxony. I have worked in that factory. They have between 5 and 7 per cent. waste, and another in Belgium which has many Swedish machines, they have 12 to 18 per cent. waste. But then there is another thing. They spend per cubic foot a few annas more and get aspen of first class, without knots.

President.—If you want to save waste you have got to spend more money in selecting the wood?

Mr. Wilkie.—Yes. What I want to say is it all depends on the quality of the wood; if you buy good wood the wastage would be less. In India also it is just the same. If I buy simul wood which has got many knots then the wastage would be high. If we pay more for our simul, we get better logs and there is less waste.

Quality of Indian labour.

President.—As regards these machines your labour is sufficiently trained and you have no trouble?

Mr. Wilkie.—That is so. Of course labour has always got to be trained; I cannot trust men who are already working with me even for six months. They are working all right now but I cannot depend on their turning up tomorrow. They may get sick or absent themselves for some other reason, and that is one of the reasons why we have got that extra half shift to have more trained men. We don't mind having a bigger staff; all that we want is that the machines should be always working.

President.—You have this extra half shift to train more men.

Mr. Wilkie.—Yes.

Mr. Mathias.—This is quite a temporary difficulty. In four or five years when you have trained a sufficient number of people you should not have any trouble.

Mr. Wilkie.—Yes. Now I have taken boys of 16 years and under sixteen I am not allowed to take. If I were to start another factory to-day, I would not take such boys because they run away. If a man is married, he will stick to his job and he would not be so very often absent.

Mr. Mathias.—At sixteen most of the boys are married in this country.

Mr. Wilkie,—That may be so. I only say that I would prefer married man to boys because they would stick to their jobs.

President.—Do you pay smaller wages to the boys?

Mr. Wilkie.—No, we have a contract system and so it does not matter to us whether they are sixteen or twenty or even more but if they were to be paid at monthly rates, of course we have to pay them more.

Dr. Matthai.—Do you get all your labour locally in Bareilly?

Mr. Ranjit Singh.—Mostly from Bareilly and some from the Punjab.

Dr. Matthai.—Is there a great demand for industrial labour in Bareilly?

Mr. Wilkie.—Not much.

Dr. Matthai.—What other industries have you got in Bareilly?

Mr. Wilkie.—There is a big loco. shop; there are sugar factories also. But labour is abundant. At the gate every day there are standing not less than 50 or 60 men.

Labour employed in labelling machines, etc.

President.—You have got 5 labelling machines. How many men have you got?

Mr. Wilkie.—3 men on each labelling machine.

President.—How is that?

Mr. Wilkie.—The difficulty is this. In Germany only two girls are necessary, one to feed the machine with outer cases and one girl to feed the machine with inner drawers. But here the man who is feeding the machine with outer cases finds no time to see to the labelling process properly. I have put one labourer more to help that man.

President.—Do you mean that the man has got to watch the machine in two places?

Mr. Wilkie.—Yes.

President.—In Europe the girl will watch both ends of the machine.

Mr. Wilkie.—She will watch only outer cases and labelling, that is whether labels are properly pasted. At the other end of the machine another girl will sit and feed the machine with the inner drawers.

President.—Do you pay these men by the day?

Mr. Wilkie.—We pay per basket.

President.—These three boys really would get a little more.

Mr. Wilkie.—It costs a little more here than in Europe but the labour is very dear there.

President.—These three boys really would get a little more.

Mr. Wilkie.—Very little more. In Germany if we pay Re. 0-2-9 here we pay Re. 0-3-0 per basket.

President.—10 girls in Germany would cost a good deal more than 15 boys here.

Mr. Wilkie.—Yes.

Mr. Ranjit Singh.—We have to pay higher rates per basket. But when we pay more, they also work more.

Dr. Matthai.—What do you mean by a basket?

Mr. Wilkie.—It contains 3,200 boxes, ready labelled. Sometimes the basket is quite full and sometimes not, so we count 3,000 boxes only.

President.—Will these boys make about Rs. 20 a month?

Mr. Wilkie.—They make more.

President.—How much more?

Mr. Wilkie.—They make about Rs. 23 or 24 on those machines. But on other machines they make even more. For instance on an inside machine a man will make as much as Rs. 34.

Mr. Mathias.—How much would people doing similar work in Germany get?

Mr. Wilkie.—A girl will get about £5 or about Rs. 70 a month.

