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LIBRARIES

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Afghanistan

Afghanistan, a republic in central South Asia, is bordered by the U.S.S.R. on the north, China and Jammu and Kashmir in two areas of the northeast, Pakistan on the east and south, and Iran on the west. Population (1984 est.) 17,650,000; area 653,000 sq.km. The official languages are Dari (Afghan Persian) and Pashto. The peasant-tribal society is composed of various ethnic groups (Pashtuns, Tajiks, Hazaras, Uzbeks, Baluchs, Turkoman, and Kirghiz, among others), with a 90 to 95 percent nonliterate population.

History. In Afghanistan, as in many Asian countries, what libraries there were in the past were created, organized, and supported by an elite group of rulers and religious leaders for their own use. Only comparatively recently did the concept of libraries as institutions of preservation give way to a more modern concept of libraries as sources of knowledge and information service. However, the progress made in the late 1960s and early 1970s was stalled by the coup d'état of April 1978 and the Soviet occupation of the country. Reliable information about libraries thereafter was scarce.

National Library. There is no national library in Afghanistan, but some functions of one are performed by certain institutions, such as the Kabul University Library, the Ministry of Education Reference Library, and the Public Library of the Ministry of Information and Culture. A national bibliography is issued irregularly by the Kabul University Library.

Academic Libraries. The most important and largest library in Afghanistan is the Kabul University Library. Kabul University (Kabul Pohantun) was founded in 1932. Small faculty libraries came into existence but were accessible only to faculty members. In 1967 an Indiana University team reorganized the structure of the university system, and the present library was organized at that time. (Betty White, an American librarian, is remembered for organizing the present University Library.) Its collection totals about 130,000 volumes, arranged by the Library of Congress Classification. It holds special collections dealing with material on Afghanistan and Islamic civilization.

At 13 teacher training institutions, high school graduates are given one to two years of training and then sent to the provinces in a program to eradicate illiteracy. The provincial teacher training institutions

have small libraries numbering at the most 500 books. These small collections were augmented regularly by small gifts of books from foreign philanthropic and cultural organizations.

Most of these collections, largely in English, were entrusted to teachers untrained in librarianship. The three teacher training institutions in Kabul fare much better. The Higher Teacher's College, a two-year institution for the training of college-level teachers, has a library of approximately 10,000 volumes with a professionally trained librarian. The Academy for Teacher Education and the Dar'ul Mo'alamein training schools have libraries of approximately 1,000 volumes. The greater portion of the collections is in English, a language not usually known by the students.

Public Libraries. The Public Library of the Ministry of Information and Culture, usually referred to as the Kabul-Public Library, is in the central part of the city facing Zarnegar Park. The Library has its own Reading Garden, a pleasant plane tree grove with reading benches along the public paths, and popular with Kabul students who use the area as an outdoor reading-study room. Its collection numbers 120,000 volumes; a large portion is in English. Efforts were made to increase the books in the two national tongues, Pashtu and Dari. There is a Children's Section, an Afghan room housing material pertaining to Afghanistan, and a periodical room containing a complete collection of Afghan periodical publications. The Library is under the direct jurisdiction of the Ministry of Information and Culture. Not all books circulate, but all may be used on the premises. The Library is housed in a two-story building that was once a private mansion, and has five branches. There are 36 other public libraries in the country, but all have far smaller collections.

School Libraries. In Kabul, Habiba High School, subsidized at one time by the Americans, has a library with a collection of 5,000 books, supervised by a teacher. The Isteqal Lycée, subsidized by the French government, has a library of approximately 10,000 volumes in French. The "Russian" Polytechnique Institute has a library, but it is not open to the public. It has approximately 10,000 volumes on science and technology. The "German" High School, subsidized to some extent by the West German government, also has a library, primarily in German. In elementary schools libraries are practically nonexistent, though a few have small collections of 50 to 100

Libraries in Afghanistan

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (afghani)	Population served	Professional staff	Total staff
National	--	--	--	--	--	--	--
Academic	14	--	140,000	--	8,600	4	30
Public	37	--	200,000	--	450,000	1	25
School	4	--	30,000	--	3,000	0	5 ^a
Special ^b	5	--	150,000	--	3,000	4	24

^aPart-time.

^bIncludes embassy libraries open to the public.

Sources: Unesco, *Statistical Yearbook*, 1984, for number of public libraries and volumes (1980 data); for other data, Louis Dupree, *Afghanistan*, 1973; "Survey of Progress," Department of Statistics, Ministry of Planning, 1977.

books, usually administered by a *tawildar* (keeper), who discourages lending because he or she is held financially responsible for all books lost. There was no government assistance to libraries at the elementary school level.

Special Libraries. The Historical Society of Afghanistan Library, in the Shar-e-Nau section of Kabul, has a collection of approximately 40,000 volumes. This specialized collection deals exclusively with anthropology, ethnology, prehistory, archeology, genealogy, history, and folklore of Afghanistan. It contains all publications of the Délégation Archeologique Française en Afghanistan (DAFA), which excavated sites at Ai Khanoum and Hadda. Other special libraries include the Afghan Institute of Technology, the Anjuman Tareekh, and the Goethe Institute. All are in Kabul, and all have small collections.

The Profession. The Anjuman Kitab-khaneh-Afghanistan (Afghanistan Library Association) was organized in 1971 by a former Kabul University Librarian, Abdul Rasul Rahim, to promote literacy and libraries in Afghanistan as its basic objective; it works to improve the status of librarians and to lobby for a national library system and for a School of Library Science within Kabul University. It sponsored training workshops and seminars for teacher-librarians in the teacher training schools and irregularly published the *Afghan National Bibliography*.

JOHN DE BELFORT URGUIDI*

Aguayo, Jorge (1903-)

Jorge Aguayo is considered the founding father of modern library procedure and library education in Cuba. He also contributed to the library development in other parts of Latin America, to furthering library cooperation through the Pan American Union and the American Library Association, and to scholarship in Spanish-language classification.

Born in Havana, Cuba, on December 4, 1903, Aguayo received his early schooling in the capital. At the University of Havana he received degrees in Civil Law in 1925 and in Diplomatic and Consular Law in 1927. After nine years of diplomatic service, Aguayo entered the library field, following a strong interest in books and learning.

In 1937 he began a long and fruitful association with the General Library of the University of Havana, serving as Assistant Director until 1959, when he assumed the post of Director. The Rockefeller Foundation awarded him a one-year fellowship to study at Columbia University's Library School in 1941, and Aguayo took a concentrated curriculum with emphasis on cataloguing problems and university administration. In the years following his return to the University of Havana, the General Library pioneered in the use of fundamental tools such as the dictionary catalogue with subject headings translated and adapted from the Sears and Library of Congress lists, the Dewey Decimal System, the ALA cataloguing rules, the use of Library of Congress printed cards, the establishment of a separate reference collection, and many other services previously unknown to Cuban library users. The results of Aguayo's work are summarized in three manuals written in the 1940s:

Reglas para la ordenación del catálogo diccionario de la Biblioteca General de la Universidad ("Rules governing the dictionary catalogue of the General Library of the University," Havana, 1940); *Manual práctico de clasificación y catalogación de bibliotecas* ("Practical manual of classification and cataloguing for libraries," Havana, 1943; 2nd ed., 1951); and *Modelos de fichas* ("Model cards," Havana, 1942; 2nd ed., 1949). The latter two have been used as textbooks by a number of Latin American library schools.

In 1940 Aguayo and three associates initiated the teaching of library science at the Havana Lyceum. All four served as Cuba's first professional faculty of library science, offering a variety of courses lasting three and six months. In 1946 the formal teaching of library science began with the establishment of Cursos de Técnica Bibliotecaria at the Summer School of the University of Havana under Aguayo's direction. He served as Director of the summer courses until 1952 and assumed the professorship of cataloguing and classification in the University's School of Librarianship from its founding in 1950 until his departure from Cuba in 1960.

Aguayo's involvement in library development in individual Latin American countries and the region as a whole went hand in hand with his ambitious program in Cuba. In 1944 the U.S. State Department, the ALA, and the Rockefeller Foundation invited him to teach the first library science course in Peru after a fire destroyed the National Library in Lima. In 1947 he accepted an offer to attend the First Assembly of Librarians of the Americas. He served as a consultant to the Regional Conference of National Commissions of the Western World, held in Havana in 1950, and to the Conference on Development of Public Library Services in São Paulo in 1951. He was President of the first Cuban Library Workshop in 1953.

Aguayo served as a prominent spokesman for Latin American librarians on cataloguing matters within the American Library Association. He was a member of the Canadian and Latin American Subcommittee of the ALA's Special Committee on Dewey Classification from 1944 to 1947. He then served on the ALA's Standing Committee on Cooperation with Latin American Catalogers and Classifiers from 1953 to 1958.

LATER CAREER

After the Castro revolution in 1960, Aguayo went to the United States and worked for a brief time at Syracuse University as bibliographer in charge of the Farmington Plan for Uruguay, Paraguay, and Argentina. In 1962 he became the Branch Librarian of the Pan American Union (PAU) and served as the Head Librarian of the PAU's central Columbus Library from 1968 until 1973. During that time he was also consultant to the Spanish translation of the Anglo-American Cataloging Rules (1970) and together with Carmen Rovira compiled the PAU-sponsored *Lista de Encabezamientos de Materia para Bibliotecas* ("List of headings for libraries," 1967), a milestone work that served libraries throughout the Spanish-speaking world as the basic subject heading list. Aguayo was named Editor and Director of the translation into Spanish of the 18th edition of the Dewey Decimal Classification System.

MARTHA TOMÉ



ALA

Jorge Aguayo

to Children (1967-68), Chairperson of the Newbery-Caldecott Awards Committee (1966), and member of the ALA Executive Board (1968-72). She was a member of the Hans Christian Andersen Award Committee (1974-78) and representative to UNICEF for the ALA/IBBY. Recognizing her many years of service, ALA extended to her its highest award of Honorary Membership in 1975.

Other professional affiliations include membership in the Women's National Book Association, South Carolina Library Association, and the South Eastern Library Association. Baker was a delegate to the 1970 White House Conference on Children. She also served as a consultant to the Council on Library Resources, the Teen Age Book Club of the Scholastic Book Service, and the *Children's Digest* magazine. In 1975 she was one of the co-founders and co-chairperson of the Friends of (New York Public Library) Children's Services.

Baker received many awards and honors, including the *Parent's Magazine* Medal Award (1966) "for outstanding service to the nation's children"; the ALA Grolier Award (1968) "for outstanding achievement in guiding and stimulating the reading of children and young people"; and the Clarence Day Award (1974) "for leadership given to the world of children's books." She also received the Distinguished Alumni Award, State University of New York, Albany. In 1978 she received the honorary Doctor of Letters from Saint John's University, Queens, New York. In 1981 the Catholic Library Association presented her with the Regina Medal "for distinguished contributions to children's literature."

Among the publications she edited are *Talking Tree* (1955), *Golden Lynx* (1960), *Young Years* (1960), and *Readings for Children* (New York Library Association, 1964). She wrote *The Black Experience in Children's Books* (New York Public Library, 1971) and was co-author with Ellin Green of *Storytelling: Art and Technique* (1977). She wrote other articles and reviews for professional periodicals and the press.

SPENCER G. SHAW

Bangladesh

Bangladesh, a people's republic and member of the Commonwealth in the northeastern Indian subcontinent on the Bay of Bengal, is one of the most densely populated countries in the world. Population (1984 est.) 97,488,000; area 143,998 sq.km. The official language is Bangla (Bengali).

History. Prior to 1972, the area was East Pakistan, and before the partition of India in 1947, it was the province of East Bengal and the Sylhet district of Assam. Libraries suffered great losses during the Bangladesh War in 1971, and the young country, hindered by lack of financial resources, is still struggling to rebuild its collections.

Only 5 percent of the people in Bangladesh live in Dhaka, the capital, yet more than 75 percent of the library resources are there. Dhaka houses the premier academic library, the National Library, and nearly all of the special libraries. Most of the libraries in Bangladesh have noncirculating collections, limiting their use to nearby residents.

A key factor in the development of libraries in Bangladesh is the infusion of support from donors in the developed countries. Most Western nations have active aid programs operating in Bangladesh and a few of those resources are directed to libraries. The most sophisticated libraries in the country are those specialized collections financed partly from external sources. While modern technology was available in the mid-1980s to only a few libraries in Bangladesh, professional librarians, especially those with training from abroad, were eager to automate and computerize their operations.

National Library. In 1972 the Directorate of Archives and Libraries established the Bangladesh National Library and the Bangladesh National Archives. Both were still small and developing in the mid-1980s, but the Bangladeshi government targeted the National Library as one of its core projects.

The Copyright Ordinance of 1974 mandated that the National Library receive copies of all books published in Bangladesh. (Only 616 books were published in Bangladesh in 1983.) The 75,000-volume collection consists of Bengali, Urdu, and English-language materials. The Library also collects journals and newspapers published in Bangladesh. No circulation of materials is permitted. From 1973 the Library published the annual *Bangladesh National Bibliography* in both English and Bengali.

The Archives of East Pakistan were housed in Lahore (West Pakistan). Therefore, after independence the new country of Bangladesh was left with virtually no official records. In the 14 years after 1971, the National Archives surveyed materials from the divisional government offices around the country and trained archivists to prepare the materials. In November 1985 the National Library and the National Archives moved to a seven-story air-conditioned permanent building that provides 60,000 square feet of working space.

Academic Libraries. Six academic libraries serve Bangladesh's 42,800 university students: Dhaka University (established 1921), 500,000 volumes; Rajshahi University (1953), 230,000 volumes; Bangladesh University of Engineering and Technology (1962), 87,781 volumes; Chittagong University (1966), 117,000 volumes; Mymensingh Agricultural University (1966), 123,711 volumes; and Jahangirnagar University (1970), 50,000 volumes. All six libraries are staffed with professional librarians, have varied collections of foreign and domestic journals and newspapers, and offer reference services and bibliographic instruction to their patrons. There is no formal interlibrary loan arrangement among the university libraries, but materials are made available to students and faculty through informal contacts. Most of the academic libraries have established interlibrary loan arrangements with the British Library Lending Division.

Because textbooks are expensive and not readily available in Bangladesh, most of the university libraries have large textbook collections. At Bangladesh University of Engineering and Technology, students rent textbooks from a rental library. Circulation of nontextbooks is limited in most libraries to faculty and graduate students. The majority of materials are in English, with Bengali, Urdu, Arabic, and Persian comprising the remainder of the collections.

The Dhaka University Library is the premier library in the country. Its collection of 500,000 volumes is the largest in Bangladesh and covers all academic disciplines except engineering, technology, and medicine. The Library has a professional staff of 57 librarians and a total budget of 9,200,000 taka (approximately \$300,000). In addition to its direct role in serving Dhaka University faculty and students, the library has assumed a significant role in collecting and preserving the archives of Bangladesh. It houses 25,000 handwritten manuscripts, many from the 14th and 15th centuries, reflecting the literature and culture of Bengal. Among its rare book collection is the periodical *Dhaka Prakash*, a major periodical of local news from 1890 to 1914. The Library also microfilms local journals and newspapers.

Public Libraries. The Bangladesh Central Public Library (BCPL), Dhaka, is the headquarters of the Public Library Department and administers the government-sponsored divisional and district public libraries. Part of the Dhaka University Library before 1963, BCPL has a collection of 100,00 volumes and is the focal point of all public libraries in Bangladesh. It also sponsors cultural exhibits and has a children's library.

In addition to the Central Public Library in Dhaka, divisional public libraries of approximately 30,000 volumes each are located in Chittagong, Khulna, and Rajshahi. There are 65 district level public libraries around the country, each with approximately 4,000 volumes. Thirty-six professional librarians staffed the 69 public libraries in the country in the mid-1980s.

The focus of the public libraries in Bangladesh is on textbooks, because the majority of patrons are students. Public libraries do not allow books to circulate, nor did they offer bookmobile or audiovisual services in the mid-1980s.

School Libraries. Library services to the 8,900,000 pupils attending 44,000 primary schools and 2,600,000 students attending the 9,000 secondary schools are limited. Most primary schools have no libraries; some secondary schools have library facilities, with teachers serving as librarians. The government was making a strong effort to train school librarians in the 1980s. The school library collections range in size from 500 to 5,000 books, but most libraries are at the lower end of the scale. English, Bengali, and Urdu materials can be found in the libraries. Because audiovisual materials are not available and because media centers do not exist in school libraries, the Dhaka Teacher Training College Audio-Visual Education Center provides a mobile unit of

audiovisual services to visit schools around the country.

Special Libraries. Special Libraries, both government and privately funded, play an important role in Bangladesh and are an integral part of the library system of the country. Most are associated with scientific organizations, research institutes, and government departments, and are staffed by professional librarians. The libraries of the Bangladesh Agricultural Research Council (BARC) and the International Centre for Diarrhoeal Disease Research (ICDDR) are two examples of well-staffed special libraries receiving resources from Western countries. They offer reference services, literature searching, compilation of bibliographies, current awareness service, indexing and abstracting, and selective dissemination of information to their patrons.

BARC had eight professional librarians (1985), five of whom had training abroad. The Library uses a microcomputer database management system to publish subject bibliographies. BARC created the National Agricultural Library and Documentation Centre (NALDOC), which serves as the national center for AGRIS (Agricultural Research Information Service) and CARIS (Current Agricultural Research Information Service).

The ICDDR Library, part of a well-financed internationally acclaimed medical institute, has an 18,000-volume collection, collects 525 medical journal titles, and has a reprint collection of more than 12,000 articles, reports, and documents. The BARC and ICDDR libraries represent the most sophisticated operations in the country and show how external support can substantially upgrade collections and services in a developing country. Other special libraries of interest are the Bangladesh National Scientific and Technical Documentation Centre (BANSDOC) and the National Health Library and Documentation Centre and libraries of the Bangladesh Institute of Development Studies, Bangladesh Atomic Energy Commission, and Bangladesh Bank.

Some foreign governments also provide library services in Bangladesh. Most are in Dhaka and are heavily used by college and university students. The British Council Library has a collection of 50,000 volumes and more than 100 subscriptions to British journals and newspapers. More than a third of its collection are textbooks for the use of college and university students. In addition, the Council offers English-language classes, cultural programs, and scholarships for study abroad. The American Cultural Center Library's 6,300-volume collection and 150 journals and 4 newspapers are used by about 175

Libraries in Bangladesh (1984)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (taka)	Population served	Professional staff	Total staff
National	1	1	75,000	800,000	--	25	73
Academic	6	14	1,108,492	--	42,800	--	--
Public	69	69	500,000	7,000,000	--	36	346
School	--	--	--	--	--	--	--
Special	125	--	--	--	--	--	--

students daily. Like the British Council, the American Cultural Center sponsors films, speakers, and cultural presentations, and promotes the idea of free public library services in Bangladesh.

The Profession. The Department of Library Sciences at Dhaka University, founded in 1959 with the introduction of a Diploma in Library Science, offered the only academic program for professional librarians in Bangladesh. In 1962 the Master of Arts degree program began. The Department offers the following degrees: Post-graduate Diploma in Librarianship, Master of Arts in Library Science, and Master of Philosophy in Library Science. As of 1983, 831 Diplomas had been awarded for the one-year course, and 445 Masters degrees for the two-year course.

Nearly all librarians in Bangladesh are graduates of the Dhaka University program. The curriculum is traditional, but efforts are being made to expand it into several new areas of information science.

The Library Association of Bangladesh, founded in 1956, is the professional organization of librarians in the country. Total membership was 560 in 1985, with approximately 500 holding professional degrees. Meetings are held monthly. The association's journal, *The Eastern Librarian*, discontinued publication in 1978. While continuing education opportunities are limited for librarians in Bangladesh, several librarians have been awarded grants and fellowships from private sources for advanced training and education in other countries.

REFERENCES

- East Pakistan Library Association and the British Council, *The Need for Public Library Development* (Dacca, 1966).
M. A. Syed, *Public Libraries in East Pakistan: Yesterday and Today* (1967).

JODY BALES FOOTE

Barbados

Barbados, an independent parliamentary state and member of the Commonwealth in the southern Caribbean Sea, is the easternmost island of the West Indies. Population (1984 est.) 252,000; area 430 sq.km. The language spoken is English.

History. The history of librarianship begins in the 18th century with subscription libraries. In 1847

an act was passed establishing a Public Library and the Barbados Museum, but the system did not begin to be developed until the 1920s. The entire library service was undergoing changes in the mid-1980s, particularly libraries that are government-funded.

In 1980 a National Council on Libraries, Archives, and Documentation Centres (NACOLAD) was set up by the Minister of Information to develop plans and make recommendations for a National Library Service. Two reports were eventually submitted to the Government—*A National Library and Information Service System in Barbados* (1981), by a consultant, Carl Keren, and the *NACOLAD Final Report* (1982). The Barbados Library, Archives, and Information Centre Network (BLAIN) was established in November 1982 as a result.

Network. BLAIN, an island-wide grouping of all libraries and information centers, operates at two levels with a Central Directorate. The first level involves all public-funded libraries (except academic libraries) and the library of the Department of Archives. The second level consists of quasi-government and privately funded libraries.

The Central Directorate has responsibility for purchasing, technical services, processing, binding, and microfilming for the first-level libraries. Book selection and readers' services remain the responsibility of the libraries at that level. The second-level libraries' contribution is in the areas of interlibrary cooperation and lending.

In addition to providing specific services to public-funded libraries, the Central Directorate has responsibility for network coordination, planning, and development; establishment and maintenance of links with regional and international organizations; staff development and training; publications; construction of databases; and public relations.

The Directorate conducts database literature searches for users and publishes the *National Bibliography of Barbados*.

National Library Services. The Public Library formerly performed the functions of a national library. The National Council on Libraries, Archives, and Documentation Centres, however, decided against designating any library as the national library or establishing a new one. It distributed the functions and services of a national library among existing institutions, taking areas of strength of collections into consideration.

Libraries in Barbados (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (Barbados dollar)	Population served	Professional staff	Total staff
National	--	--	--	--	--	--	--
Academic	3	3	166,800	1,320,000 ^a	1,550 ^a	11	30 ^a
Public (Includes Central Directorate, school mobile service)	2	89	174,728	1,449,941 ^b	67,094	10	76
Special	4	5	112,786	117,000	328 ^c	8	12

^aApplies to two libraries.

^bExpenditures for Central Directorate not given.

^cFigures given for three service points.

REFERENCES

Edward J. Carter, "Theodore Besterman: A Personal Memoir," *Journal of Documentation*, 1977.

W. A. MUNFORD

Bhutan

LUC KWANTEN*

Bibliographic Networks and Utilities

In the library context, *network* may have several meanings: (1) The informal links that help people make contacts, transact business, and find out what they need to know. It may be used as a verb, "to network," and is most frequently seen in its gerund form, "networking." (2) *Bibliographic "utilities,"* probably most accurately called networks, since they are the most complete networking systems, including database, hardware, and telecommunications systems. (Perhaps the term ought to be reserved for them alone.) (3) *Systems for online bibliographic searching,* such database vendor systems as DIALOG, BRS, or SDC. (4) *Telecommunications system(s)* used to link libraries with utilities and database vendor systems. (5) *Organizations of libraries for assistance in the use of computerized library services,* such as utilities and database vendor systems. These usually involve several types of libraries and may be organized on a single- or multi-state basis. (6) *Organizations of libraries in a single area of specialization,* such as law or medicine.

Honorary degrees had been conferred on him by Oxford and other universities. The Library Association, which had made him an Honorary Fellow in 1969, remembers him through its Besterman Medal, awarded annually for an outstanding bibliography or guide to the literature first published in the United Kingdom during the preceding year.

are registered readers of the school libraries.

The Profession. Three institutions provide courses of formal library education: the University of Sofia (which has a chair of library science and information science), the State Institute of Librarians (two years after secondary education), and the National Library (six-month training courses upon completion of university education). The University of Sofia and the National Library also provide postgraduate doctoral dissertation programs.

The National Library, the central research libraries, and the regional libraries regularly organize short courses, seminars, and other undertakings to improve the professional qualification and skills of librarians.

A library association had not been organized in Bulgaria by 1985, though one was planned.

VLADIMIR POPOV

Burkina Faso

Burkina Faso, a republic of West Africa, is bounded on the northwest by Mali, on the northeast by Niger, and on the south by Benin, Togo, Ghana, and the Ivory Coast. Population (1984 est.) 6,733,000; area 274,200 sq.km. The official language is French; the dialect More is widely spoken. The country, called Upper Volta when it became independent in 1960, was renamed Burkina Faso in August 1984.

Burkina Faso does not have a national library. A National Commission for Libraries, Archives and Documentation was established in 1969 but little was accomplished. The Centre National de la Recherche Scientifique et Technologique (CNRST), founded in 1950, receives copies of all publications on and about the country, including those published outside Burkina Faso. Its Library specializes in research in the humanities and natural sciences and holds more than 6,000 volumes. The Centre publishes a quarterly "Notes and Documents" and other publications on an irregular basis, and is responsible for the compilation of a current national bibliography. The first volume was issued in 1967, the *Bibliographie générale de la Haute-Volta*, covering the years 1956 through 1965.

A National Center for Archives was organized in 1973. It conducted a survey of the archives of all administrative districts of the country and drew plans for a central depository at Ouagadougou.

Burkina Faso has one university. The Université de Ouagadougou was founded in 1970 and attained university status in 1974. The university's Library holds approximately 55,000 volumes, 100 periodicals, and 1,400 maps. There are many smaller libraries affiliated with colleges in Ouagadougou. The academic library of the Lycée Philippe Zinda Kabore de Ouagadougou has a small library primarily for the use of teachers and secondary students.

There is no public library system in Burkina Faso. Library facilities are available to the public primarily through the cultural centers in Ouagadougou, most notably those of Germany, the United States, France, Libya, and the Soviet Union.

The Documentation and Information Center of the Interfranc Committee for Hydraulic Studies (CIEH) in Ouagadougou houses 11,000 documents, including books, technical reports, proceedings of conferences, maps, aerial and satellite photographs,

and periodical articles. The Center receives approximately 135 journals and compiles bibliographical bulletins, which are sent to more than a thousand recipients on five continents. The Center published two catalogues in 1977: *An Index of Authors* and a *Geographical Index* representing a total of 6,000 documents. Bulletins deal with documents selected and analyzed after the 1977 publication date.

Other documentation centers include one in Bobo-Dioulasso, which specializes in public health and tropical medicine; the Institut national de la statistique et de la démographie in Ouagadougou, with 2,200 volumes, primarily in the field of economics, 50 periodicals, and statistical bulletins from various countries; and the Institut national d'éducation in Ouagadougou, with approximately 15,000 volumes and 237 periodicals on educational theory and psychology.

In 1972 the Association Voltaïque pour le développement des bibliothèques, des archives et de la documentation (AVDBAD) was founded at Ouagadougou. Its primary purpose is to aid in the development of libraries, archives, and documentation centers in the country. The Association is governed by an executive committee elected by its members and is affiliated with IFLA.

KRISSIAMBA LARBA ALI*

Burma

Burma, a republic of Southeast Asia, is bounded by China on the north, Thailand and Laos on the east, the Bay of Bengal and Bangladesh on the west, and India on the northwest. To the southwest and south lie the Gulf of Martaban and the Andaman Sea. Population (1984 est.) 36,368,000; area 676,577 sq.km. The official language is Burmese.

History. The history of Burma's libraries begins with King Anawrahta's violent seizure of Buddhist texts from Thaton in the late 11th century. This act established Pagan as a center for Buddhism over many centuries, and monastery libraries grew up around it. The collection of scriptures, in palm-leaf manuscript form, was housed in the Pitaka Taik. In 1795 a British envoy estimated that the Royal Library in Amarapura was the largest royal library between the Danube and China. And in Mandalay a library of 729 alabaster tablets, each 5 feet by 3 feet, was erected in 1857. It has been called "the most permanent library in the world."

National Libraries. There are two national libraries in Burma, one in the capital city, Rangoon, the other in Mandalay. Their combined strength approximated 100,000 volumes, with about a third of the materials in English. The library in Rangoon provides author and title indexes to leading Burmese periodicals from their dates of publication. The strength of holdings lies predominantly in primary source materials on Colonial Burma; however, both libraries receive books and periodicals under the Press Registration Act of 1962 and are thus depository libraries. In addition to periodicals and newspapers, the libraries also contain several thousand books in manuscript form. Although open access is not allowed, spacious reading room are available. The rate of acquisition exceeds several thousand titles a year and is primarily

reflective of the quantity of publications in Burma. Burma also has its National Archives, whose holdings include the entire run of the *Burma Gazette*.

Academic Libraries. Major academic libraries are those of Rangoon University, Mandalay University, and Moulmein College. At Rangoon the Central Universities Library is responsible for acquisition of foreign materials except for medical literature, acquired by the Department of Medicine Research Library. The Central Universities Library has a collection of about 250,000 volumes. The three Institute of Medicine libraries (in Rangoon and Mandalay) house about 45,000 volumes among them. The libraries conduct literature searches, maintain union catalogues of holdings on campuses, and prepare and publish bibliographies. A notable activity is the library orientation program at Rangoon Institute of Technology (about 35,000 volumes), where library training has also been incorporated into the curriculum. A major research library is the Library of the Central Research Institute, which completed a Union List of Scientific Serials covering some 20 libraries. The Library has an exchange program with the British Library Lending Division. Burma's academic libraries are decentralized; there are several departmental and institute libraries such as the Library of the Institute of Veterinary Science. The Arts and Science University Library in Mandalay (103,000 volumes) should also be mentioned, as well as the Institute of Economics Library and the Institute of Education Library. Both are in Rangoon and both have collections of about 35,000 volumes. The college libraries in Bassain, Magwe, and Moulmein are somewhat smaller.

Public Libraries. Three or four major state libraries provide the bulk of library service to the general populace. Perhaps the most outstanding public library is the Sarpay Beikman, or "House of Literature" Institute Library (Rangoon), which has its own publishing house and which administers reading rooms in many Burmese villages. It has about 74,000 volumes, 17,670 of them in English. The bulk of Burma's domestic interlibrary loan activities are carried out by this library.

Special Libraries. Special libraries are found in the industries and institutes of various ministries. A special library of significance is the Research Library of Buddhist Studies, whose holdings are world renowned.

Burma's libraries receive high-level government understanding and available support but are faced with the common problem of a shortage of funds.

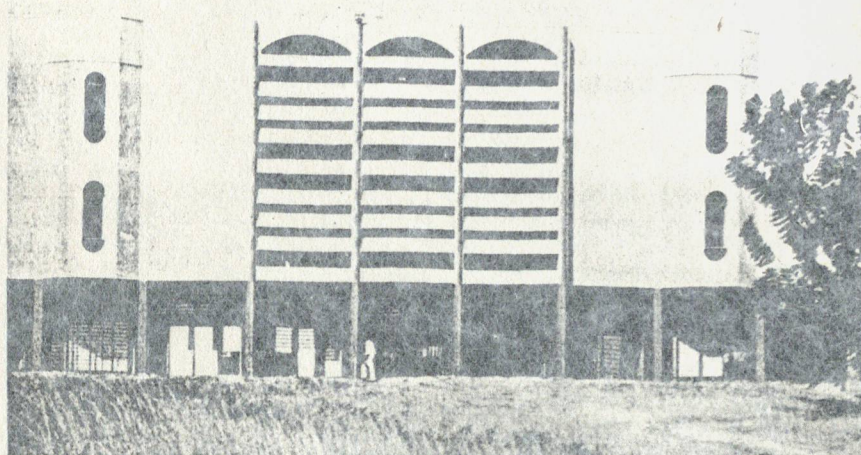
REFERENCES

- G. Miller, "Notes on Libraries in Burma," *International Library Review* (July 1978), an excellent overview.
G. Raymond Nunn, "Libraries in Burma," *International Library Review* (October 1975), emphasizes activities of libraries in Burma.

THEIN SWE*

Burundi

Burundi, a republic in central eastern Africa, is bordered by Rwanda on the north, Tanzania on the east and south, Lake Tanganyika on the southwest, and Zaire on the west. Population (1984 est.) 4,525,000; area 27,834 sq. km. The official languages are Kirundi and French.



Université du Burundi, Bibliothèque

Academic Libraries. Burundi's library resources are primarily concentrated in the Université Officielle and a few smaller, mainly government-supported schools. All institutions of higher learning along with their library holdings are in the capital city of Bujumbura.

The Official University's library system consists of a Central Library and five independent departmental libraries. Aggregate holdings of all facilities amount to about 110,000 titles and 1,270 current periodicals. The Central Library's collection of more than 60,000 volumes covers all major subjects.

The staff, trained in France and Senegal, generally maintains an acquisition rate of 3,000 titles a year through expenditure of funds provided, gifts, and exchanges with foreign universities. Departmental libraries are provided for administrative and economic sciences, letters and humanities, medicine, psychology and education, and physical sciences.

In addition to those at the Official University, libraries are maintained at the Theological College of Bujumbura, the Military High Institute, and the École Normale Supérieure du Burundi; only the last, a college for teachers, possesses a collection in the range of 11,000 volumes, which serves to emphasize the central importance of Burundi's single university among academic libraries.

Public Libraries. The Ministry of Education maintains a single public library facility, in Bujumbura, with a collection of approximately 26,000 volumes. As with academic libraries, no services or supplies exist outside the capital.

Special Libraries. A number of government-supported institutes and government departments maintain important technical and historical collections. The Institut des Sciences Agronomiques du Burundi (Burundi Institute of Agronomy) maintains a 1,500-volume collection on scientific agriculture in the capital and four field stations in other parts of the country. The Institute Library supports services vital to Burundi's future growth and prosperity. The Laboratoire de Recherches Vétérinaires in Bujumbura provides access to 200 volumes on animal husbandry and health care, topics closely related to the future success of agriculture. The Ministry of Economy and Finance's Department of Geology and Mines pos-

Library at the University of Burundi/in Bujumbura. It was built in 1981 and formally dedicated in 1985.



1947 to 1980.

Ten continuing education courses on automation, information systems, organization of archives, statistics, and *American Cataloguing Rules*, Second Edition, were offered to practicing librarians from 1977 to 1981. Similar courses are offered by the Colegio de Bibliotecarios and the National Center for Information and Documentation.

Library students developed various projects, among them a University Union Catalogue, a survey of national and international databases, and a national bibliography entitled *Bibliografía de Chile* (Chilean Bibliography), published in 1982.

The University of Chile also offered courses in some of its southern and northern headquarters during the period 1965–80. The University of Concepción offered a Library Science program from 1975 to 1979.

Chilean librarians are represented by the Colegio de Bibliotecarios, an organization that superseded the Asociación de Bibliotecarios, established in 1953. The Colegio de Bibliotecarios, created by a 1969 law, had 1,331 members in 1984 and has prepared several publications, including a "Code of Professional Ethics," "Standards for Chilean Public and School Libraries," and "Chilean Standards for Documentation."

REFERENCES

Alejandro Burgos and Héctor Gómez, *Bases de Datos Bibliográficos en Chile* (1982).

Juan R. Freudenthal and Héctor Gómez, *Library Education in Chile* (Libri, 1983).

M. TERESA HERRERO DE ALVAREZ

China, People's Republic of

The People's Republic of China covers a total area of about 9,600,000 square kilometers in eastern Asia on the western shores of the Pacific Ocean with a continental land boundary of more than 20,000 kilometers. China adjoins Korea in the east, the U.S.S.R. in the north, Afghanistan, Pakistan, India, Nepal, Sikkim, and Bhutan in the southwest, and Burma, Laos, and Vietnam in the south. The continental coastline is more than 18,000 kilometers long. More than 4,000 islands are scattered along China's coastline. Taiwan is the largest one and Hainan Island the next. For administration, China is divided into 22 provinces, 5 autonomous regions, and 3 municipalities. According to the census of 1982, the total population of China was 1,031,882,511 on July 1, 1982; (1984 est.) 1,075,195,000. China is a unified multi-national country with 56 ethnic groups, among which the Han nationality is the largest. The official language is Chinese.

History. Ancient inscriptions, cast, engraved, or impressed on permanent materials are hardly to be considered "books." But we may say Chinese books originated from ancient literal records and archives.

The oracle-bone inscriptions are the earliest known Chinese documents preserved in their original form today. They were inscribed on tortoise shell and ox bone about 3,500 years ago. Early inscriptions cast or engraved on bronze have also been found; some have been preserved for about 3,200 years. As for the inscriptions on stone, some ancient stone drums with

inscriptions engraved on them were made about 2,200 years ago.

The direct ancestors of Chinese books are believed to have been the tablets made of bamboo or wood that were connected by strings and used like paper books. They appeared from the 14th century B.C. to the 3rd or 4th century A.D. and prospered from the 8th century B.C. to the 2nd century A.D. Another kind of book written on silk rolls appeared in the 5th or 4th century B.C. down to the middle of the 3rd century A.D. In A.D. 105 paper made from the bark of trees, old rags, and fishing nets was invented by T'sai Lun, a man of talent in charge of government manufacture of the East Han Dynasty. During the 2nd and 3rd centuries A.D., paper was more and more used as a writing material. During that period, bamboo, silk, and paper were simultaneously used as writing materials. Writing tools, such as various forms of Chinese brush-pens and black ink, had been used, of course, along with the various writing materials.

The technique for multiplication of written works before the invention of block printing was the process of taking inked impressions from stone or other inscriptions by pressing paper on their surfaces. Moreover, seals, cast from metal or cut in stone or jade, were impressed on soft and sticky clay—and later, on silk and paper—to make duplicate inscriptions. Such techniques have been considered forerunners of mass production of early writings and eventually led to the invention of block printing.

Printing from engraved wood block appeared in the first years of the T'ang Dynasty or even earlier (about the 8th century A.D.). At the beginning of the 9th century, calendars were printed in that way. And an extant book, the *Diamond Sutra*, which was printed in 868, with the printing date in it, shows very nice printing technique. Therefore, it can be presumed that the invention of block printing must have been much earlier than the time the book was printed.

In the middle of the 11th century, during the Northern Sung Period, Bi Sheng invented movable type for printing. It was not necessary to print many copies of books at that time, so the former method of printing from engraved wood block was still often used. With the further development and application of movable-type printing, the number of books printed by the method grew in successive generations.

In 213 B.C. the first emperor of China of the Chin Dynasty ordered the burning of a great many books except those in certain categories and in the possession of learned officials. Large-scale recovery of ancient works was not begun until the reign of Emperor Wu (ruled 180–140 B.C.) during the Han Dynasty. And for the first time in Chinese history a centralized imperial library was established where a wide range of materials was systematically collected and well kept.