President.—Here a boy would get about Rs. 23.

Mr. Wilkie.—I have one thing more to say in that connection. If you come to a smaller city you will have to pay about Rs. 60, that is Rs. 10 less according to the city. If the city is big, you may even get your labour at a lower rate.

Dr. Matthai.—The rates in Saxony are lower than in Berlin?

Mr. Wilkie.—No. Take Dresden for instance. The wages there would be just the same as in Berlin.

Mr. Mathias.—Would it be safe for us to say that money rates would be twice as much in Germany as they are in India?

Mr. Wilkie.—Yes.

President.—How many box filling machines have you?

Mr. Wilkie.—Five.

President.—How many men have you on each?

Mr. Wilkie.—Two on each.

President.—Is it the same in Germany?

Mr. Wilkie.—No.

President.—In Germany how many would you have?

Mr. Wilkie.—In Germany one girl will be working the machine and the other girl will bring match boxes and feed the machine with matches. Here it is different. They cannot control the machine. Two men will have to do that work. I have here 20 on the whole—10 on the machine and 10 to carry matches; and filled and empty boxes whereas in Germany I would have only 12 girls.

President.—That is because the labour is trained.

Mr. Wilkie.—Yes. But labour is improving. I have in one year reduced my staff very much. I will reduce the staff still further. But at present it is impossible.

President.—You can cut out three or four boys in this Department?

Mr. Wilkie.—Yes, but not just now.

President.—What about the packeting machine?

Mr. Wilkie.—In Germany we have only two whereas here we have four.

President.—Why do you have four men here?

Mr. Wilkie.—They cannot control the machine properly. Ordinarily I would need only three but now owing to the size of the labels being bigger than they ought to be I have to engage a fourth man.

Dr. Matthai.—Why are these labels bigger?

Mr. Wilkie.—They are not made of the proper size. We had some labels printed in Lahore and they are out of size and a little bigger.

Dr. Matthai.—Owing to the labels being bad you have to keep four men?

Mr. Wilkie.—Yes, otherwise we need only three men.

President.—What about side painting?

Mr. Wilkie.—We need only one man, the same as in Germany.

President.—Drying Drum for splints?

Mr. Wilkie.—No men at all; it is automatically working.

President.—Cleaning machine for splints.

Mr. Wilkie.—That is also automatic, we employ no men.

President.—Splint levelling?

Mr. Wilkie.—Three men, the same as in Germany.

President.—Waste levelling?

Mr. Wilkie.—One man. In Germany also we require one man.

President.—What about drying chamber for boxes?

Mr. Wilkie.—It needs no man. We have only one man on the conveyor and this is the case in Germany too.

President.—Chemical grinding?

Mr. Wilkie.—I have two there. In Germany also we have two.

The Simplex machine.

President.—Then we come to the Simplex. I want to know how many processes are eliminated by using the Simplex machinery. First of all in the Simplex you put the splints?

Mr. Wilkie.—From the levelling machine the splints are taken out and fed into the Simplex magazine.

President.—If you don't have the Simplex you would have to employ frame filling machines?

Mr. Wilkie.—Yes. If we did not have that Simplex machine we would need no less than 20 frame filling machines, 20 frame emptying machines and then I would need three paraffining apparatuses too and trays to carry the frames.

President.—Then you would have the paraffining apparatus?

Mr. Wilkie.—Yes. Then comes dipping, then drying, then emptying into cases for the box filling machines.

President.—All these processes are performed by the Simplex?

Mr. Wilkie.—Yes.

Dr. Matthai.—How many gross of splints does your Simplex carry at a time?

Mr. Wilkie.—In 60 minutes I make about 1,500,000 splints ready, paraffined, dipped, dry and filled in cases.

President.—You work for ten hours?

Mr. Wilkie.—Yes.

President.—Therefore every hour you make 150 gross if your capacity is 1,500 gross a day?

Mr. Wilkie.—Yes.

President.—That is 150 gross per turn of the Simplex chain.

Mr. Wilkie.—Yes. But the Simplex you can increase the number of revolutions from 85 which is the lowest to 120 revolutions which is the most we can do.

President.—How many are you working now?

Mr. Wilkie.—About 93. If I had 85 it should make 1,500 gross but I run it 8 to 10½ revolutions more.

Dr. Matthai.—Have you seen the Simplex at Lahore?