In 26 B.C., under the reign of Emperor Cheng of the Han Dynasty, a special decree was issued to collect books again and also designate Liu Hsiang (81–80 B.C.), a state counselor, to examine the collection with his assistants. Liu recorded the headings of the chapters and wrote a summary for each book to be presented to the emperor. The result of these sum-

maries was a collection of critical bibliographies known as *Pieh-lu*, or "Separate Record." After he died with the task unfinished, his son, Liu Hsin (d. A.D. 23) succeeded him in the work. He arranged all the books then in the imperial library into seven categories and compiled a classification catalogue known as *Chi-lüeh*, or seven summaries. Liu Hsin's work is the earliest known bibliography in China and Liu Hsin's scheme is the first system of subject classification and descriptive cataloguing of Chinese books.

A modified fourfold scheme made in the 3rd century A.D. and revised again and again afterward has been used by Chinese bibliographers for more than 1,500 years. Even now many libraries in China still use such a revised scheme to classify the ancient Chinese books in their collections.

In A.D. 1407, under the decree of the Emperor Cheng Zu of the Ming Dynasty, the compilation of the famous *Yong Le Encyclopedia* was finished and the imperial library called the Wen Yuan Pavilion was founded. *Yong Le Encyclopedia* was the largest encyclopedia in China, including a total of 11,919 volumes. They were arranged according to phonetic rhymes, reproduced from more than 7,000 extant books. At that time only one set of a handwritten master copy was prepared; afterward another set was copied. The original set was unfortunately destroyed and of the second set only a little more than 200 volumes were preserved, most of which are kept in the National Library of China.

Wen Yuan Pavilion was the imperial library of the Ming Dynasty (1369-1644). The remainders of the ancient books from the preceding Sung (960-1279) and Yuan Dynasties (1279-1368) provided its basic collection. There also were the books of the Ming Dynasty that were especially rich in local chronicles.

In the last years of the Emperor K'ang-hsi (ruled 1661-1722) in the Ch'ing (Qing) Dynasty, compilation of another encyclopedia, "A Collection of Books of Ancient and Modern Times," was begun. It was completed in 1725 and was later printed with movable type. This giant work consisted of 10,000 volumes with about 100,000,000 words together with many fine pictures. At the end of Ch'ing Dynasty it was copied twice.

During the rule of the Emperor Tsien Long (1736-1795) in the Ch'ing Dynasty, "The Complete Library of the Four Treasures" had its beginning in 1772 and was completed a decade later. It consisted of 3,502 titles bound into 36,000 volumes. It was the largest collection of books in the history of China. It was copied by hand in four copies at first and three more copies afterward. Now there are only four copies left.

The collection of the Wen Yuan Pavilion of the Ming Dynasty was inherited by the Cabinet Library of the Ch'ing Dynasty, but a lot of the collection was lost. In 1910 the remaining part was transferred to the Metropolitan Library of Peking and thus it became the first collection of rare books for the National Library of China.

National Library. The National Library's predecessor was the Metropolitan Library of Peking, opened in 1912. Apart from inheriting the books from the imperial libraries, the National Library, when opened, got a number of important and famous

publications collected and donated by the government. All these laid the foundation for the collection of books. Up to 1949, it had already had more than 1,400,000 volumes (items) and 120 staff members. After the establishment of the People's Republic of China in 1949, its collections were mainly augmented through channels such as sample copies from domestic publishers, selective purchase of both old and new domestic publications, donations and allocations from institutions and individuals, selection and ordering of foreign publications, international exchange of publications, and so on. At the end of 1984, the National Library of China had 12,396,807 books, magazine issues, and other items, and more than 1,100 staff members. It is a comprehensive research library under the leadership of the Ministry of Culture of China. It seeks to perform the functions required of other national libraries throughout the world. A new building of the library covering a floor space of 140,000 square meters and capable of providing for modern equipment was under construction in the mid-1980s. The computer had begun to be used in some professional work by the mid-1980s and further applications of computer technology to library service were anticipated for the near future.

Academic Libraries. Under the leadership of the National Commission of Education of the State Council and relevant administrative offices of the provincial governments or those of the same level, the Commissions of University and College Libraries lead the nationwide or regional university and college libraries respectively. There are about 900 such libraries in all parts of the country. Some of them belong to the national key universities, such as the Library of Beijing (Peking) University and the Library of Qinghua (Tsinghua) University. The former was established as early as 1902. In the early years of the 20th century, the Chinese revolutionary pioneers and Marxists Lee Da-zhao and Mao Tse-tung worked in it. In 1985 the Library had a total collection of more than 3,500,000 volumes (items). A new building was founded in 1975, with the floor space of 24,500 square meters. In 1985 the Library of Qinghua University held more than 2,100,000 volumes (items) in its collection, concentrating on natural science and technology. These two libraries and some other university or college libraries used computers in their work in the mid-1980s.

Public Libraries. Under the leadership of the Ministry of Culture, the libraries of the cities, including those of their streets and lanes, and the libraries of counties or districts, including those of their inferior districts and villages, are all public libraries. They serve many readers, offering help in various subjects and striving to raise their working abilities in production and management. Although the libraries of provinces, autonomous regions, and municipalities and other large cities or some medium-sized cities with comparatively large populations also serve the public, their main service is seen as meeting the needs of economic construction and scientific research. They are research libraries or in some degree close to research libraries.

The Shanghai Library (about 6,500,000 items) is a notable city library; the largest public library in China, it is renowned for its collection of 1,500,000 classical Chinese books. Others include Nanking Li-

brary (about 4,700,000 items) for Jiangsu (Kiangsu) Province and Wuhan for Hubei (Hopei) Province.

School Libraries. Apart from the many libraries or reading rooms of primary and middle schools, separate children's libraries were established in some places. Under the leadership of the Ministry of Culture alone, there were 45 city or regional children's libraries in the mid-1980s and most of the county, district, and city libraries have children's reading rooms, large or small. Children's Palaces or Children's Activities Centers in some cities also have their own libraries or reading rooms. All of the children's libraries or reading rooms outside the schools are used by students and their teachers and sometimes they are open for children before school age.

Special Libraries. Libraries in the system of the Chinese Academy of Sciences, including the Academy Library, the regional Libraries of the Academy, and the institutional libraries, total 142. The Library of the Chinese Academy of Sciences is a major comprehensive scientific and technological library. It collects books, periodicals, scientific reports, patents, proceedings, professional publications, and other materials. In 1985 it had a collection of 5,000,000 volumes (items) and a staff of more than 400. In that library the Scientific Information Office was established in order to combine library service with information service. This library and others in the system of the Chinese Academy of Sciences have used computer technology to process and retrieve data from foreign source documents in the sciences.

Other academic or special libraries are under the leadership of the Chinese Academy of Social Sciences and the ministries and commissions of the State Council, such as the Library of the Chinese Academy of Agricultural Sciences, the Library of Medical Sciences, the Library of Geology, and the Library of Nationalities.

The Profession. Some 50 universities or colleges have departments or specialties of library science. One of the two oldest departments of library science was established in Wuhan University (now merged into the College of Library and Information Science of that university). The other is in Beijing University. In some universities and a few research libraries, graduate students continue to study for the master's degree and some students are sent abroad to study as graduate or undergraduate students or visiting scholars. Many libraries established schools or classes for vocational training: for example, the Spare-time Professional College for Staff Members in the National Library of China has enrolled classes of students through entrance examination. The National Library, other libraries, and the Administrative Bureau of Library Affairs of the Ministry of Culture also run many short training classes for staff members on various subjects. In addition, there are some library vocational middle schools or library vocational classes in the middle schools.

The China Society of Library Science was established in July 1979. The members of its second council were elected for a term of four years by the representatives at the second plenary session in November 1983. Its journal is the "Bulletin of China Society of Library Science" (quarterly). The Society often holds meetings for discussion on library science or exchange of experience and provides seminars or

training classes on special topics. The Society had registered more than 4,000 members on the national level by the mid-1980s. Under the Society, 30 more Societies of Library Science are scattered in provinces, autonomous regions, and municipalities. They are enthusiastic in pursuing professional activities and most of them publish society journals of their own. Sometimes the societies of several neighboring areas unite to carry on their professional activities.

DING ZHIGANG

China, Republic of (Taiwan)

Taiwan, an island in eastern Asia off the southeast coast of the People's Republic of China, became the seat of the Republic of China in 1949. Population (1984 est.) 18,735,000; area 35,981 sq.km.

Library History. The history of Chinese document collection can be traced back to prehistorical time. Archaeological excavation found that people in Shang dynasty (c. 1800-1400 B.C.) stored oracle bones equivalent to modern archives and books in separate pits that were forerunners of libraries. Throughout Chinese history, there were not only official imperial collections but also private collections. However, the major modern libraries did not come into existence in China until the Provincial Hu Nan Public Library was founded in 1905. Since then, library work has attracted more and more attention and kept on growing in spite of disturbances of the times. In 1947 there were 2,702 libraries in the mainland of the Republic of China. After the move of the republic's government to Taiwan (1949), where there were only about 100 libraries at that time, the library profession was developed vigorously. By 1982 there were about 3,080 libraries in Taiwan, according to the *Library Survey of the Republic of China* (1982) and the *Publications Yearbook* (1984). These include a national Library, a branch national library, 245 public libraries, 139 university and college libraries, 2,456 school libraries, and 239 special libraries and information centers.

National Library. The National Central Library (NCL), under the jurisdiction of the Ministry of Education, renders national library services, serves as a research library, and leads and coordinates all library-related activities in the Republic of China. The NCL was established in 1933 at Nanking. At the time of its relocation to Taiwan in 1948, its collection numbered 140,000 volumes. As of February 1985, the total collection of the NCL and its branch had grown to 1,274,107 volumes. The NCL main library planned to move to a new building and offer extended services (1986). The new building has an area of 431,500 sq.ft. and accommodates 2,500,000 volumes and 4,000 readers.

In October 1973 the Provincial Taipei Library was converted into a branch of the NCL. The Branch Library has 486,652 volumes in its holdings, including an outstanding collection on Taiwan and south-eastern Asia, such as gazetteers and other works published during the time Taiwan was governed by the Dutch and Spaniards.

Public Libraries. Public libraries can be found throughout Taiwan. There are 2 municipal libraries, 1 provincial library, and 20 libraries in Taiwan's county and cultural centers. The county libraries are

China, Republic of

dispersed throughout the island. In addition, there are 185 town and branch libraries.

University Libraries. At the beginning of Taiwan's restoration under the Republic of China, one university and three colleges existed, with a total of 2,022 students. As a result of the government's promotion of higher education, there were 105 public and private universities and colleges in the mid-1980s; most of the university libraries and the better-equipped colleges have independent libraries directly under the supervision of the presidents.

School Libraries. Approximately 99 percent of school-age children are enrolled in schools. There are 2,456 school libraries, including 370 senior high school libraries, 358 junior high school libraries, and 1,728 elementary school libraries.

Special Libraries. This is an important segment of the republic's library services. There are a number of organizations or groups that collect materials for their business or research. Currently there are well over 200 special libraries in Taiwan. They include the Academia Sinica, with 14 departmental libraries and some of the best collections in their subject fields; the National Palace Museum, with one of the largest collections of archives and a collection of rare books second only to the NCL; and the Agricultural Science Information Center, devoted to editing an agricultural thesaurus and processing agricultural information.

The Profession. The rapid development of libraries in Taiwan has elicited a demand for qualified librarians. They have been trained by six universities and colleges in Taiwan, as well as two graduate library studies programs. There are approximately 350 library science graduates every year. In addition, the NCL and the Library Association of China (LAC) annually sponsor a summer workshop for librarians.

There has been no shortage of professional librarians at all levels in Taiwan; moreover, the quality of library service has been continually upgraded, and many professional librarians have been sent abroad for advanced studies under various exchange programs and with government grants.

The LAC was incorporated in 1953. Membership is open to everyone who has studied library science or who is interested in library work. Major accomplishments of the LAC include the summer workshops, formulation of library standards, and the annual publication of the *Bulletin of the Library Association of China* since 1954, as well as the quarterly *Library Association of China Newsletter* since 1975.



National Chengchi University Library

Chung-Cheng Library, founded in 1977, the main library of National Chengchi University in Taipei.

The Library Automation Planning Committee, created by the LAC and the NCL in 1980, formulated the National Library Automation Project. This project in turn organized the Chinese MARC Working Group, the Chinese Cataloguing Working Group, and the Chinese Subject Heading Working Group. The Chinese MARC format was completed in 1982 and made available to libraries both locally and abroad as a basis for processing Chinese-language data, and also as a reference for processing data in other languages. *Chinese Cataloguing Rules* and *Chinese Subject Headings* are in print.

The NCL has provided strong leadership, too, in the development of library automation. Together with seven large academic libraries in Taiwan, the NCL has established a Chinese bibliographical database. In early 1985 it consisted of 31,000 entries on Chinese publications. The *Union List of Chinese Serials in the Republic of China* was to be revised to make it compatible with the new Chinese bibliographic database.

In addition, several university libraries and information centers have undertaken their own automation projects. National Taiwan Normal University developed the Chinese Educational Resource Information System, the Agricultural Science Information Center developed the Agricultural Science and Technology Information Management System, and the

Libraries in the Republic of China (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (NT dollar)	Population served	Professional staff	Total staff
National ^a	1	1	1,274,107	257,071,000	18,912,690	150	249
Academic	135	--	10,221,208	245,000,050	375,889	623	1,419
Public	176	41	4,491,538	346,734,860	18,135,508	228	910
School ^b	2,456	0	13,438,240	--	3,904,762	1,325	2,610
Special	219	11	4,035,908	179,388,359	--	268	917

^aFebruary 1985 data.

^b1979 data.

Science and Technology Information Center developed the Domestic Science and Technology System (which includes a union list of scientific and technical serials in the republic and Sci-Tech Research Reports). Other universities have created Western-language control projects, serial control and acquisition packages, and circulation systems. For foreign information searching, some libraries have opened online information retrieval services via the satellite communications network to complement conventional reference services.

The Taiwan government launched a Cultural Development Project to build a cultural center for each county or city and to include in each a library, museum, and music hall. Twenty such cultural centers had been established by 1985; 17 were open to the public.

Utilizing the Chinese MARC format and the Chinese Cataloging Rules, the Library Automation Committee developed the NCL Automated Information Service system. A library and information network was under study, and eventually that network was to include the public and academic library systems and the information center system.

CHEN-KU WANG

Chubarian, O. S.

(1908–1976)

Ogan Stepanovich Chubarian was a specialist in library science who greatly stimulated the development of library science and practice in the U.S.S.R. through his many-sided scientific, pedagogical, and administrative activities.

He was born in Rostov-on-Don on October 8, 1908, and received professional training at Advanced Bibliographic Courses, which functioned at the State Book Chamber of the R.S.F.S.R. Chubarian prepared a candidate dissertation on "The Technical Book in Russia during the Reign of Peter the Great." He was granted a Doctor's degree for his monograph "General Library Science."

Chubarian began his career as a rank-and-file librarian and in 1963 became one of the senior officers of the National Library of the Soviet Union. He published over a hundred works dealing with various problems of librarianship, bibliography, and bibliology. "General Library Science," one of his most important works, gives contemporary interpretations of the role of librarianship in Soviet society. This work formulates and reveals in detail the main principles of library development in the U.S.S.R.: the state character of librarianship, the availability of libraries for all, planned organization of the library network, centralization, and the drawing of representatives of the population into the work of libraries and their management. Chubarian was the first Soviet library specialist to cover the essence and place of library science in the general system of sciences from a Marxist standpoint.

Many works by Chubarian were devoted to the study of current problems of library development and the activities of libraries, such as problems of central-

ization of librarianship, cooperation of libraries and information centers, surveys of readership, development of national libraries of the Union republics, and acquisitions. Chubarian laid stress on the common goals and tasks of libraries that should not be ignored by any library institution regardless of its specific character.

Chubarian gave much of his time and effort to bibliography; he advocated the recommendatory bibliography as an efficient instrument in the guidance of reading. His idea that library and bibliographic activities should be carried out in close cooperation represents one of the leading concepts in defining the role of Soviet libraries. In his studies theoretical propositions and pragmatic conclusions interlace, and the examination of problems is closely connected with the practice and tasks of libraries.

For many years he guided the activities of important Soviet library institutions such as the Moscow State Institute of Culture, the State Public Technical and Scientific Library, and the State Lenin Library. He was also Vice-Chairman of the Council for Coordination of Research in Library Science and Bibliography attached to the U.S.S.R. Ministry of Culture.

He was one of the founders of two periodicals—*Sovetskoye bibliotekovedeniye* ("Soviet Library Science") and *Nauchniye i tekhnicheskiye biblioteki SSSR* ("Scientific and Technical Libraries of the U.S.S.R."), which greatly stimulated research in the field.

He had many students, whom he helped to write dissertations and become library specialists. He also directed many important surveys, and through his efforts the following studies were published: *The Soviet Reader* (1968), *The Book and Reading in the Life of Towns* (1973), and *The Book and Reading in the Life of the Soviet Village* (1978).

He edited many collections of articles such as *Lenin and Contemporary Problems of Library Science*; *History of Librarianship in the U.S.S.R.: Documents and Materials*; *Problems of Sociology and Psychology of Reading*; and a *Dictionary of Library Terms*.

O. S. Chubarian did much in the way of acquainting foreign librarians with the state of library science and practice in the Soviet Union. He persistently endeavored to develop the exchange of information on problems of library development; he took part in the organization of many international conferences, discussions, and joint research projects and the development of international book exchange. He participated in many IFLA sessions and worked on a number of reports. In 1966 he was elected Chairman of the IFLA Bibliographic Committee, and later he headed the Committee on Library Science.

His works have been translated into many foreign languages. The U.S.S.R. Ministry of Culture and party and state authorities of the country frequently invited him to act as adviser when important documents concerning librarianship were drawn up.

Chubarian was granted the title of Professor and the honorary title "Merited Worker of Culture of the R.S.F.S.R." He was also granted state awards and a Library in Artashat in the Armenian S.S.R. was named after him. He died in Moscow on January 7, 1976.

E. A. FENELONOV

50 percent and the condition of public libraries is poor.

School Libraries. In the area of primary school libraries, Honduras showed its greatest initiative. In 1967 the government began the School Library Pilot Project in cooperation with Unesco. Under the direction of a librarian, the program was designed, among other things, to teach students the use of various kinds of library materials and to provide communities with public library facilities where none existed. The project was planned to have two stages. The first, from 1968 to 1972, was under the direction of Unesco, which provided extensive technical assistance. Schools were divided into four categories, depending on enrollment. Twenty-three libraries were opened before 1970. The second stage, beginning in 1973, was directed by the Ministry of Education. Unesco ended its participation in the project at the close of the first stage. After that, progress was slow.

Special Libraries. The government also maintains several special libraries, each with a collection of a few thousand volumes, emphasizing archaeology, art, law, administration, and the humanities.

The Profession. The Association of Librarians and Archivists has its headquarters in Tegucigalpa. It sponsors courses for its 53 members and seeks ways to improve organization and service in Honduran libraries. It also publishes the monthly *Catalogo de Prestamo* and keeps a small library of its own. It is affiliated with ACURIL.