Mr. Wilkie.—No.

President.—You have got seven stages in the Simplex?

Mr. Wilkie.—No, eight.

President.—They have got five.

Mr. Wilkie.—For drying purposes it is better to have a bigger machine.

Mr. Mathias.—How does it compare with Adamjee's?

Mr. Wilkie.—I have not seen their Simplex. When I erected the factory they had only German and Japanese frame filling machines.

President.—How many men have you on the Simplex?

Mr. Wilkie.—Three men and in Germany I should have $2\frac{1}{2}$.

President.—What do you mean by $2\frac{1}{2}$ men?

Mr. Wilkie.—In Germany if I have only one machine I will have $2\frac{1}{2}$ men, that is one man will work in the chemical house also half the time.

President.—He will attend to something else?

Mr. Wilkie.—Yes.

Mr. Mathias.—How many men would there be on the ordinary processes which the Simplex is designed to take the place of?

Mr. Wilkie.—About 65 to 70 men.

Mr. Mathias.—You are employing three men instead of about 68 men?

Mr. Wilkie.—Yes.

President.—The frame filling machines do not last long, do they?

Mr. Wilkie.—These frames break very often; not only that, the frame filling machines do not also work very satisfactorily with aspen wood which is the very best wood for matches, if the splints are pressed far too much sometimes in the frames, the middle portion of the splints becomes thinner and the sticks break when striking.

President.—How much does the Simplex cost?

Mr. Ranjit Singh.—I shall let you know after looking up the bill.

President.—Is there any difficulty in the Simplex because you are using Indian wood instead of aspen?

Mr. Wilkie.—I don't think there is any difficulty except in the training of labour. In the beginning, they did not understand how to change needle bars. As a matter of fact, in our factory one man has picked up the work in three days whereas another man, though he is with us for the last six months, does not know yet to remove the needle bars.

President.—That means you would have to stop the Simplex.

Mr. Wilkie.—Yes, for a few minutes.

President.—In a day how many times have you to stop the machine?

Mr. Wilkie.—I am now working with the same needles for about two months and not a single needle has broken but it sometimes happens that 10 needles are broken in a day. When that happens, you have to stop the machine, take the needle bar out and put in the reserve one. It takes about two minutes to do it.

Dr. Matthai.—Is that the only serious trouble that takes place?

Mr. Wilkie.—Yes, and no other.

President.—How long have you been working this Simplex?

Mr. Wilkie.—From April 1927 and the factory was started in January for trial, and by and by I engaged men and began to work the whole factory.

Dr. Matthai.—What is your experience in Germany; does the breakdown of the Simplex cause any serious inconvenience?

Mr. Wilkie.—That depends on the advice of experts. If good attention is taken and the machine well lubricated nothing serious can break, and if still any part of the machine does, it can be taken out and another spare part replaced. The needles are the only thing that will break. It sometimes happens that in those groove bars where the matches are fed screws drop and this

can be prevented only when an expert sees that no rivets or screws are mixed up with splints.

President.—That is due to carelessness?

Mr. Wilkie.—Yes.

Dr. Matthai.—Sometimes you find that in the Simplex the whole chain is not filled with splints?

Mr. Wilkie.—This will only happen if there are some thick splints mixed up with the others and they don't fit into the groove, it can be removed easily.

Dr. Matthai.—Some kind of wood works better on the Simplex?

Mr. Wilkie.—Yes; it depends on the corners of the splints. If there is no corner it does not stick properly and falls down.

Dr. Matthai.—Can you make any kind of comparison between the wastage you get in the Simplex and in the frame filling machines?

Mr. Wilkie.—I am now very long out of the frame filling machines and I cannot give you expert advice, but I know that there is much more wastage on the frame filling machines, frame emptying machines and dipping machines. In Burma they had four waste levelling machines whereas here I have got only one and you can judge from that the amount of wastage.

Size of match made.

President.—You make $\frac{3}{4}$ size only.

Mr. Wilkie.—Yes.

President.—It is only as regards the length that the full size and $\frac{3}{4}$ size boxes differ?

Mr. Wilkie.—No, they differ in the height too.

President.—You will find that though the height is a little more there is hardly any space; the splints are very closely packed in the full size boxes whereas in your case the box is not quite full.

Mr. Wilkie.—It is full, only the thickness of the heads differs sometime a little.

President.—So far as you are concerned, your box is just large enough to take in all the splints comfortably whereas in the full size boxes they are tightly packed.

Mr. Wilkie.—I can also push in more splints, but with smaller heads.

President.—Yes, but you don't do that. For that reason the full size boxes break in filling.

Mr. Wilkie.—Yes, but that depends on the wood too.

President.—You have got an advantage in that your box is slightly bigger than you strictly require for the number of splints put in and therefore in your box filling fewer boxes break than in the case of the full boxes when they are packed tightly.

Mr. Wilkie.—Some manufacturers ordering standard boxes, some have their own special wish according to the order machines are supplied.

President.—If you are to use box filling machines without much waste, there must be more room in the boxes than they have at present. Do you agree with me that if there were fewer matches in the box and slightly thicker splints, there would be less wastage owing to the softness of the Indian wood?

Mr. Wilkie.—I quite agree with you there.

Dr. Matthai.—Take the imported $\frac{3}{4}$ size boxes; do they contain the same number of splints as your $\frac{3}{4}$ size?

Mr. Wilkie.—They have five or six splints more but the box is of the same dimensions, the Indian like big heads and flame.

Dr. Matthai.—The difference between the $\frac{3}{4}$ and full size box is that the latter is a little longer and a little higher, is it?

Mr. Wilkie.—Yes.

Dr. Matthai.—The imported splints are as thick as yours?

Mr. Wilkie.—No, they are thinner because they are made of aspen.

Dr. Matthai.—They are of the same thickness as the imported full size?

Mr. Wilkie.—Yes. The difference between the full size and ¾ size is not much, unless there is a special order for an odd size of stick.

President.—As a matter of fact the Swedish Match Company say that further East they have to use lighter material for putting in the same number of splints.

Mr. Wilkie.—That I believe.

President.—So what you have to do is to put heavier material and fewer splints.

Mr. Wilkie.—If I were to use aspen wood I would make as thin splints as they do, but with other machines the Swedish Match Company think that if their boxes are filled to the bursting point people won't buy anything else! But if I did that there would be more waste in the box filling.

Varieties of timber used.

President.—How many varieties of wood do you use?

Mr. Wilkie.—We are using simul for boxes and for splints we are using kanjoo.

President.—Also setkadon?

Mr. Ranjit Singh.—Yes.

President.—And bowring? What is the Latin name for it?

Mr. Ranjit Singh.—I will let you know.

President.—Those are the three principal varieties and you have also simul?

Mr. Ranjit Singh.—Yes.

President.—Setkadon from your point of view is the best?

Mr. Wilkie.—Not the best. It is a hard wood and being whiter is preferred in the market.

President.—Where do you get these timbers from?

Mr. Ranjit Singh.—From the Kumaon forests, about 200 miles from Bareilly.

President.—Do you work the forests yourselves or do you buy from contractors?

Mr. Ranjit Singh.—We buy a proportion of our requirements from contractors, but we have also arrangements with Government forest department for the supply of timber.

Cost of timber, supply, consumption, etc.

President.—How much does the total cost come to per cubic foot delivered at the factory?

Mr. Ranjit Singh.—About 11 annas; may be 6 pies less or 6 pies more.

President.—What does simul cost you?

Mr. Ranjit Singh.—It is 6 pies cheaper.

President.—Are you sure that you will always be able to get this wood at this price?

Mr. Ranjit Singh.—Not always because after a year or so the distance will be more and the cartage will be higher.

President.—Have you got enough wood?

Mr. Ranjit Singh.—The forest officers say they have got enough wood.

President.—Which forest officer?

Mr. Ranjit Singh.—The special forest officer (the utilization officer) says that there is wood for 20 to 30 years for the factory.

President.—You think the prices may go up, don't you?

Mr. Ranjit Singh.—Yes, by one or two annas, not more. But I don't know whether Government would increase the royalty. If they do that then the price will be higher.

President.—What is the present rate of royalty?

Mr. Ranjit Singh.—Rs. 16 per tree. I took 100 trees and out of that I could get 7,300 c.ft.

Mr. Mathias.—That is about Rs. 11 a ton of 50 c.ft.

Mr. Ranjit Singh.—Yes, and for the simul tree they are charging Rs. 7 per tree out of which I am getting about 40 c.ft.

Dr. Matthai.—You require about 3,000 tons a year?