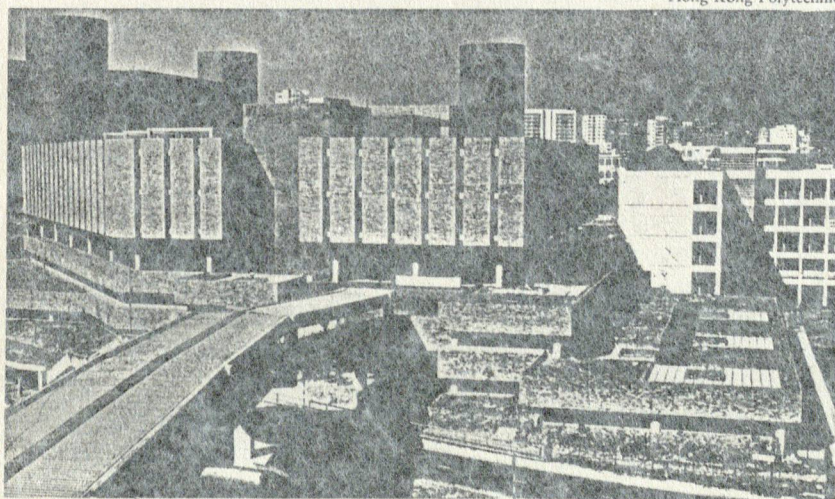
Cooperation with librarians from other countries has centered mainly in the Primary School Pilot Project. Librarians from the National University have participated in the Consejo Superior Universitario Centroamericano, a group made up of other national universities in Central America and designed to promote cooperation among them.

Overall, libraries in Honduras, where the system for publishing and distributing books is antiquated, and the political climate often stifled unapproved ideas, have been few, small, and poorly financed. They also lack professional staff. There has been little coordination among libraries, and librarians have not been well organized.

DANIEL W. BARTHELL*

Hong Kong Polytechnic

Multilevel Hong Kong Polytechnic Library, one of Hong Kong's three major academic libraries.



Hong Kong

Hong Kong, a British Dependent Territory off the southern coast of China, comprises Hong Kong Island and islets nearby; Kowloon Peninsula; and the mainland areas of the New Territories. Population (1984 est.) 5,394,000; area 1,060 sq.km. The official languages are English and Chinese.

More than 560 libraries serve Hong Kong. A comprehensive survey of library and information services in Hong Kong carried out in 1983 enumerated 97 libraries open to the general public and children, 56 government department and British Armed Forces libraries, 307 school libraries, 30 postsecondary and university libraries, 66 special libraries, and 5 club, society, and private libraries.

History. The beginnings of the library history of Hong Kong can be traced to a collection of books started at the English Factory in Canton in 1806. It later became part of the Morrison Education Society Library, which moved to Macao and then to Hong Kong in 1842.

National Services. Hong Kong has no national library or national bibliographical center. The Cultural Services Department of the Urban Services Department of the Hong Kong Government serves part of the functions of a national library in that it administers the Hong Kong Book Registration Ordinance. Under this Ordinance, publishers and printers submit five copies of every title published and printed locally to the Cultural Services Department of the Urban Services Department. Based on those deposits, *A Catalogue of Books Printed in Hong Kong* is issued quarterly.

The Public Records Office has the largest collection of official documents. From 1972 that office collected old documents and records from a number of the Government departments, some dating back to 1844.

Academic Libraries. The libraries of the University of Hong Kong, the Chinese University of Hong Kong, and the Hong Kong Polytechnic are the major academic libraries. Other academic libraries include those of the Baptist College, Lingnan College, and Shue Yan College. The new Hong Kong City Polytechnic had just begun to plan for a library in 1984. The collections at the universities each exceeded about 750,000 volumes. The University of Hong Kong Libraries system is the oldest (established in 1912) and the most comprehensive library system in Hong Kong. Online cataloguing is done at the University of Hong Kong Libraries. The three large academic libraries share the MARC database maintained at the University of Hong Kong. They also provide information retrieval services using DIALOG and SDC.

Public Libraries. The two public library systems of the Urban Council and Urban Services Department serve the general public of the urban and rural areas. The City Hall Library, opened in March 1962, is the headquarters of the Urban Council Libraries. As of March 1983, the whole network of Urban Council Libraries comprised 18 libraries (including two mobile libraries) with a total of 1,200,000 volumes. The system administered by the Cultural Services Department of the Urban Services Department comprised 12 libraries (including one mobile library) with a total of 430,000 volumes. There are

plans to continue opening more branch libraries in both systems.

School Libraries. School library service improved a great deal during the decade 1976-85. More than 250 schools now employ teacher-librarians trained by the Education Department of the Hong Kong Government. Class libraries are provided for many primary schools by this Department.

Special Libraries. Many Government department libraries are specialized and serve primarily the staffs of their own departments. The Hong Kong Productivity Centre, Hong Kong Trade Development Council, Federation of Hong Kong Industries, Hong Kong Management Associations, and Hong Kong Tourist Association, among others, maintain libraries and information services to serve the commercial and industry sectors. In addition, there are several medical libraries in hospitals and other special libraries in some business firms, factories, and learned societies.

The Profession. Approximately 150 professional librarians worked in the Hong Kong libraries in the mid-1980s. From 1981 the Department of Extramural Studies of the University of Hong Kong and the Hong Kong Library Association jointly offered a three-year part-time Diploma Course in Librarianship aimed at the graduate professional level. Established in 1958, the Hong Kong Library Association had a membership of 336 in 1983, including five categories: personal, student, corresponding, institutional, and honorary. The Association publishes a *Journal* and a *Newsletter*.

REFERENCE

Hong Kong Library Association, *Directory of Special Libraries in Hong Kong* (1983).

KAN LAI-BING

Honoré, Suzanne

(1909-)

During more than four decades of service at the Bibliothèque Nationale, Suzanne Duvergé Honoré became known both in France and abroad as a specialist in cataloguing and government publications. In addition to her administrative responsibilities at the national library, she continued her early interest in historical research, contributed to the standardization of French cataloguing practices, and promoted the international exchange of bibliographic data through her work in the International Federation of Library Associations (IFLA). She also played a key role in the Association des Bibliothécaires Français (ABF, the French library association) and served for 15 years as Secretary-General of the Syndicat des Bibliothécaires, the librarians' union.

Born on July 13, 1909, in Oloron-Sainte-Marie in southwestern France, Suzanne Duvergé grew up in a household where her interest in reading and travel were encouraged. Her father was a professor of mathematics. She took a degree in history from the University of Bordeaux and entered the École des Chartes in Paris, where she received training as an archivist-palaeographer. She graduated in 1932 as valedictorian of her class—a distinction that entitled her to a place at the École française de Rome, a French institute for advanced research in medieval history.

She remained in Rome from 1932 to 1934, when she was appointed to the École des hautes études hispaniques in Madrid. There she continued scholarly work in medieval Spanish history. After two years in Madrid, she married Pierre Honoré, a French sculptor. They had three sons: Michel, Georges, and Olivier.

In 1936 she began her career at the Bibliothèque Nationale as a library assistant (auxiliaire). She was named Librarian (Bibliothécaire) six years later and subsequently served in the department of printed books and the department of official publications. In 1962 she prepared a comparative study of official publications from the perspective of their use in public relations. Her report on that topic was presented at the Congrès international des sciences administratives in 1962 and was published the following year. In 1963 Honoré became head of the department of international exchanges, which was reorganized and installed in new quarters under her direction. She left that post in 1967 to take charge of the Département des Entrées, the unit responsible for copyright deposit, the acquisition of books, and cataloguing.

In 1964 she was elected President of the ABF, the second woman to hold that office. She provided leadership at a time when the Association's statutes were being revised, and she was subsequently elected to the presidency for a second term, which expired in 1969.

In 1961 she participated in the International Conference on Cataloguing Principles held in Paris. She also took part in a second international cataloguing conference held in Copenhagen in 1969 under the sponsorship of IFLA and Unesco. Later she served as President of the Cataloguing Committee of the Association Française de Normalisation (AFNOR, the French national standards association) and participated in many meetings of the committee on documentation of the International Standards Organization (ISO). She was also active in other international bodies, serving as a member of the consultative committee of the International Office for Universal Bibliographic Control and also as Vice-President of the Association for International Libraries.

Honoré published about 35 articles and reports, ranging from scholarly studies in medieval history to the *International List of Approved Forms for Catalogue Entries of Names of States* (Unesco, 1964). She also taught cataloguing at the École des Chartes and gave courses on bibliography and on international library cooperation at the École Nationale Supérieure des Bibliothèques (the national library school).

Honoré retired from the Bibliothèque Nationale in 1978. In recognition of her many contributions, she was named to the Legion of Honor and later elevated to the rank of officer.

MARY NILES MAACK



Suzanne Honoré

Hookway, Sir Harry

(1921-)

In 1972 Parliament passed the British Library Act, which led to the establishment of the British Library in the following year. Prior to that time the national library of the United Kingdom was the British Museum Library, which was to form the centerpiece of

activities are the publication in Icelandic of "The Icelandic National Bibliography" since 1974, union lists of foreign language materials, and a catalogue card distribution service in collaboration with the Iceland Library Bureau, established in 1978.

Academic Libraries. Háskólabókasafn, the University of Iceland Library, is the principal academic library in the nation, although there are libraries in some other specialized institutions. In Reykjavík, it held more than 230,000 volumes in 1983. Its collections include materials to support the full range of general curricula and numerous research programs in Icelandic studies and vulcanology. On campus, the Stofnun Árna Magnússonar (Icelandic Manuscript Institute) is the principal repository of the nation's extensive literary heritage, which includes manuscripts of the sagas from as early as the 12th century.

Public Libraries. Because of Iceland's long-standing tradition of reading, the literacy rate is virtually 100 percent. Public libraries are found in all population centers, and bookmobiles provide service in the suburbs of Reykjavík. Per capita circulation in 1982 was approximately 9.5 items from public libraries alone. Services are provided to hospitals, asylums, and other institutions, and, typically Icelandic, collections of materials ("book-boxes") are regularly prepared for ships in the country's fishing fleets. The state pays a small sum of money to Icelandic authors whose works have been acquired by libraries, to compensate for royalties not gained from direct sales; writers of Icelandic-language works have a small potential market (no more than 150,000 buyers).

School Libraries. In 1974 the Icelandic Parliament passed a law mandating libraries for all schools by 1984. In Reykjavík, by early 1976, more than half of the schools had libraries, many of them modern facilities similar to media centers in the United States. A centralized service center in Reykjavík handles acquisitions, cataloguing, and other processes. In some of the smaller towns, school and public library functions are provided by the same institution.

Special Libraries. Several small special libraries support research centers (such as the National Energy Authority and the Marine Research Institute) and the specialized training schools (such as those in marine engineering and health-related professions). An extensive collection of materials is held by the Nordic House, a cultural center supported by the Nordic countries. The U.S. International Communication Agency also maintains a modern library.

Icelandic Library for the Blind and Visually Handicapped. Blindrabókasafn Islands was founded by law in 1982 and opened in 1983. It produces and distributes braille material and talking books. Before the founding of the library, the Reykjavik City library and the Society for the Blind provided that service for the whole country. The Library is under the Ministry of Education.

The Profession. People working in Icelandic libraries become members of The Association of Icelandic Librarians, founded in 1960. It has approximately 300 members. The Association of Professional Librarians, established in 1973, has approximately 100 members with university-level training, mostly from the University of Iceland, but also from the U.S., Britain, or one of the Nordic countries. The University of Iceland provides professional training in com-

bination with another study area in a three-year program. Graduation from it is regarded as necessary for admission to the professional library ranks.

In May 1984 the Icelandic Parliament passed a Law on Professional Librarians defining qualifications required before the Minister of Education grants a person the right to the title of bókasafnsfræðingur (professional librarian).

HRAFN A. HARÐARSON;
 CHARLES WILLIAM CONAWAY

India

India, a federal republic in southern Asia, lies on a peninsula that juts out into the Indian Ocean; the Arabian Sea is on the west and the Bay of Bengal on the east. It is bordered on the north and from east to west by Burma, Bangladesh, China, Bhutan, Nepal, and Pakistan. Population (1984 est.) 746,000,000; area 3,064, 063 sq. km. The official languages are Hindi and English. Fifteen languages including Hindi are listed in the Eighth Schedule of the republic's constitution.

History. In ancient and medieval India, there were no public libraries: collections of books were mostly maintained in temples and palaces. There was an oral tradition in the world of learning that very largely reduced dependence on the written word. Important centers of theological and philosophical learning, however, had their libraries. The modern library movement in India began in the first half of the 19th century.

National Library. The National Library of India was established as the Imperial Library in 1903 in Calcutta, then the country's capital, by an act of the government passed in 1902. It was given its present name by the Imperial Library (Change of Name) Act passed by India's Constituent Assembly in 1948, when it moved to its 30-acre grounds at Belvedere in southeast Calcutta. The Compulsory Deposit of Books and Periodicals Act of 1954, amended in 1956, made it one of the four depository libraries in the country. The other three are the Connemara Library, Madras; the Central Library, Bombay; and the Delhi Public Library.

When the Imperial Library was founded by Lord Curzon, then Viceroy and Governor-General of India, it took over the holdings of the Calcutta Public Library (established in 1836) and the Imperial Secretariat Library (1891). Consequently it had then, as it has now, some features of both a public and a departmental library. Any Indian citizen who is at least 18 years of age can obtain a reading room ticket and a borrower's ticket free of charge. Only books in print are issued on loan against deposit of money. Central and state government officials are permitted to borrow books without deposit. The Library offers an interlibrary loan service covering libraries in India and abroad.

The National Library's collections totaled 1,730,530 in 1983. It had 804,272 Indian and foreign official documents, including the publications of the UN and other international bodies, and 75,666 maps. Among its rare items are about 2,000 books in European languages published between the 15th and 18th centuries and another 3,000 rare titles published in India. In 1982-83 it received 16,660 books and

more than 15,000 periodicals under the Delivery of Books Act, purchased 3,302 books, and subscribed to 763 periodicals. During the same period, the Library received about 5,000 publications as gifts from individuals and institutions, both Indian and foreign, and 6,761 publications on exchange with foreign institutions. Its reading rooms have 500 seats for its average of 1,000 daily readers. In March 1983 the Library had 30,650 holders of borrower's tickets and 7,396 holders of reading room tickets.

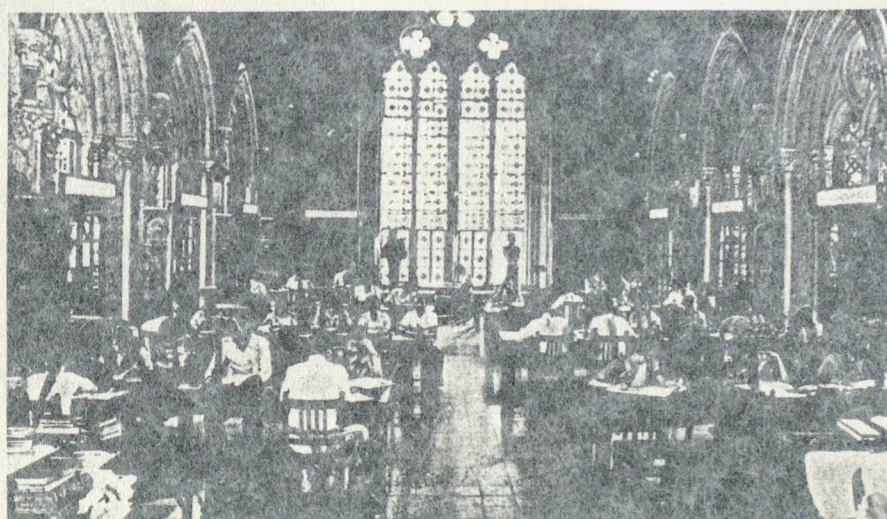
The Library had a staff of 783 in 1982-83; 206 were professional librarians holding degrees or diplomas in library science. The Library is under the Union Ministry of Education and Culture. The National Library of India Act of 1976, which grants the Library statutory autonomy, had not yet come into force by 1985. The National Science and the National Law Libraries are in New Delhi.

National Medical Library. The National Medical Library, New Delhi, was established in 1966 out of the Directorate General of Indian Medical Services Library, which was renamed Directorate General of Health Services Library in 1946. It had a collection of more than 125,000 volumes in the early 1980s and subscribed to 2,000 journals. It publishes a semi-annual *Index to Indian Medical Periodicals* (from 1959), and the sixth edition of its *Union List of Medical Periodicals in Indian Libraries* appeared in 1972. Its annual budget for books and periodicals exceeds 5,000,000 rupees.

Bibliography. The Indian National Bibliography, begun in 1956, is compiled and published by the Central Reference Library on the National Library grounds and is headed by its Librarian. The Central Reference Library also produces *Index Indiana*, a quarterly index of articles appearing in current Indian periodicals in major Indian languages.

Academic Libraries. The libraries of India's 130 universities and 10 institutions deemed to be universities by the University Grants Commission and another 12 learned bodies recognized by the Union Government as institutions of national importance are the country's most important academic libraries. Among the oldest university libraries are those of Calcutta, Madras, and Bombay, all founded in 1857. Among the libraries of the country's 4,500 first-degree colleges, some, like those of Presidency College, Sanskrit College, and the Scottish Church College, all in Calcutta, are more than 150 years old.

Public Libraries. Public libraries in India are as old as the introduction of the New Learning in the country in the early decades of the 19th century. Ef-



Bombay University Library

Completed in 1878, the Rajabai Tower Building Library in Bombay.

forts began after the country's independence in 1947 to establish a network of such libraries in the cities, towns, and villages in the country's 22 states and 9 union territories. Central and state governments have a policy of establishing public libraries supported by public funds and open to the public free of charge. Five of the republic's 22 states passed their library acts between 1948 and 1979, and the rest were planning to do so in the mid-1980s. In 1972, the International Book Year, the Government of India set up the Raja Rammohun Roy Library Foundation to mark the bicentenary of the birth of Rammohun Roy (1772-1833), the Father of Modern India, and its objective was to help build up a national library system. The Foundation gave assistance to more than 17,000 libraries through the Library Planning Boards of the states and Union territories. Among recipients of assistance by the mid-1980s were 27 State Central Libraries, 386 District Libraries, and 14,856 Town and Rural Libraries. The Foundation also offers counsel and funds for seminars, workshops, and exhibitions to help raise the standards of the services of the country's public libraries.

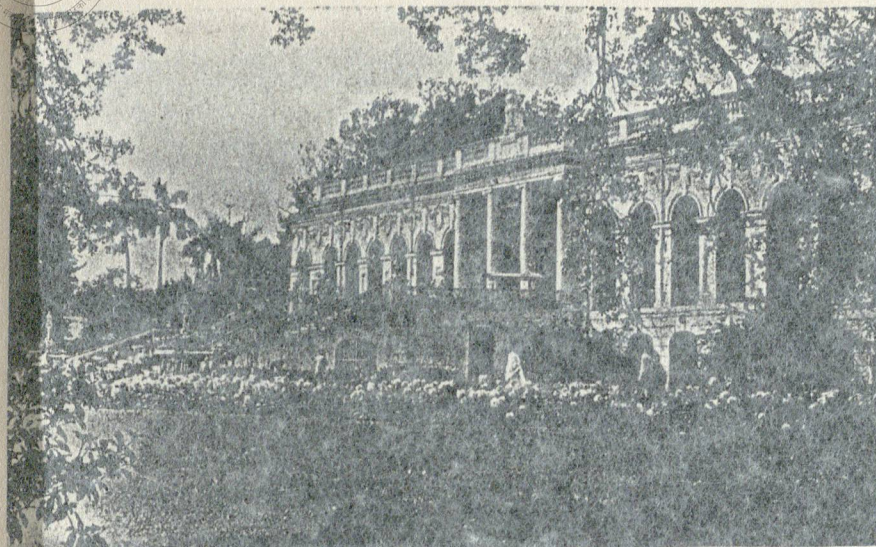
School Libraries. The libraries of India's more than 100,000 secondary and higher secondary schools are used mostly by the 1,000,000 students of their four top classes, a fairly large number of whom have to be provided with their textbooks. The new scheme of two years of preuniversity education after high school required a large number of schools to enlarge their collections to include books for students

Libraries in India (1983)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (rupee)	Population served	Professional staff	Total staff
National	6	7	1,730,530	11,500,000	40,000	206	783
Academic	4,652 ^a	--	12,536,000 ^b	--	--	--	--
Public	--	17,024 ^a	--	--	--	--	--
School	100,000 ^a	--	--	--	--	--	--

^aApproximate figures.

^b1977 data from Unesco, *Statistical Yearbook*, 1984.



National Library of India

The National Library of India, Belvedere, southeast Calcutta. It stands on a 30-acre grounds.

who though still in high school are actually pursuing collegiate courses.

Special Libraries. The *Directory of Special and Research Libraries*, published by the Indian Association of Special Libraries and Information Centres in 1962, lists 173 special libraries, the majority of which are supported by the government. Among these are libraries of central government institutions. They include:

The Geological Survey of India Central Library, Calcutta, established in 1851. It has a collection of more than half a million volumes and 1,500 periodicals. The Library serves the scientific and technical personnel of the department and scientists and research scholars, teachers, and students of various government and nongovernment institutions and commercial organizations. It publishes *Earth Science Abstracts* and *Indian Geological Abstracts*.

Botanical Survey of India Library, Howrah, established in 1890. It has a collection of more than 61,000 volumes and 250 periodicals. The library maintains a current information file (from 1973) and provides bibliographic and reprographic services.

Zoological Survey of India Library, Calcutta, established in 1926. It has a collection of about 50,000 books and 1,000 periodicals. It publishes *Bibliography of Indian Zoology* and maintains bibliographic and reprographic services.

The Anthropological Survey of India Central Library, Calcutta, established in 1947. It has a collection of about 30,000 volumes and 300 periodicals. It publishes *Documentation of Indian Anthropology*.

Indian Agricultural Research Institute Library, New Delhi, established in 1905. It has a collection of more than 250,000 volumes and about 3,000 periodicals. It maintains a central information file (from 1944) and bibliographic and reprographic services.

National laboratories, such as the National Physical Laboratories and National Chemicals Laboratory, and other national institutions for scientific research, such as the Bhaba Atomic Research Centre, Bombay, and the Institute of Chemical Biology, Calcutta, have large collections of books and journals in their areas

of research.

A special library of international affairs is the Indian Council of World Affairs Library, New Delhi, which has a collection of more than 100,000 books and documents, about 1,700,000 press clippings, and 12,000 microfilms. The Government of India is assisting the library to grow into a reference library of last resort for scholars specializing in international affairs. Founded by Sir William Jones in 1784, the Library of the Asiatic Society is the oldest library in Calcutta. It has a large collection of books, journals, and manuscripts relating to Indian literature, history, and philosophy. The Society has been recognized by the Union Government as an institution of national importance.

Scientific and Technical Information Services. In 1952 the Union Government set up, with assistance from Unesco, the Indian National Scientific Documentation Centre (INSDOC), New Delhi, as a central scientific and technical information service for the country's 1,500,000 scientific and technical personnel. It maintains translation and reprographic services in cooperation with other organizations of this kind, such as the Defence Science Information and Documentation Centre, Small Enterprise National Documentation Centre, Social Science Documentation Centre, Library and Information Services of the Bhaba Atomic Research Centre, and others. On an average it receives 800 requests a year involving 10,000 pages of translations. It publishes *Indian Science Abstracts*, is bringing out state-wide union catalogues of scientific and technical journals, and is compiling a union catalogue of books on science and technology in Indian libraries. Its Russian Science Information Centre publishes a current bibliography of Soviet scientific and technological literature.

National Policy. The library policy of the Union Government was stated in the *Annual Report* of its Ministry of Education and Culture (1981-82): "The Central Government has jurisdiction only over libraries established by the Central Government and institutions of national importance as declared by the Central Government. However, the Central Government takes initiative to secure the voluntary cooperation of the State Governments to promote coordinated development of national and State library systems. Funds for such integrated development are provided in the Central and State Five Year Plans." The Union Government pursued that policy through the Raja Rammohun Roy Library Foundation and by offering financial assistance to the Indian Library Association, Indian Association of Special Libraries and Information Centres, Government of India Librarians Association, and comparable groups. Although "Libraries, museums, and other similar institutions controlled or financed by the State" are included in item 12 of the State List in the Seventh Schedule of the Indian constitution, the Union Government could take such initiative in library development on a national level because education is now in the Concurrent List; it appropriately linked up its work toward the establishment and maintenance of libraries in rural and semi-urban areas throughout the country with its plans for formal and continuing education. For the last quarter of a century since the publication of the Report of the Advisory Committee for Libraries appointed by the Government of India in 1959, leading

librarians and educators have been seriously reflecting on the question of a sound national library system. A national library policy is expected to emerge when all 31 states and union territories have their library acts and when an instrument of cooperation among all libraries is drawn up for the sharing and economy of library resources. That instrument may be embodied in a central government policy resolution or act.

The Profession. Some Indian universities have faculties of library and information sciences to conduct graduate courses in the subject. The minimum qualification for a professional librarian in the country is a bachelor's degree in library science. Junior posts in the profession may go to holders of certificates in library science for which courses are conducted by bodies such as the Bengal Library Association, which was more than 40 years old in the mid-1980s. S. R. Ranganathan, the first Indian professor of library science in Delhi University, gave a new dimension to teaching and research at higher levels. A fair number of India's librarians hold doctoral degrees.

Associations include the Indian Association of Special Libraries and Information Centres (IASLIC), founded in 1955 in Calcutta, and the Indian Library Association (1933); about 1,600 members in the early 1980s), publisher of *Indian Library Association Bulletin* and other works such as *Subject Headings in Hindi*. The Federation of Indian Library Associations was established in Chandigarh in 1966.

REFERENCES

- S. R. Ranganathan, *Library Development Plan: Thirty-year Programme for India with Draft Library Bills for the Union and Constituent States* (1950).
 Subodh Kumar Mookerjee, *Development of Libraries and Library Science in India* (1969).
 Jibananda Saha, *Special Libraries and Information Services in India and the USA* (1969).
 B. D. Kesavan, *India's National Library* (1961).
 Indian National Scientific Documentation Centre, *Science Information Services in India* (1980).
 National Library, *The National Library of India: 1903-1978: A Pictorial History* (1978).

R. K. DAS GUPTA

Indonesia

Indonesia, a republic in Southeast Asia and part of the Malay archipelago, comprises thousands of islands over an area of 1,919,443 sq.km. The most densely populated island, Java, (137,187 sq.km.) has 91,269,528 inhabitants (1980 census). Other principal islands are Sumatra, Kalimantan (Borneo), and Sulawesi (Celebes). Population (1984 est.) 164,347,000. The official language is Bahasa Indonesia, the government-sponsored form of Malay.

History. As in medieval Europe, scholarly activities in early Indonesia were intimately connected with religion. Besides writings about religion and ethics, treatises of a secular nature, such as belles-lettres and works on history, arts, and law, have been preserved. Like their medieval counterparts, however, these so-called secular works should also be seen against their cultural background, which was dominated by religions—first Hinduism and Buddhism, later by Islam (except in Bali and certain other areas).

Indonesia, with its thousands of islands, has a variety of social and cultural identities. A large number of local languages exist. Fortunately the Malay language was from the early days selected as its lingua franca. The language was used as a vehicle of communication for trade among the Chinese, the Hindus, the Arabs, the Portuguese, and later the Dutch, and also for the spread of religions. The Malay language grew to become the Indonesian language, and was later promoted to become the national language.

In the 19th century the Dutch colonial government introduced the Western style of education for the population, but it made reading available to the general public only in 1908 with the establishment of the Folk Program in 1908. Around 1918 Balai Pustaka, the office in charge of promoting reading among the people, started operating mobile libraries. People were then able to read in their own local languages. During the Dutch colonial period, the special libraries to support colonial programs were better developed than the public libraries.

National Library. The National Library was established in 1980, merging four libraries in Jakarta: the National Museum Library (established in 1778), the Library of Social and Political History, the Provincial Library of Jakarta, and the Bibliographic and Deposit Division of the Center for Library Development.

The main functions are: to preserve national imprints, to collect publications on Indonesia and written by Indonesians wherever they are published; to publish the National Bibliography; and to act as a national center for library cooperation in the country and abroad. A Legal Deposit Act had not been approved by 1984 though a draft had been submitted to the Parliament. The collection totaled 650,000 volumes in 1984. The Library was housed in temporary quarters while a new site for the National Library building was under discussion in the mid-1980s.

Academic Libraries. Most of the colleges and universities in Indonesia, and thus also their libraries, are comparatively young, especially those outside Java. Only the Faculty of Medicine of the University of Indonesia in Jakarta and the Institute of Technology in Bandung existed long before Indonesia gained its independence in 1945.

Most libraries in Indonesia are government-owned. Several private ones belong to the Islamic institutes, theological seminaries, and teachers' training colleges. More centralized university library services remained to be developed, as many universities still maintain departmental libraries. An integrated university library system is being managed by the Directorate of Higher Education, Department of Education and Culture.

In September 1984 an Open University System was opened, and it promised to give additional responsibilities and dimension to academic libraries.

Public Libraries. It is difficult to meet the demand of the reading needs of more than 150,000,000 people and to serve them properly because of the vastness of the country. An effective book publishing and distribution system was still needed in the mid-1980s; programs are hampered very much by the inadequate transport and communication system.

Indonesia's 27 provincial capitals have provincial

libraries. The public libraries are to be found in districts and villages.

About 275 public district libraries were in operation in 1984. The provincial and public libraries are managed centrally by the Center for Library Development in cooperation with the local governments. To reach people in far-away places, many of the provincial libraries started operating mobile libraries. In 1984, 104 mobile libraries were in operation.

School Libraries. Indonesia's school-age population accounts for 60 percent of the total population. The development of the state school libraries is the responsibility of the Center for Library Development. Effective school library service is very much handicapped by the shortage of available teacher-librarians.

Most of the services given are limited to borrowing and returning books during school breaks. Pilot projects were being set up in the mid-1980s to demonstrate models to teachers and also to the parent-teacher associations.

Special Libraries. Categorized as special libraries are those with collections in a special field and also those rendering active information services. Most of the special libraries or information centers belong to research institutes or universities.

Many of the special libraries, in management and collections, are better off than the other types of libraries in the country because of their history. The *Directory of Special Libraries and Information Services in Indonesia 1981* reports a total of 295 libraries. National documentation and information centers, for example, in biology and agriculture, science and technology, and health and medicine, carry out national functions in their fields of specialization. National centers also become a training ground for staff from other libraries who are in need of improving management and technical capabilities.

In Indonesian library development, the special libraries could be considered the principal innovators in and advocates of library and information services. The system still faces financial and other handicaps in making the services effective for users in far-away places. Indonesia is still far from making all levels of the community information conscious.

The Profession. The Indonesian Library Association, founded in 1954, was the only library association existing in the country in 1984. Throughout

its history it has undergone several changes of names and coverage of activities. At one time it was also an association for archivists. Later, between 1969 and 1973, workers in special libraries felt they needed their own association and formed the Indonesian Special Library Association. Although the small group flourished, many believed that the small number of professionals in the associations was not advantageous to the development of the profession and a new combined association was started in 1974. Many constraints work against making the Association strong with a voice to be heard.

REFERENCES

- Central Bureau of Statistics, *Statistical Yearbook of Indonesia 1980/1981* (1982).
Philip Ward, *Indonesia: Development of a National Library Service* (1975).
Unesco, *Report on Survey. Indonesia National Survey of Scientific and Technological Information*. (1980).

LUWARSIH PRINGGOADISURJO

Information Science

Before the Soviet Union launched the Sputnik satellite in 1958, the phrase *information science* rarely appeared in encyclopedias, books, or journals. This is not to say that there was not a science of information. Human beings by necessity have always been concerned with information, but then analysis of this concern depends on what we mean by *information*.

A compilation of the areas of interest indicated in the various technical reports included in the *Journal of the American Society of Information Science*, the official publication of a society representing the professionals who work in the field, shows that the major areas of interest of information scientists lie in the logistical properties and requirements of knowledge: acquisition, storage, and retrieval. They are involved in three fundamental functions, namely, the means for *generating* new knowledge, means for *using* what is known (possibly for generating new knowledge), and means for *transferring* (disseminating or distributing) this knowledge to others. These functions occur primarily in institutions such as libraries, schools, information centers, and public or government agencies. And these functions are directed toward *objects* such as documents and reports, *services* related to doc-

Libraries in Indonesia (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (rupiah)	Population served	Professional staff	Total staff
National	1	--	600,000	537,404,000	5,548 ^a	61	80
Academic	26	--	--	--	--	--	168
Public	274	--	467,986	--	--	--	533
School	1,139	--	--	--	3,653,780	--	10,389
Special	295 ^b	--	1,000,000	--	--	--	800
Provincial Libraries	26	--	768,137	--	--	--	1,047
Mobile Libraries	104	--	151,029	--	--	--	--

^aUnesco, *Statistical Yearbook*, 1984. 1981 data: registered borrowers.

^bDirectory of Special Libraries and Information Services in Indonesia, 1981.

Source: Center for Library Development, National Scientific Documentation Center.

records. Special collections include West Indian literature, the theatre, and foreign languages (French, Spanish, and German). Educational and cultural programs are conducted by all libraries.

School Libraries. The Schools Library Service is administered by the Jamaica Library Service on behalf of the Ministry of Education. The service for primary schools began in 1952 and was extended to the junior secondary schools in 1969. Five bookmobiles, with a stock of 2,000 books each, operating from five regional centers, visit each primary and all-age school at least three times a year. At each visit teachers may select 200 to 1,000 books, depending on the school's enrollment and other factors. The stock in 1983 totaled 1,096,626 books and periodicals and served an enrollment of 431,454 pupils.

The 80 secondary school libraries (formerly called junior secondary schools), unlike primary schools, all have organized library rooms. The total bookstock of these libraries was 422,851. There are also well-established libraries in many of the traditional high schools.

Special Libraries. The interest shown in recent years by business, industrial, and professional organizations in the provision of libraries continues. The largest of these is the Alcan Technical Information Center attached to Alcan, one of the Bauxite companies. Libraries are also attached to government ministries and agencies. These include those of Education and Agriculture, the Supreme Court, Bureau of Standards, and Scientific Research Council.

The Profession. The Jamaica Library Association (established 1950) has its headquarters in Kingston and maintains a professional collection. It has a Schools Library Section and a Special Library Section, and they sponsor seminars and workshops regularly. The Commonwealth Library Association (1972) has its headquarters in Mandeville.

SYBIL M. ITON

Jameson, J. Franklin (1859–1937)

John Franklin Jameson—historian, teacher, editor, manuscript librarian, and administrator—was present at the beginnings of the historical profession in the United States and later of the archival profession.

Born September 19, 1859, in Somerville, Massachusetts, Jameson early showed intellectual promise and habits of hard work. He was graduated from the Roxbury Latin School and, in 1879, as valedictorian from Amherst College. While in college he set course on becoming a historian. Unable to finance graduate study in Germany, he taught high school for a year before going to the newly established Johns Hopkins University. His Ph.D. in 1882 was the first history doctorate awarded there.

Jameson had the rare opportunity to found and shape important institutions. He was one of the founders in 1884 of the American Historical Association and in 1895 of the *American Historical Review*, which he edited with great distinction until 1928 (except for 1901–05).

For the two decades after taking his doctorate, Jameson held history professorships at Hopkins (1882–88), Brown University (1888–1901), and the

University of Chicago (1901–05). But Jameson did not make his mark as a teacher.

On leaving Chicago, Jameson became the second Director of the Bureau of Historical Research of the recently founded (1902) Carnegie Institution of Washington. As an advisor to Carnegie's first President, Daniel Coit Gilman, Jameson had helped formulate Carnegie's historical programs, which centered on identifying, evaluating, and publishing guides to the archives of the federal government and of bodies of archival material abroad with bearing on American history. This work eventually made clear the abysmal state of the federal government's archival practices and the pressing need for an archives building and an appropriate agency to administer the whole enterprise. Jameson politicked actively for a quarter-century for an archival establishment and was rewarded for his efforts by the construction of the National Archives building in 1934.

In 1927 Jameson became the first incumbent of a chair of American history at the Library of Congress as well as Chief of the Manuscript Division. He actively enlarged the division's role in fostering scholarship by expanding its program of photocopying records from foreign institutions (made possible by the guides he had published at Carnegie) and by acquiring many important new collections. Jameson was responsible for the policy formulation of the Division but also supervised closely all the routine work of his staff.

Although Jameson's bibliography is lengthy, most entries were edited pieces, reports, or reviews; this remarkable historical statesman was far more intent on administering great projects than in producing large-scale interpretive works himself. Still, two of his books, *The History of Historical Writing in America* (1891) and *The American Revolution Considered as a Social Movement* (1926), were of considerable influence in their day and for some years after.

Jameson died September 28, 1937, in Washington, D.C., while still occupying his posts at LC.

REFERENCES

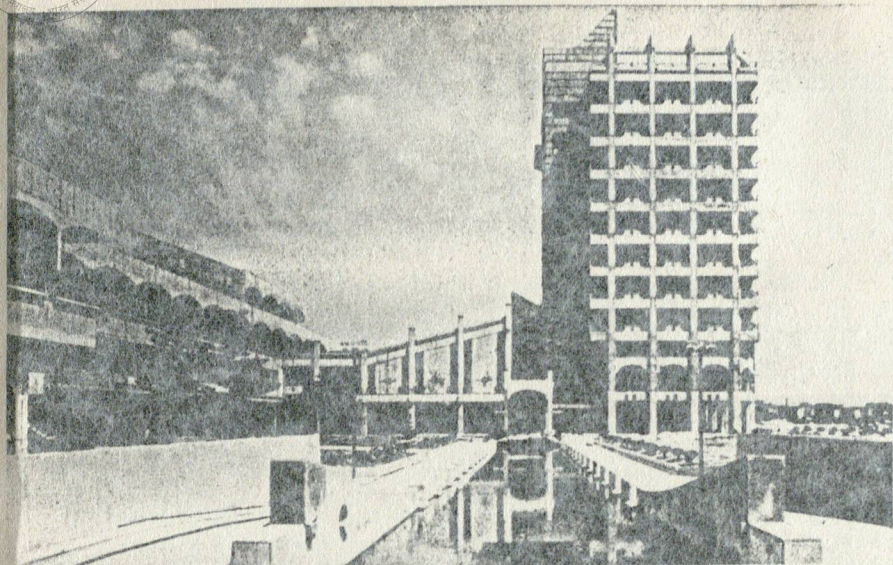
- Elizabeth Donnan and Leo F. Stock, editors, *An Historian's World: Selections from the Correspondence of John Franklin Jameson* (American Philosophical Society, 1956). Includes biographical sketch.
- Ruth Anna Fisher and William Lloyd Fox, editors, *J. Franklin Jameson: A Tribute* (1965), memoirs by 14 contributors.
- Victor Gondos, Jr., *J. Franklin Jameson and the Birth of the National Archives, 1906–1926* (1981).
- The major collection of Jameson's papers is in the Manuscript Division of the Library of Congress.

JOHN B. HENCH

Japan

Japan, a constitutional monarchy, lies in the shape of a bow in eastern Asia and comprises an archipelago including the four main islands of Hokkaido, Honshu, Shikoku, and Kyushu. Population (1984) 118,602,000; area 377,582 sq.km. The official language is Japanese.