Mr. Ranjit Singh.—Yes.

Dr. Matthai.—The Forest department thinks that you can get that for the next 20 or 30 years?

Mr. Ranjit Singh.—Yes.

President.—Can you tell me how much wood you require per 100 gross? How many gross can you make out of 1 c.ft.?

Mr. Ranjit Singh.—Last year we made about 3 gross per c.ft. and this year we think we will be able to make four gross.

President.—Have you worked it out?

Mr. Wilkie.—It is very difficult to say. We have not gone into it very carefully but in the beginning it came to about 2·3 gross because the labourers were unskilled. We are gradually improving.

Mr. Ranjit Singh.—From January to end of December we purchased about 71,000 c.ft. and the balance that we have got is 7,000 c.ft.

President.—So you used 64,000 c.ft.

Mr. Ranjit Singh.—Yes and we made 190,000 gross including cases—and we bought about 1,000 cases in the bazar.

President.—So that you made about 3 gross per c.ft.?

Mr. Wilkie.—Yes. Next year it will be better.

Mr. Ranjit Singh.—In the beginning the wastage was enormous.

President.—You don't keep your monthly cost sheets to see how much wood you are using?

Mr. Wilkie.—We keep that.

President.—A packing case for 50 gross will take how many cubic feet?

Mr. Ranjit Singh.—2 cubic feet of log.

Mr. Wilkie.—In the month of November we used 5,663 c. ft. 9 ins. of log for peeling only.

President.—After the bark had been removed and the ends cut?

Mr. Wilkie.—Yes.

President.—Excluding barking and cross cut wastage and packing cases how much did you get?

Mr. Ranjit Singh.—We got 550 cases of 50 gross each.

Dr. Matthai.—That is about 4½ gross per c. ft. after the wood has been barked?

Mr. Wilkie.—Yes. By and by we hope to get half a gross more or so, and at the end of next year we can get a better average.

Costs per gross.

President.—Can you tell me what your costs were?

Mr. Ranjit Singh.—It was about Rs. 1-2-0 for the last year and for November it will be about Re. 1-1-0.

President.—What does this cost include?

Mr. Ranjit Singh.—It includes everything, the labour, the price of wood, the price of the box in which we pack and the agents' commission of 5 per cent.

President.—Does it include interest?

Mr. Ranjit Singh.—No.

President.—Does it include depreciation?

Mr. Ranjit Singh.—Yes, and also insurance.

President.—How much depreciation have you taken?

Mr. Ranjit Singh.—About 8 per cent. on the cost of machinery which is Rs. 2,15,000.

President.—You have divided it by the production?

Mr. Ranjit Singh.—Yes.

President.—How much per gross did it come to?

Mr. Ranjit Singh.—1 anna 3 pies per gross.

President.—That is included in the cost?

Mr. Ranjit Singh.—Yes; this includes depreciation, insurance and spare parts.

President.—But depreciation only is 1 anna 3 pies, is it not?

Mr. Ranjit Singh.—No; these three taken together. This would be only for November and December. If you take the whole year it will be more, about 2 annas.

President.—That does not include your interest on working capital?

Mr. Ranjit Singh.—No.

President.—You have only one commission agent.

Mr. Ranjit Singh.—We have one commission agent for the Punjab and one for the United Provinces.

President.—Then you have nothing to do with sales?

Mr. Ranjit Singh.—We have got one man to go there and look after the arrangements.

President.—The whole production is supplied to the commission agent?

Mr. Ranjit Singh.—They send us the order and we supply the goods to those stations and pay this man 5 per cent.

President.—What average price do you get?

Mr. Ranjit Singh.—Re. 1-3-6 loaded into wagons.

President.—That is f.o.r.

Mr. Ranjit Singh.—We send the railway receipt and charge Re. 1-3-6.

President.—Re. 1-3-6 is nett; out of that you don't have to pay anything?

Mr. Ranjit Singh.—That is correct.

President.—You find no difficulty in selling your goods?

Mr. Ranjit Singh.—In the beginning we had much difficulty but not now.

President.—How many labels have you?

Mr. Ranjit Singh.—We are using about four or five labels; of course we are changing the labels now and then.

Dr. Matthai.—In all these markets where you are selling now, before you entered the field was it the $\frac{3}{4}$ size that was being sold, or was it any other size?