History. At the turn of the 3rd century A.D., Kanji (Chinese) characters were introduced to Japan by Korean scholars. In the 4th century, a number of political refugees from Korea were naturalized in Japan. Mostly Buddhists from the higher classes and



Library Center of Kanazawa Institute of Technology, opened in 1982.

well educated, the Koreans brought to Japanese society their continental culture and religion, which rapidly spread over the country.

As early as the 7th century, the Japanese government sent its first messenger to China to establish direct relations. That communication accelerated the flow of Chinese culture to Japan and the Japanese utilized Kanji as a means to express their native language.

The oldest book of Japanese history was compiled in Kanji in A.D. 712 and the copperplate or wood block prints of the Buddhist sutra of Hyakumanto ("A Million Pagodas") were printed in 770. Buddhist culture was accepted by the Emperor and his courtiers and noblemen, some of whom were interested in learning and began to collect scrolls for a library. Untei-in (Nara) of Isonokami no Yakatsugu (729-81) and Kobaiden (Kyoto) of Sugawara Michizane (845-903) were private collections on Buddhism and Confucianism available to scholars. The openness of the Nara collection is often cited as evidence that it was the first public library in Japan.

Samurai Rule. After a long period of civil war, the Samurai (warrior) class gained power, taking the place of the noblemen in the Kamakura period (1185-1333). Relations with China (Sung dynasty, 960-

1279) were reopened and cultural and personal exchange began again. Many sutras and books on Buddhism and Confucianism were imported, stimulating the Japanese religious world. New sects of Zen and Nichiren were born. Priests were eager to study and print sutras and books on Buddhism. Non-Buddhist books, however, were made by hand as in the past. Two great libraries of Samurai clans at the time still remain today.

Kanazawa Bunko (library) was the private collection set up by the Hojo clan in the latter half of the 13th century. The collection included Buddhist materials in scrolled, folded, and printed forms numbering more than 10,000. The collection was heavily used by scholars.

Ashikaga Gakko (school) was rebuilt to educate boys of the Uesugi clan in 1432. Divination was the main subject taught, and the school's rich collection on the subject attracted scholars from all parts of the country.

The Shogun Tokugawa Ieyasu (1542-1616), who founded the last shogunate, moved the government from Kyoto to Edo (modern Tokyo) in 1590. He ruled a tranquil and prosperous country and encouraged learning to keep the country in peace. The Shogun, an enthusiastic scholar of Confucianism, invited scholars to print books, and he collected books and records that were scattered or thought lost during the civil war years. The Shogun had a private library called Momijiyama Bunko.

The third Shogun of the Tokugawa dynasty, Tokugawa Iemitsu (1604-1651), appointed an official custodian for Momijiyama Bunko to collect books and compile a catalogue of the collection. The Bunko was kept by scholar-custodians under the sponsorship of the shogunate from generation to generation until 1868, when the shogunate fell. The Bunko was full of manuscripts and rare and important materials of the country. The collection is now divided and kept in the Library of the Imperial Household Agency and the Cabinet Library for use of scholars. The Library of the Imperial Household Agency inherited another collection, from the Shoheizaka School, which was a government school to educate Samurai in Edo.

There were more than 250 feudal provinces in Japan during the Edo period (1590-1868). Feudal lords, following the Shogun's policy, established provincial schools with libraries and printed books.

Many wajuku and terakoya (small private

Libraries in Japan (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (yen)	Population served	Professional staff	Total staff
National	1	36	7,531,124	11,094,529,000	117,777,000	1,128 ^a	1,230
Academic	830	440	126,165,000	95,515,420,000	2,474,558	8,358 ^a	12,040
Public	1,444 ^b	520 ^c	88,247,000	13,522,130,000	117,777,000	5,190	10,341
School	42,017 ^d	--	--	18,069,000,000	23,250,072	695	17,207
Special ^e	2,023	--	50,731,702	30,863,560,000	--	1,397 ^a	2,904

^aAll full-time staff; distinctions between professional and nonprofessional are not made in national, academic, and special libraries in Japan.

^bMain and branch libraries not separated.

^cNumber of bookmobiles.

^dIncludes schools for the disabled.

^e1981 data.

schools) gave basic education in reading, writing, and arithmetic to children of the non-Samurai classes. More than 800 terakoyas alone were reported in Edo in 1722.

In the latter part of the Edo period, the lending library became a business. Bookmen carried packs of books on their backs to customers at their homes and lent books for a fee. There were more than 2,000 publishers who had profitable businesses in Japan throughout the Edo period. Literacy of Samurai, merchants, their wives, and children appears to have been high.

Meiji Period. When the last shogun fell in 1868, the Imperial Government was restored to power. Japan opened its ports to trade with foreign countries for the first time since the 17th century. The government imported not only manufactured goods but also science, technology, and other knowledge from European countries and the United States in order to modernize and to catch up with Western civilization in those areas.

The government established the Imperial Library in 1872. It included the collections of Shoheizaka School and other Edo governmental institutions.

In 1872, when public education was enforced, organizations of school teachers were formed in each *ken* (prefecture or province). Those libraries would become the central libraries in *kens* in later years.

The Japan Library Association was formed by 35 librarians and booklovers in 1892. The first Library Act was issued in 1899. In commemoration of the new building of the Imperial Library, the first annual meeting of librarians was held in 1906. The next year the Japan Library Association began to publish its journal, *Toshokan Zasshi* ("Library Journal").

Taisho Period. During the Taisho period (1912–25), the number of public libraries rapidly grew. There were 445 in the first year and 4,337 in the last year of the Taisho period, but the average number of books was as small as 2,000 volumes per library.

The Librarian's Training Institute was founded under the control of the Ministry of Education in 1921. The Institute initially produced about 40 librarians at the high-school level annually, and later developed into the National University of Library and Information Science with graduate courses.

World War II. The number of public libraries grew steadily until there were 4,794 (1,500 private) at the outbreak of World War II in 1941. During the war, most of the large cities were swept by air-raid bombing and fire. More than half of the collections of central libraries in *kens* and 80 percent of those in municipal libraries were destroyed.

An Education Mission from the U.S. made recommendations on reform and democratization of education to the occupation authorities. As part of education reform, some recommendations and suggestions on improvements of libraries and library services were included. Japanese libraries have risen from the ashes to develop along those recommendations.

National Library. Kokuritsu Kokkai Toshokan—the National Diet Library (NDL)—was established under law in 1948. The NDL serves the Diet members, its primary function, as well as the general public. It is the only library and bibliographic center with the privilege of legal deposit of both civil and

official publications in Japan. Its six-story building and a basement (73,674 square meters) provide a stack capacity of 4,500,000 volumes.

An annex building was under construction in 1985. In addition, a plan called for establishing a Kansai (Kyoto–Osaka area) branch that would be a second service point for users in western parts of Japan.

The NDL has six divisions and a department. Its staff numbered more than 800 in the early 1980s. NDL has 36 branches, including the former Imperial Library, Toyo Bunko (Oriental Library), Library of the Supreme Court, libraries in the executive and judicial agencies of the government, and a detached library in the Diet building (a direct service point to the Diet members).

The main collection totaled 4,038,128 volumes (1,213,126 foreign), 78,660 periodical titles, 229,936 maps, 258,662 phonodisks, 127,911 reels of microfilms, and 175,852 doctoral dissertations; 1,764 braille books were maintained in the main library. Almost 500,000 readers (1,751 a day) used the collection and made about 196,000 pages of photocopies.

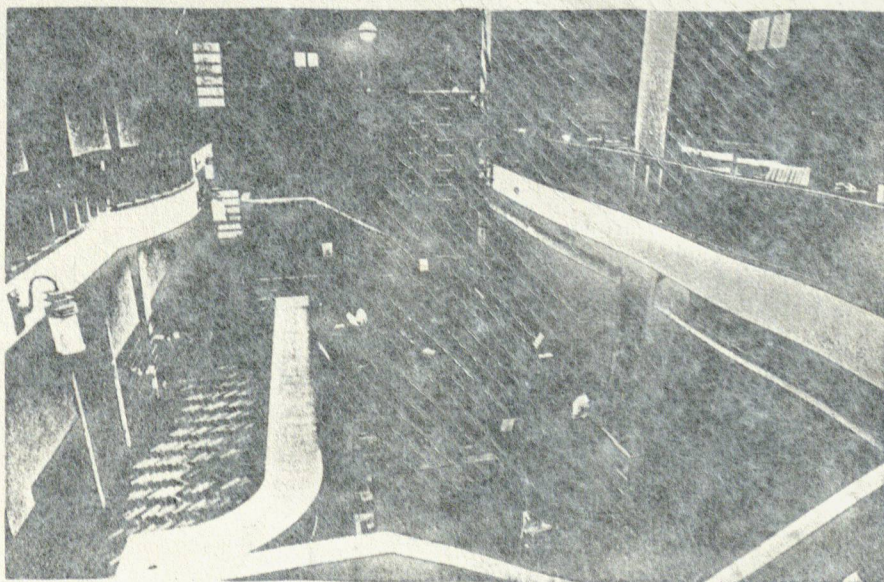
There is no overall interlibrary loan system for the whole country. The NDL lends books to any library whether it is a public, university, or special library. NDL loaned 5,573 books to its branches, 10,546 to university and public libraries, 1,206 to special libraries, and 136 to libraries in foreign countries (1983–84).

NDL microfilms newspapers for preservation and use by readers. The Library annually filmed 59 newspapers from 1953 under contract with the Japan Newspaper Association. The Library also has microfilmed important newspapers published in the Meiji (1868–1912) and Taisho (1912–25) periods.

NDL installed a computer system to automate certain aspects of library work in 1971 after studying its feasibility and experimenting for a decade. The first publication from the automated system was *The General Index to the Debates in Both Houses of the Diet*.

Bibliographic information on legally deposited publications was accumulated on magnetic tapes to form a central database, JAPAN MARC. Thirty-five

Central catalogue hall of
 Tenri University Library,
 Tenri, Japan.



Theodore F. Welch

libraries subscribed in the mid-1980s to JAPAN MARC tapes through the Japan Library Association. The *Japanese National Bibliography*—weekly edition, quarterly index, and annual volumes—have been compiled and printed out from JAPAN MARC.

Academic Libraries. Higher education in Japan faced great change under the Education Reform Act after World War II. A coeducational system was introduced, the number of university students greatly increased, and junior colleges for young women's education appeared as new institutions.

There were 453 universities in 1983 (93 national, 34 prefectural and municipal, and 326 private) with 1,900,000 students, of whom 22 percent were female in 1983.

There were 938 university libraries including departmental libraries and subject collections in faculty members' study rooms. Three hundred twenty-six national university libraries accounted for 44 percent of the total book resources.

The largest national university library is the University of Tokyo Library, founded in 1877. It comprises the general library and 62 libraries in faculties, departments, and research institutions with 5,129,166 volumes and 36,653 periodical titles (18,976 foreign); there were 327 librarians in all.

Keio University is the oldest private university. Its Library on the Mita campus, opened in April 1983, provides open access to faculty members and students in all parts of the building.

The Library Center of Kanazawa Institute of Technology (KIT), opened in 1982, attracted special attention because it installed a computer from the beginning to provide automated library services. It provides, for example, a bibliographic retrieval system that does not use a card catalogue. KIT planned to "bring the library to teaching programs and teaching programs to the library." It called upon subject specialists who are faculty members as well as library staffs to select materials and provide students with regular guidance on library use and bibliographic information.

In 1980 the Ministry of Education accepted "The Report on Science Information Systems" submitted by the Science Council, which calls for setting up an information retrieval system based on computer technology that effectively utilizes library resources in universities. The Ministry subsidized national university libraries for cooperative acquisition of scientific periodicals, compilation of union catalogues, and setting up interlibrary loan systems among libraries.

Three private university libraries had joined UTLAS (University of Toronto Library Automation Systems) by 1985. They use it for processing European and American books.

Junior colleges, the comparatively new higher education institutions for females, appeared in 1950. There were 542 (36 national, 51 prefectural and municipal, and 455 private) with 380,214 students in 1984.

Junior college libraries, generally speaking, are small. The average number of books was 34,400 with 2.6 staff members in a library in mid-1984. About 80 percent allow open access.

Topics discussed at annual meetings of junior college librarians in the early and mid-1980s emphasized subjects common among librarians—student in-

struction on library use and application of microcomputers to library work, for example.

Public Libraries. The concept of a public library as a tax-supported free institution whose purpose is to serve the community through books and other materials came into being after World War II. The concept was implemented in the enactment of the Public Library Law of April 30, 1950. The day has since been celebrated yearly as "Library Day" for the promotion of library service.

There are two types: the prefectural and the municipal (city, town, village, and ward) public libraries. Forty-seven prefectures have a total of 71 libraries and 63 bookmobiles. Tokyo and Kyoto have as many as six libraries in each prefecture. Libraries in Tokyo, Osaka, and Saitama prefectures have more than a million volumes, while the average number of books in each of the other 44 prefectures was 350,000 volumes. The largest amount of annual book expenditures was ¥158,000,000 in Metropolitan Tokyo in 1984 and the smallest was ¥15,000,000 in Tottori prefecture. Reorganization of six metropolitan libraries in Tokyo and computer-based rationalization of the book processing system using JAPAN MARC tapes were under way in the second half of the 1980s.

There are 3,278 municipalities, and 86 percent of the cities and 15 percent of the towns and villages had public libraries in 1984. A prefectural library, therefore, has to do double work of lending books to individual patrons via bookmobiles and to municipal libraries for interlibrary loan within the prefecture. Public libraries numbered 1,537 with 542 bookmobiles, serving a whole population of 118,602,000 in Japan in 1984.

Service to the Blind. Library services to the blind began in the 1970s. There were 92 libraries for the blind in 1984, and a large number of public libraries provided large-print books, recorded tapes, and tête-a-tête reading service by volunteers. Library buildings were remodeled to provide ramps for wheelchairs, special plumbing facilities, and dots on the floor to guide the blind in the library. Thirty-eight institutions publish braille books and five publish large-print books.

Children's Services. Library service to children is another post-World War II development. In 1955, 30 percent of public libraries had children's rooms or corners. While 24 percent of the registrants were children, only five percent of the books in public libraries were children's books. Although the importance of services to children was emphasized and the number of children's rooms grew in the 1960s, services were still inadequate and did not meet the demands of children. Through the efforts of mothers, several thousand small private collections called "home libraries" have been opened to children. In 1983, 83 percent of public libraries had children's rooms or corners, and 45 percent of total circulation was children's books.

School Libraries. The 6-3-3 system—six years primary, three middle, and three high school—was established under the postwar Education Reform Act. The first nine years of education are compulsory. After finishing compulsory education, 94 percent of the middle school students go to high school.

Before the war, there were only a few school libraries, run by some enthusiastic teachers. The School Library Law was enacted in 1953 and more

than 98 percent of a total of about 41,360 schools (25,044 primary, 10,950 middle, 5,364 high schools) have libraries. Although the School Library Law required schools to employ teacher-librarians, a supplementary provision of the law held that "Schools may defer compliance concerning teacher-librarians for the present." The proviso was criticized for undermining sound development of school libraries. A new classification of librarian emerged: called "school librarians," they do not have teacher's licenses and may or may not have librarian's certificates.

A school library survey done by the Japan School Library Association in 1980 showed that primary school libraries had an average of 3,690 books (7.9 volumes per pupil) and library expenditures of ¥332,000 (U.S.\$1,400); 83.3 percent of the libraries did not have card catalogues for pupils. Twenty-four percent of the schools provided posts for full-time teacher-librarians, and 10 percent of the schools provided posts for school librarians.

In a middle school library, the number of books averaged 4,699 (9.3 volumes per pupil) and library expenditures averaged ¥4,209,870 (U.S.\$17,540); 75.4 percent of the libraries did not have card catalogues. Twenty-four percent of the schools had full-time teacher-librarians and 13.5 percent of the schools had school librarians.

In high school libraries, the average book collection was 12,041 volumes (15.9 volumes per student); library expenditures were ¥5,506,403 (U.S.\$22,943). Public catalogues were available in 64.5 percent of the libraries. Full-time teacher-librarians were working in 45.3 percent of the high school libraries; 34.4 percent of the schools employed school librarians, 29 percent of whom had librarian's certificates.

In 1970 schools began to open their libraries to people in the community as they had done with their playgrounds outside school hours. The percentage of schools doing so, however, was still small in the 1980s.

Special Libraries and Information Centers.

A *Directory of Special Libraries* (1982) listed 2,023 special libraries, of which 284 were established before 1945. Generally speaking, special libraries are small; the median was a collection of 35,000 books and 350 periodical titles and a staff of four. Most of them are closed to the public. Special libraries may be categorized as libraries in private corporations, local government councils, research institutes attached to universities, government institutions, associations and societies, and foreign government institutions.

The Japan Information Center for Science and Technology (JICST) was established as a special non-profit organization under a legislative act in 1957. It had approximately 10,000 titles of both Japanese (40 percent) and foreign (60 percent) periodicals, 12,500 technical reports, 49,000 patent specifications, and other items in 1984. JICST compiles 12 abstract journals in Japanese from both Japanese and foreign periodicals on monthly or semimonthly bases. They include JICST File on JOIS (JICST Online Information Systems), which also includes foreign databases such as BIOSIS Previews, CAB, MEDLINE, and others.

JICST and its 10 branches are connected over lines to 2,500 terminals in private corporations, research institutes, and universities. JICST provided about 300,000 online information services in 1983.



Theodore F. Welch

Yumedono (Hall of Dreams), established on the grounds of the Horyu-ji Temple near Nara in A.D. 702, thought to be the earliest library in Japan.

Online copy and SDI services are available.

A hundred medical college libraries form the Japan Medical Library Association. The average medical library had 58,000 volumes of books, 1,443 current periodical titles (653 Japanese, 790 foreign), and annual expenditures of ¥61,120,000 (U.S.\$250,000), with 10.5 full-time librarians.

Cooperation among medical libraries has been well organized in the most advanced ways in Japan to provide interlibrary loan and to compile a union catalogue of periodicals. Thirty-seven medical libraries had Telexes for requesting photocopies of periodical literature in 1984.

Eighty-five libraries installed computer terminals for online information services from JOIS and DIALOG of Lockheed by 1985. MEDLINE and EX-CERPTA MEDICA naturally are in heavy demand.

There are two hospital library associations. A survey of hospital libraries was published in 1985 by the International Congress of Medical Librarianship in Tokyo.

Hospital libraries for patients were a new development in the mid-1980s. Volunteers who visit hospitals to lend books to patients formed the Japan Hospital Library Association to promote such services.

The Profession. Education. The Librarian's Training Institute was founded under the control of the Ministry of Education in 1921 in Ueno Park, Tokyo. It was the only institute to train librarians at the high school level before World War II. The Institute trained 1,530 librarians by 1964, when it was reorganized and became the National Junior College for Librarianship. The Junior College provided a two-year course in library science and a one-year course for university graduates with B.A. degrees. The junior

college was reorganized again to become the National University of Library and Information Science when it moved from Tokyo to Tsukuba in Ibaraki Prefecture in 1980. Graduate courses were added in April 1984.

The Japan Library School was established in the Faculty of Letters, Keio University in 1951 with the assistance of the American Library Association and the Rockefeller Foundation. It was the first library school at the university level for professional education in Japan. During its early years, the curriculum emphasized American library science practices taught by American visiting professors with interpreters. When the grants ended, the School became part of Keio University as the Department of Library and Information Science. Graduate courses leading to the M.A. or Ph.D. in Letters were added in 1967.