Mr. Ranjit Singh.—$\frac{3}{4}$ size in the Punjab and in the United Provinces some half size and some $\frac{3}{4}$ size.

President.—You don't make any other size than the $\frac{3}{4}$ size?

Mr. Ranjit Singh.—No.

Mr. Mathias.—Where were they getting their supply of $\frac{3}{4}$ size matches from?

Mr. Ranjit Singh.—From Ahmedabad and from Sweden.

Mr. Mathias.—Do you mean the Gujrat Ismal Match Factory?

Mr. Ranjit Singh.—Yes.

Mr. Mathias.—Do you have imported ¾ size Swedish matches in this province?

Mr. Ranjit Singh.—Yes.

President.—What is your working capital?

Mr. Ranjit Singh.—Sometimes it is Rs. 50,000 and sometimes it is Rs. 70,000. We have great difficulty in getting our stores, we sometimes get our stores about 8 months after placing the order for the goods. Supposing now we placed an order for paper then after nine months we get the goods but we have to pay the money with the order.

President.—As regards your sales you simply send the railway receipt to the commission agent and get the money?

Mr. Ranjit Singh.—Yes.

President.—So that you don't have to give any credit to them?

Mr. Ranjit Singh.—If the cheque is under Rs. 5,000 the bank does not charge anything but if it is more than Rs. 5,000 the bank charges.

President.—Do you present the railway receipt to the bank?

Mr. Ranjit Singh.—It is sent direct to the commission agent; he sends it through the bank to the dealer.

President.—How are you paid?

Mr. Ranjit Singh.—They pay us within 15 to 20 days.

President.—So you do not have to give them credit really speaking?

Mr. Ranjit Singh.—Not more than 15 days.

President.—All the matches you manufacture are sold; you need keep no stock?

Mr. Ranjit Singh.—Sometimes there is stock but it is not much.

Handling of chemicals.

President.—As regards chemicals, Mr. Wilkie, I think you explained to me that there was risk of explosion or of fire if the workers were not careful in the mixing of chemicals. Have you had any fire or explosion in your works.

Mr. Wilkie.—We have had fire on two occasions.

President.—In the chemical department?

Mr. Wilkie.—No, it was on the Simplex machine.

President.—What was that due to?

Mr. Wilkie.—There were some splints which were not sticking in the holes and when they passed the ventilators they came out and struck each other and caught fire.

President.—Will matches catch fire by striking against each other?

Mr. Wilkie.—Very seldom but it sometimes does happen.

President.—In making the mixture do you have to be very careful?

Mr. Wilkie.—Yes, but an ordinary man can do it if he knows how to handle chemicals. He must know that potash should never be, in dry condition, mixed with any other chemical and that it should be kept separate from other chemicals such as phosphorus.

Mr. Mathias.—It would be dangerous, would it not, if you had a fire burning in your factory?

Mr. Wilkie.—Yes. Smoking is not allowed in the factory. You can't go about with an open lamp inside the factory. It is strictly prohibited.

Mr. Mathias.—If a private individual were to make matches in his own house, say in his kitchen, that would be dangerous, would it not?

Mr. Wilkie.—Yes, it is very dangerous.

President.—Is that due to the chlorate of potash or what?

Mr. Wilkie.—Yes, it is due to potash.

President.—Supposing he was turning out 50 gross of matches?

Mr. Wilkie.—It will be dangerous if he does not know how to handle potash.

President.—There might be a serious explosion?

Mr. Wilkie.—Yes.

Mr. Mathias.—It gives off oxygen?

Mr. Wilkie.—Yes. Potash must never be mixed in dry condition with any other chemical. If you go against this there would be danger.

President.—When you mix it you put it in glue?

Mr .Wilkie.—In the hot glue. It is quite an easy job. I am doing nothing myself in the chemical house. I give the recipe and that is all and the men there do it.

President.—If a villager wants to make matches, can he make this composition without incurring some risk?

Mr. Wilkie.—He cannot do that without the help of a chemist.

Mr. Mathias.—I suppose he could make it but it would be dangerous?

Mr. Wilkie.—If the man knows a little about chemicals he can do it, but not otherwise.

Mr. Mathias.—In any case even if he knew all about chemicals manufacture in a kitchen would be dangerous, would it not?

Mr. Wilkie.—It would be.

MGIPC—L—328STB—19-11-28—750.