In addition, 107 universities and 94 junior colleges offered minors in library science in the mid-1980s, with credits leading to librarian's certificates. Sixteen universities offered two-month summer courses and three correspondence courses for librarian's certificates in 1982.

Graduate students can specialize in library science in the Faculty of Education at the University of Tokyo and at the University of Kyoto.

A librarian must have a librarian's certificate to work in a public library, as required by the Public Library Law. It is the only qualification for librarianship that can be acquired by persons whose education ranges from high school graduation to a Ph.D. University, college, and special libraries do not require librarian's certificates, but they give preference to candidates who possess them.

A teacher-librarian's certificate is awarded after eight credits are earned in library science. Courses for teacher-librarians were offered in the mid-1980s at 91 universities and more than 50 junior colleges together with courses for librarians' certificates.

Associations. The Japan Library Association (JLA) is the only general association that covers all types and subjects of libraries. It was founded in 1892, and its membership included more than 5,000 persons and 1,812 institutions in 1984; it is a member of IFLA. *Toshokan Zasshi* ("Library Journal") is published monthly. Other publications include "Nippon Cataloging Rules," "Nippon Decimal Classification," "Basic Subject Headings," "Library Yearbook," and more than 35 other books on librarianship.

JLA has eight divisions on types of libraries and had 24 committees in 1984. JLA invited other library associations and libraries to form the Japanese Committee for IFLA in 1982. The committee became sponsor of the 52nd IFLA Conference in Tokyo, scheduled for August 1986.

Other associations include: the Association of Private University Libraries, founded in 1930 (257 member institutions); the Council on National University Libraries, founded in 1924 (93 institutions); the Japan Medical Library Association, founded in 1927 (100 institutions); the Japan School Library Association, founded in 1950 (60 regional organizations); the Japan Special Libraries Association, founded in 1952 (611 institutions); the National Council of Public Libraries, Japan, founded in 1967 (1,537 institutions); and the Private Junior College Li-

brary Association, founded in 1977 (225 institutions). All issue newsletters or journals or both and many are members of IFLA.

There are other associations in pharmacutics, agriculture, music, law, hospitals, and library science. There also are regional and international associations such as Hokkaido Society of Library Science and La Société Franco-Japonaise des Bibliothécaires.

REFERENCES

- Theodore F. Welch, *Toshokan: Libraries in Japanese Society* (1976).
 Louise Watanabe Tung, "Library Development in Japan," *The Library Quarterly* (1956), for the premodern period.

MADOKO KON

Jast, Louis Stanley (1868-1944)

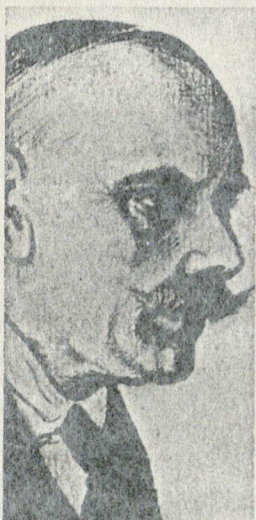
Louis Stanley Jast was one of the great pioneers in the development of the British public library service. He was an inventive practicing librarian, an engaging writer on librarianship, and the best speaker in the profession in his day.

Jast was born at Halifax, Yorkshire, August 20, 1868. He was the son of an exiled Polish army officer, and his family name, which he changed in 1895, was Jastrzebski. Jast began his library career in 1887 at the Halifax public library, where he was thoroughly grounded in all the pettifogging routines that were then the very essence of public librarianship. Jast was unable to exercise his latent talents until he became his own master.

In 1892 Jast became Librarian of the small town of Peterborough. Soon afterward he discovered the Decimal Classification, which in later years he listed among the books that had most influenced his life. Under its spell he waged his first campaign, for the wider use of close classification in public libraries. He thereby gained the friendship of James Duff Brown, pioneer of open access in British public libraries. Jast joined forces with Brown not only on the platform in propagating the elements of "the new librarianship" but also in the pages of the *Library World*, the independent monthly journal that Brown had founded and also edited.

In 1898 Jast became Librarian of Croydon, a rapidly growing commuter town on the fringe of Greater London. There, with the backing of a sympathetic committee and a hard-working staff, Jast created a truly dynamic library service. Under his direction the Croydon libraries became a workshop for new ideas. Among the many novelties were the card catalogue, the reference information service, the library bulletin, lectures, reading circles, exhibitions of books and pictures, and liaison with the local schools.

Running the Croydon libraries was not enough to absorb Jast's boundless energy. From 1905 to 1915 he served as Honorary Secretary of the Library Association (LA). No one was better qualified for the post, but not even Jast's sparkle and enthusiasm could bring the LA prosperity. Its membership and resources remained obstinately small. The two major events during Jast's term of office were the inauguration in 1910 of a register of qualified librarians and the framing and publication, in collaboration with the American Library Association, of the well-known



Library Association

Louis Stanley Jast

K

Kampuchea

Kampuchea (the Khmer Republic, formerly Cambodia) is a republic of Southeast Asia in the southwest part of the Indochinese Peninsula. It is bounded on the southwest by the Gulf of Thailand, on the west and northwest by Thailand, on the northeast by Laos, and on the east and southeast by Vietnam. Population (1984 est.) 6,118,000; area 181,035 sq.km. The official language is Khmer; French is widely spoken.

History. During the four-year period of Communist rule (1975-79) and after the Vietnamese conquest of Kampuchea in 1979, library services were reportedly effectively eliminated. There was no evidence that any were functioning at the end of the 1970s. The University of Phnom Penh was reported totally inactive in April 1979. Several public and university libraries, as well as collections in museums and temples, were destroyed. The libraries described here were in operation before 1975.

National Library. The Archives et Bibliothèque Nationales was founded in 1923 in Phnom Penh as a national deposit library that housed more than 31,000 volumes. An ordinance of 1956 required publishers to deposit five copies of all works published there. Printers were obliged to deposit three copies. No law required that every administrative document be forwarded to the National Archives, although a decree of 1918 required public departments to deposit such documents periodically. Some departments did not deposit their documents.

No national bibliography was established for Kampuchea, although the National Archives and Library compiled catalogues of its holdings, including books, pamphlets, official publications, university dissertations and theses, maps, atlases, and standards.

A national exchange center, the Bibliothèque centrale in Phnom Penh, was created in 1972 to collect works in all fields of knowledge and to establish contacts with foreign libraries. An exchange system was developed among the university libraries, which included the Université des Beaux-Arts, the Université de Phnom Penh, the Université Bouddhique, the Université des Sciences Agronomiques, and the Université Technique, all in Phnom Penh.

Other Libraries. The Bibliothèque de l'Institut Bouddhique, founded in 1923 in Phnom Penh, housed books and manuscripts in French, English, Thai, Burmese, Sinhalese, Chinese, Tibetan, and Mongolian, as well as documents in Khmer and Pali on Khmer folklore and Buddhism. The library built a collection of about 40,000 volumes and 16,200 manuscripts on palm leaves.

The Institut national de la statistique et des recherches économiques, founded in 1963 in Phnom Penh under the Ministère du Plan, became a documentation center holding more than 300 volumes. The Institut compiled national and international statistical and economic data and published the *Bulletin trimestriel de statistique*, *Annuaire statistique*, and *Comptes économiques*.

The Library of the Association des écrivains khmers, founded in 1962 in Phnom Penh, housed 4,525 volumes. The association was created to aid writers and promote literature in the Khmer language; it published a monthly literary review. There was no official library association, although a govern-

mental department, the Office national de planification et de développement des bibliothèques, was established in 1975 to coordinate library and archival activity in Cambodia.

PETER A. POOLE*

Kenya

Kenya, an independent republic in eastern Africa, is bounded by Sudan and Ethiopia on the north, Somalia and the Indian Ocean on the east, Tanzania on the south, and Uganda on the west. Population (1984 est.) 19,536,000; area 590,367 sq.km. The official languages are Swahili and English.

History. The first recorded library in Kenya was established in 1916 by the Department of Agriculture. It was used by both officials and farmers. Other government departments then established their own libraries. The McMillan Library was a private library until 1962, when it was taken over by the Nairobi City Council. It housed a collection of 55,000 volumes, and for the first time was open to Africans. Institutions of higher education developed in the 1950s and 1960s, foremost among these being the Royal College (later the University of Nairobi). In 1984 Kenya hosted the IFLA conference in Nairobi.

National Library Service. Although Kenya has no national library in the conventional meaning of the term, the Kenya National Library Service (KNLS) runs a nationwide public library service with headquarters in Nairobi. In the early 1980s this headquarters library housed about 19,000 volumes. Most scholarly researchers use the University of Nairobi Library Service. Both libraries are legal depositories for Kenyan publications.

Academic Libraries. The major academic library is the University of Nairobi Library Service, comprising the main university library and eight sub-libraries in the various campuses of the university. The main library covers commerce, social sciences, humanities, and engineering; libraries on other campuses serve the sciences, medicine, agriculture, and veterinary medicine. The total bookstock in 1981 was about 270,000 volumes and about 3,500 current periodical titles.

Kenyatta University College is a separate but constituent college of the University of Nairobi, housing the Faculty of Education. The bookstock of its library was approximately 140,000 volumes with 2,000 periodical titles.

There are in addition academic libraries of various sizes in the main postsecondary training institutions such as Egerton College (agriculture), Kenya Institute of Administration, Kenya Polytechnic, Kenya Science Teachers College, Kenya Technical Teachers College, and Mombasa Polytechnic.

Public Libraries. The KNLS operates libraries in the country and planned to start two new libraries each year until there was one in each of Kenya's 50 districts and municipalities. The bookstock of the entire Service in 1981 was about 511,000 volumes.

The Nairobi City Council operates a separate City Library Service with a main library and two branches. Other libraries open to the public are op-

formation science. The foundation of the Danish Library School (1956) was Kirkegaard's *magnum opus*. He also left his stamp on practical librarianship through his work in public libraries in Jutland. At an early stage he entered the international library scene, became involved in consultancy work abroad, and was active in IFLA.

Preben Kirkegaard was born in Aarhus, Denmark, on January 8, 1913. He passed a secondary school leaving exam in 1929, completed bookseller training in 1933, and was engaged as an assistant at the Aarhus Public Libraries on February 1, 1934. He became a trainee at the same library system on December 1, the same year. In 1936 Kirkegaard passed the final examination at the State Library School in Copenhagen. Kirkegaard was thus equipped with an all-round introduction to the booktrade and to the basics of librarianship. Kirkegaard's time in Aarhus was characterized by his involvement with county-library-operated field work, especially the assistance to the book selection process in the rural libraries, and the library-based adult education seminars.

On January 1, 1945, Kirkegaard, at the age of 31, was appointed head of the Holstebro County Library. In 1946 he was appointed Chief Librarian of the County Library in Vejle. Vejle's emerging image as a "model library," which had an impact, even abroad, was largely due to Kirkegaard.

In 1956 Kirkegaard moved from practical librarianship into library education. The Ministry of Education appointed him Director of the newly established Royal School of Librarianship in Copenhagen, an independent institution set up through a special act. The new state college replaced the formal training program named the State Library School and operated by the State Inspection of Public Libraries. During the pioneering years of the school, the Director had his hands full in building a top-notch faculty and in taking care of curriculum development, planning, and administration. Yet Kirkegaard became the architect of a large-scale and impressive expansion of the educational activities and the institutional framework of the Royal School of Librarianship during the subsequent two decades. A new act on the Royal School of Librarianship was passed in June 1966 implying a reshaped public librarianship program as well as development of curricula oriented toward the education of professional library staff for the research and academic libraries sector. A new library school building on the island of Amager, near central Copenhagen, was converted into a well-functioning, working environment for some 50 full-time faculty members, technical, and support staff and more than 1,000 students. Thanks to Kirkegaard's dynamic efforts and negotiation skills, the financial support necessary to the operation of such a large institution was secured.

In his many years as educator, planner, administrator and negotiator, Kirkegaard never concealed his visions of an upgraded and consolidated library profession and his intention to enhance the level of library education and raise the status of his school. Kirkegaard took the view that library science is an academic discipline in its own right. It may well be that Kirkegaard's views of a philosophy of librarianship and his educational ideas were inspired by distinguished American library schools such as Chicago

and Columbia.

He went to England, Canada, and the United States to study, joined IFLA, as early as 1952, undertook a Unesco expert mission on library education in Greece (1962) and served on IACODLA (International Advisory Committee on Documentation, Libraries and Archives) set up by Unesco, 1971-78. But Kirkegaard's work within IFLA constitutes the apex of his activities in the field of international library co-operation.

He became a dedicated worker for IFLA over many years, served on the sections of public libraries and library schools and the Executive Board of the organization (acting as Treasurer 1965-1973) and served as President 1974-1979. During his presidency Kirkegaard exerted a clear influence on the priorities and structure of IFLA. He had a key role to play in the shaping of a new organizational structure for the Federation. The constitution was blueprinted at the General Council in Lausanne, Switzerland, August 1976.

At the IFLA Council and General Conference in Oslo, Norway, August-September 1979, the title of Honorary President of IFLA was conferred on Kirkegaard in recognition of his untiring efforts. The selection of Kirkegaard as recipient of the Professor Kaula Gold Medal for the year 1982, "in recognition of his illustrious services for the cause of Library and information science," is another appreciation of his merits.

Kirkegaard's support of the library profession is also reflected in his contribution to the work of various organizations, committees, and bodies in Denmark, including the Danish Association and the Union for Public Librarians. He has served on the Executive Committee of the Danish Library Association. In 1983 he became a honorary member of the Association. From 1957 Kirkegaard was a co-editor of *Libri*, the international journal. Kirkegaard wrote numerous articles and reviews, and his monograph on Danish public libraries (1948) has been translated into several languages.

After his retirement in 1983, Kirkegaard worked as an active freelancer, contributing feature articles and book reviews to newspapers. He continued to keep an eye on developments in the library scene, and he studied selected library history themes.

REFERENCE

The Kirkegaard Festschrift *Biblioteket*, edited by Axel Andersen and Erland Munch-Petersen, Copenhagen (1983), provides a bibliography of 291 of Kirkegaard's writings compiled through March 1982.

LEIF KAJBERG



Preben Kirkegaard

Korea, Democratic People's Republic of

North Korea, officially the Democratic People's Republic of Korea, occupies the northern half of the Korean Peninsula in eastern Asia. It is bounded on the north by China and the Soviet Union, on the east by the Sea of Japan, on the south by the Republic of Korea, and on the west by the Yellow Sea. Population (1984 est.) 19,630,000; area 121,200 sq.km. The official language is Korean.

The Central Library in Pyongyang, functioning as a national library, has a collection of about 1,500,000 volumes. Provincial libraries are in Chongjin, Hamhung, Shinniju, Haeju, Wonsan, Kangge, Pyonsong, Sariwon, and Hesan. The North Hwanghae Provincial Library in Sariwon is reported to have a collection of 60,000 volumes, the library in Hamhung 40,000, and the library in Haeju 33,000. In addition there are city libraries in Kaesong and Chongjin with collections of about 25,000 volumes.

The Academy of Sciences Publishing House, founded in 1953, publishes works on science, chemistry, geology, metallurgy, physics, biology, history, mathematics, meteorology, education, and economics. The Academy of Social Sciences and the Academy of Medical Sciences, both in Pyongyang, publish works in their respective fields.

The Kim Il Sung University in Pyongyang, founded in 1946, has faculties in history, philosophy, political economics, law, philology, foreign literature, geography, geology, physics, mathematics, chemistry, and biology. Its library has a collection of about 60,000 volumes. The Kim Chaek Polytechnic Institute and the Pyongyang Medical Institute are also in Pyongyang. There are institutions of higher and professional education in the main towns, including colleges of engineering, agriculture, fisheries, and teacher training. In addition, there are factory (engineering) colleges. Statistical and other detailed information was not available on library service in these institutions.

Special libraries are the Institute of Agricultural Sciences in Finjan and the Academy of Forestry, the Academy of Medical Science, and the Academy of Social Science, all in Pyongyang.

The Library Association of the Democratic People's Republic of Korea was established in 1953. The Association is affiliated with IFLA; its headquarters are in the Central Library at Pyongyang.

Korea, Republic of

The Republic of Korea in eastern Asia comprises the lower 99,022 sq. km. of a mountainous peninsula extending south from Manchuria between the Yellow Sea and the Korean Straits, and it is bounded on the

north by the Democratic People's Republic of Korea. Population (1983 est.) 41,366,000. The official language is Korean.

History. Korea, throughout its history, has had a rich background of papermaking, printing, and bookmaking. Since the invention of movable metallic type in the 12th century A.D. Korea has proven a good breeding ground for libraries. Historical records prove that libraries in a variety of forms existed from ancient times. Among the early libraries were the royal palace libraries—storehouses for archival materials, classics, and government documents. Early libraries also could be found in temples and scholars' homes. The Yangban (nobility) produced the scholars of Korea and in their libraries were the manifestations of culture. The Kyujangkak (Royal Library), with some 141,000 volumes of rare books and manuscripts of literary works, fine arts, history, culture, and official documents, is one of the greatest sources for research in the entire Orient.

While much of Korean traditional literature was written in Chinese ideographic characters, Korea has an alphabet of its own—Hangul. The Hangul alphabet, comprising 24 phonological characters, was created under the learned direction of King Sejong in 1446, and it has proven a remarkable vehicle for the extension of literacy and educational growth in Korea, a country with a highly homogeneous population.

National Libraries. The Central National Library of the Republic of Korea was started in 1923 as a Japanese government library and went through reorganization in 1945 when the Japanese left Korea. Following the enactment of the Library Law of 1963, the Library became the Central National Library. It serves the country by acquisition and preservation of national literature, bibliographic services including KOMARC (Korean equivalent of MARC), and exchange services between domestic and overseas libraries. It had almost 972,600 volumes in 1983, including more than 194,000 rare books, including Chinese and Korean classics. Major publications are "The Library Journal," "Korean National Bibliography," and "Bibliographic Index of Korea."

The National Assembly Library was established in 1951 and operates in accordance with Article 11 of the National Assembly Secretariat Law. Its main duty

Libraries in the Republic of Korea (1983)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (won)	Population served	Professional staff	Total staff
National	2	1 ^a	1,588,584	3,057,764,000	433,027	103	394
Academic	251	--	16,557,955	13,849,674,000	--	674	2,455
Public	143	5 ^a 9 ^b	2,617,401	5,280,031,000	17,163,774	582	1,821
		35,025 ^c					
School	5,374	--	18,295,919	2,990,351,000	--	1,303	5,374
Special	230	--	3,565,428	5,915,600,000	1,417,480	372	790

^aBranches.

^bMobiles.

^cSaemaul Mungo (New Village Micro Library).

Source: Korean Library Association, *Statistics on Libraries in Korea*, 1984, Seoul, 1984.

in the Library Law of 1963 is the establishment of libraries at primary, middle, and high schools. Schools have engaged in an effort to comply, but educational needs exist on all levels and the library requirement competes with the need for more classrooms, more teachers, and other basic education facilities and resources. There were 5,374 school libraries in Korea with 18,295,900 volumes in 1983.

Special Libraries. Special libraries are among the growing forces in Korean librarianship. Demands for information on sciences, technology, and business administration have increased. This growing interest among scholars, administrators, and businessmen has helped them to recognize the importance of library service in their organizations and caused the fast development of special libraries in both governmental and nongovernmental organizations. Special libraries are more adequately financed than others and are staffed by trained librarians and enjoy better interlibrary cooperation. The best example is the Science Park Complex composed of KAIST (Korean Advanced Institute of Science and Technology), KDI (Korea Development Institute), and KIET (Korean Institute for Economic Technology). Other examples are those at the Academy of Korea Studies, at the Korea Educational Development Institute, and at the Korea Research Institute for Human Settlement.

The Profession. *Education.* Training of librarians in modern librarianship is very young in Korea. In 1946 the Central National Library opened the first Library School. During the five years of its existence, 77 librarians were graduated.

The first academic library school was established in 1957 at Yonsei University in cooperation with George Peabody College for Teachers. Similar four-year programs were established at Ewha Woman's University, 1959; at Chungang University, 1963; and Sungkyunkwan, 1964. In the 1970s universities offering four-year programs increased and a number of junior colleges began offering two-year programs. Soongeui Women's Junior College was one of the first. By 1984, 25 universities offered four-year undergraduate programs at the B.A. level and six junior colleges offered the two-year program. Graduates of the four-year program receive the Ministry of Education Certificate of professional librarianship, and the junior college graduates receive the subprofessional certificate. Three universities, Sungkyunkwan, Yonsei, and Chungang, offer doctoral programs, and five universities offer postgraduate work leading to master's degrees. In addition, Sungkyunkwan University offers a one-year program in the evenings as in-service training for library employees or college graduates desiring to work in libraries. Ministry of Education certificates are awarded to graduates.

Associations. The Korean Library Association (KLA), the first library association in Korea, was established in 1945. Its objectives are to promote library development and cooperation among individual and institutional members and to promote international library cooperation. Members in 1984 included 692 individual and 635 institutional members. The Association sponsors activities such as an annual National Library Convention, Book Week, and Library Week as well as workshops and distribution center service to member libraries. The KLA publishes "The KLA Bulletin," a "Library Science Series," revisions of

"The Korean Decimal Classification System," and "Korean Cataloging Rules," "Statistics on Libraries in Korea," and many other tools.

The Korean Library Science Society was started in 1970 by the members of library science school faculties and individuals interested in advanced studies in the field of libraries and information science. The Society promotes Korean librarianship through seminars, lectures, and an annual publication, *Tosogwanhak* ("Studies in Library Science").

The Korean Bibliographical Society was organized in 1968 by librarians and scholars interested in bibliographical service and archives. It also sponsors seminars and lectures and publishes a journal, *Sojihak* ("Bibliographical Studies").

REFERENCES

- Pongsoon Lee, "Education for Librarianship in Korea," *Papers Presented at the FID/ET Workshop, 1982* (1983).
Ke Hong Park, "Libraries and Librarianship in the Republic of Korea," *Proceedings of IFLA Worldwide Seminar* (1976).
Pow-key Sohn, *The Early Korean Typography* (1982).

PONGSOON LEE

Krupskaya, Nadezhda

(1869–1939)

Nadezhda Konstantinovna Krupskaya Ulianova, the wife of Lenin, was prominent in Communist Party and Soviet state activities, one of the founders of the Soviet educational system, and a pioneer in the development of Soviet libraries.

Krupskaya was born February 26, 1869, in St. Petersburg (now Leningrad). She graduated from secondary school in 1887 and, in 1890, while a student of the Woman's College in St. Petersburg, she became a member of a Marxist circle. From 1891 to 1886 she taught at a Sunday evening school for workers and propagated revolutionary ideas.

She met V. I. Lenin in 1894, and soon they were married. With him she took part in the organization of the Revolution in Russia. In August 1896 Krupskaya was arrested and joined Lenin in his exile in the village of Shushenskoye and later in Ufa. At that time she wrote her first work, *The Woman-Worker*. From 1901 to 1905, together with Lenin, she lived in Germany, Great Britain, and Switzerland and was active in the revolutionary movement and the publishing of the Marxist newspapers *Iskra* and *Vperyod*. On her return to Russia in November 1905 she worked as the Secretary of the Central Committee of the Bolshevik Party. From the end of 1907 until April 1917 she again lived in exile with Lenin, continuing her revolutionary activities.

At the same time, she became interested in the study of popular education in Russia and in western European countries and in 1915–16 became a member of the Pestalozzi pedagogical society in Switzerland and the Berne and Fribourg pedagogical museums. In that period she also wrote one of her major works, *People's Education and Democracy*, which dealt with the development of popular education in the United States, a subject that she had examined in a number of her earlier works.

After the establishment of the Soviet government in Russia in November 1917, Krupskaya became one of the leaders of the Commissariat of Peo-



Printed courtesy of Soviet Life
Nadezhda Krupskaya

is to serve members and committees of the Assembly, and it provides information and materials for legislative reference and research work. It also serves government officials, as well as the public, with bibliographic services, research, and technical services. The library had 616,000 volumes in 1983, including nearly 10,500 rare books. Major publications are "Korean Periodicals Index," "Theses for the Doctor's and Master's Degree in Korea," and "National Assembly Library Review."

Both libraries became depository libraries under the library law of 1963. The services rendered by the two libraries overlap in many ways, and there was a movement in the late 1970s to unify the two libraries into a single, strong national library, but it ended in vain. In the mid-1980s each library had a new building under construction, with completion for both scheduled for 1986.

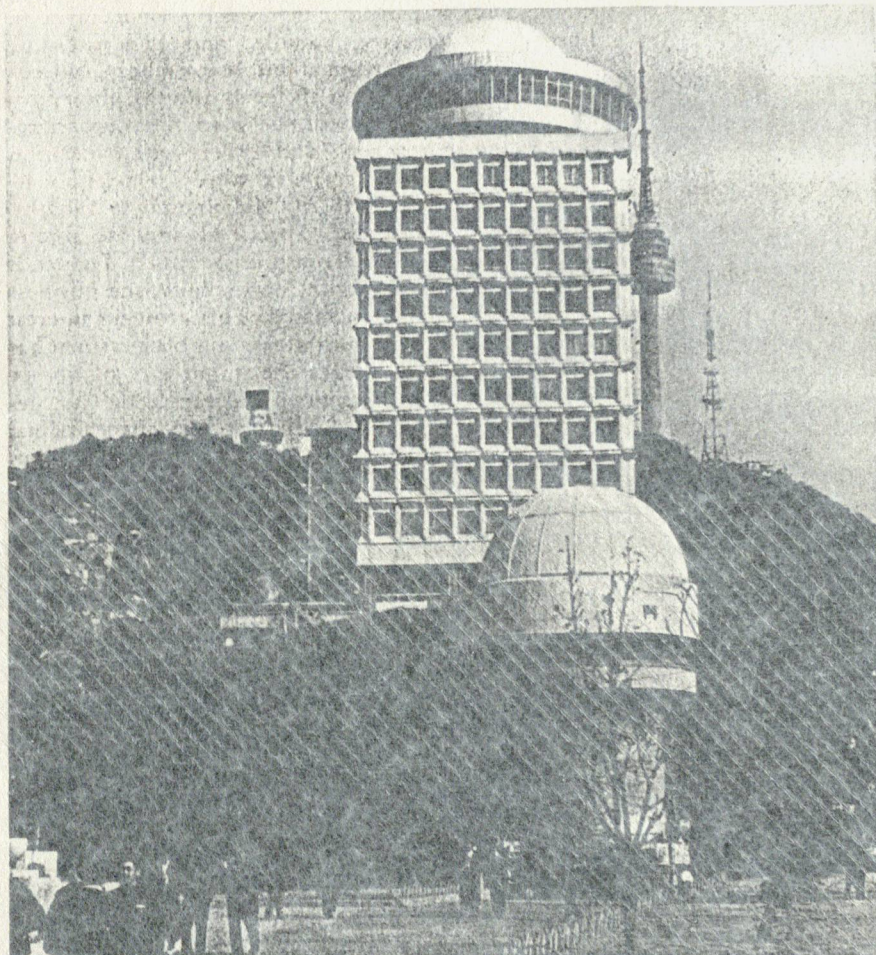
Academic Libraries. University and college libraries as well as junior and teachers' college libraries supported either by the government or private institutions increased in number and were physically extended after World War II as part of the higher education systems. According to "Statistics on Libraries in Korea 1984," academic libraries served 48,679,600 users with more than 16,560,000 volumes in 1983.

Most academic libraries suffered during the Korean War, 1950-52. They were subsequently active in building up their collections and reader services. From the end of the 1970s there were trends in higher education toward independent study and changes in teaching methods, academic requirements, and library materials. Many academic libraries engaged in building new library buildings and seeking better services; among changes was that from the closed- to the open-shelf system.

The Seoul National University Library, the largest academic library in Korea, has a modern building centrally located on a campus supported by the government. The Kyujangkak, the Royal Library collection of classic literature, is preserved in a specially designed section of the Library. Eight representative national universities, one in each of eight provinces, are active in developing improved library facilities and services. Other major university libraries supported by private institutions are at Yonsei, Korea, and Ewha universities. Built in the first half of the 1980s, they have modern facilities; Ewha Woman's University Library, completed in 1984 and equipped to manage up to a million volumes, changed from a partially open-stack system to fully open-stack service for its 20,000 users.

Public Libraries. Public libraries were introduced to Korea only in the beginning of the 20th century. Because they were introduced by the Japanese during their occupation of Korea, they were considered alien institutions. A few prospered, but public libraries were not generally popular or well supported until the enactment of the Library Law of 1963. Still small in number in the 1980s, public libraries came to perform a real function in encouraging intellectual interests and filling recreational needs.

Local and city governments are financially responsible for encouraging the development of public libraries under the overall supervision of the Ministry of Education. There were 143 public libraries in Korea in 1983.



The Central National Library

Central National Library,
Seoul, Korea.

Micro Libraries. The Korean Micro Library Association was inaugurated in 1961. It is a grass-roots effort to reach individuals at the village and farm level and is a part of the New Village Movement, a unique Korean community movement for better living in the rural areas. Each Saemaul Mungo (New Village Micro Library) of approximately 60 titles is self-contained in a wooden bookcase that holds upwards of 300 volumes. The original 60 titles were selected in accord with villagers' needs and interests: for example, agriculture, stock raising, gardening, fishing, or homemaking. Each recipient is responsible for adding new volumes. A Village Reading Club runs each library, and books are lent free of charge. The Association, first operated under the auspices of the Ministry of Education, came under the sponsorship of the Ministry of Home Affairs, which provided a total of 35,025 libraries. The number of the libraries will not increase, according to the Association, because its goal is to enrich the existing ones. The Association publishes *Saemaul Mungo* ("New Village Micro Library").

School Libraries. After the Korean War, the most notable increase in library numbers was in school libraries, which many see as indispensable in modern education. But the lack of understanding among administrators and the shortage of teacher librarians has hampered growth and presented problems of maintaining school libraries as instructional media centers. One of many wide-ranging provisions

Lancaster, F. Wilfrid (1933-)

Frederick Wilfrid Lancaster, library educator, became a major influence in the fields of information systems and the evaluation of library services. His work deals principally with the underlying intellectual problems and conceptual frameworks of information retrieval systems, rather than technical aspects of computing and systems design. His major contributions have been in the areas of vocabulary control, interaction between system and user, evaluation of systems effectiveness, and, in his later work, the implications of advanced information systems for the future of libraries in society.

Born September 4, 1933, in Durham, England, Lancaster studied at Newcastle-upon-Tyne School of Librarianship (1950-54) and became Fellow of the Library Association of Great Britain (by thesis) in 1969. Lancaster began his professional career in 1953 as Senior Assistant, Newcastle-upon-Tyne Public Libraries. His subsequent positions include Senior Librarian for Science and Technology, Akron Public Library; Resident Consultant and Head, Systems Evaluation Group, Herner and Company, Washington, D.C.; Information Systems Specialist, National Library of Medicine; and Director of Information Retrieval Services, Westat Research, Inc. From 1970 Lancaster served on the faculty of the University of Illinois, Graduate School of Library Science, with the rank of Professor from 1972.

Lancaster's contributions have been made through writing, teaching, and consulting. Major publications include *Towards a Paperless Information Society* (1978), *The Measurement and Evaluation of Library Services* (1977; Ralph Shaw Award, 1978), *Information Retrieval Online* (1973), *Vocabulary Control for Information Retrieval* (1972), and *Information Retrieval Systems: Characteristics, Testing and Evaluation* (1968). In addition, Lancaster edited a number of books and wrote many articles and technical reports. His publications were recognized by the American Society for Information Science with best book awards in 1970 and 1975 and a best paper award in 1969.

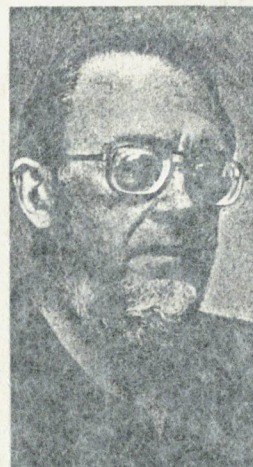
His consulting includes work for the Central Intelligence Agency, Center for Applied Linguistics, National Library of Medicine, and National Library of Australia. He completed a set of guidelines on the evaluation of information systems and services for Unesco and the Food and Agriculture Organization.

Lancaster's strongest impact was on the development of criteria and procedures for the evaluation of systems performance, mainly through the extension, refinement, and application of concepts pioneered by the Cranfield studies, a series of investigations undertaken in the late 50s at the College of Aeronautics, Cranfield, under the direction of C. W. Cleverdon. His *Evaluation of the MEDLARS Demand Search Service* (1968) represents a landmark investigation, not particularly for its influence on the later development of the MEDLARS system, but as a demonstration of the application of refined methods for testing, analyzing, and evaluating the performance of an operational information retrieval system.

The more general significance of Lancaster's work results from his ability to combine a rigorous and thorough approach with a clarity of expression

that renders advanced concepts of information retrieval accessible to the student and the practicing librarian without oversimplification. Lancaster's work, therefore, might be viewed as an attempt to bridge several important divisions in the information professions. His early work on vocabulary control and systems evaluation provides a connection between practice and theory for the technically oriented designer of information systems. His later work, particularly the *Measurement and Evaluation of Library Services*, serves to narrow the gap between the library profession at large and the growing body of research relevant to measurement and evaluation. Lancaster's most significant contribution to the literature of library and information science, assessed at a point still relatively early in his career, may well be his stimulation of interest in the possibility that theory and research may have some practical utility in the field.

JOE A. HEWITT



University of Illinois News Bureau

F. Wilfrid Lancaster

Laos

Laos, a people's democratic republic in southeast Asia, is bounded by China on the north, Vietnam on the northeast and east, and Kampuchea on the south. Population (1984 est.) 4,097,000; area 236,800 sq. km. The official language is Lao.

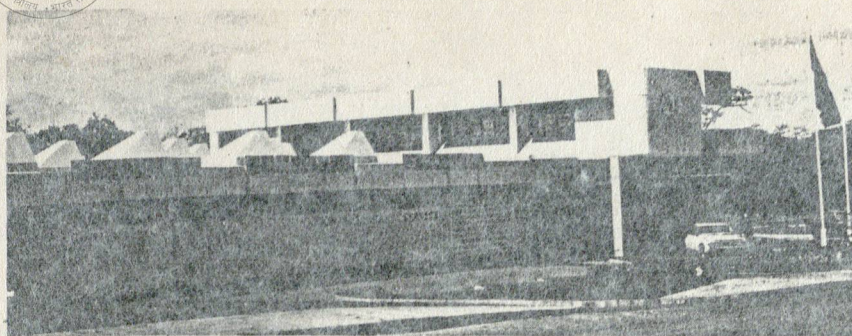
National Library. The National Library of Laos in Vientiane includes the National Museum and National Archives. On the grounds of the School of Fine Arts, it is under the direction of the Ministry of Education. Its holdings are about 50,000 volumes in Lao, English, and French; the degree of continuity in its operations allowed by the government is uncertain. Prior to the declaration of a people's republic in 1975, the National Library received aid from the French and U.S. governments, private foundations, and Western scholars. For example, the Rockefeller Foundation presented 9,000 volumes, mainly in French, on a wide range of subjects. Other contributions were made by the Asia Foundation and by the U.S. Library of Congress. In 1974 the former Director of the National Library, Prachit Soulisak, told a representative of the U.S. Library of Congress that he had compiled a list of 84,000 titles available in Lao at various temples and libraries throughout the country; he said the list gave the location of each item.

The National Library of Laos published *Lao National Bibliography*, 3 volumes (1968-72); *Bibliographie de Laos*, Institut Française d'Extreme Orient, with a supplement covering the years 1962-70, was compiled by the Director of the Lao National Library.

Academic Libraries. Before 1975 the Buddhist Institute in Vientiane was one of the most important centers of scholarship in Laos. It maintained a substantial collection of works, many in Pali and Sanskrit, for the use of its students and foreign scholars.

Sisavangvong University, in Vientiane, is the only university in Laos. It serves about 1,600 students. Library facilities of its faculties of medicine, law, and education were mainly provided by Western governments and foundations and are not extensive for research purposes. The libraries of the University's 10 institutes range in size from 800 to 4,200 volumes.

Public Libraries. There are not believed to be any public lending libraries, in the Western sense, in



The National Library Service of Malawi

Headquarters of the Malawi National Library Service in Lilongwe, established by an act of Parliament in 1967.

along professional lines, under Wilfred Plumbe, its first Librarian. The Malawi National Library Service followed in 1968. Malawi enjoys excellent library co-operation, made possible by a good road network and an inexpensive internal book postal rate.

National Library Services. The country has no designated National Library, but the functions of a national library are performed by the National Archives of Malawi, which is the country's only legal deposit library and contains the most comprehensive collection of Malawiana in existence. It publishes an annual cumulation, *Malawi National Bibliography*.

University Library. The University of Malawi Library System is a federation of four college libraries scattered in three of the country's largest cities: Bunda College of Agriculture Library, Chancellor College Library, Kamuzu College of Nursing Library, and the Polytechnic Library. The bookstock of the Libraries has grown steadily since the mid-1960s. By 1984 the total bookstock including periodical titles stood at 241,483. Membership of the Libraries includes the staff and students of the University of Malawi, but outside borrowers are permitted upon payment of a token fee.

Public Libraries. The National Library Service was created by an act of Parliament in 1967 to operate free library services throughout Malawi. It has a main library in Lilongwe, the capital, regional Libraries and branches in the regions, and a network of library centers in such institutions as schools, prisons, community centers, and other organizations. For borrowers in far-off places and homes, it operates a nationwide postal service. In 1984 the National Library Service issued 481,500 books to readers from 253 centers.

Other public libraries include those operated by foreign governments or organizations, such as the British Council, the United States Information

Agency, and the French Cultural Center. All of these have highly regarded book collections but they are also popular for their collections of sound recordings and other nonprint media.

School Libraries. Malawi has a network of school libraries in the secondary schools, technical colleges, and teacher training colleges in all three regions of the country. The largest school library is that of the Malawi Institute of Education at Domasi.

Special Libraries. These encompass a whole range of information units in the private and public sector. Government departments, statutory organizations, and private firms operate libraries of varied strengths in book and human resources. The Central Agricultural Library and the Natural Resources College Library remain Malawi's best-known special libraries.

The Profession. The Malawi Library Association was inaugurated on April 30, 1977. From 1979 it organized Malawi Library Assistant Certificate Courses every year to train library paraprofessionals. Short seminars and workshops are also held from time to time. All of the 30 professional librarians (in 1985) were trained abroad, mainly in the United Kingdom and United States. The Malawi Library Association publishes the *MALA Bulletin*.

STEVE S. MWIYERIWA

Malaysia

Malaysia, an independent federation of 13 states in Southeast Asia, comprises two distinct land areas—Peninsular Malaysia and the states of Sabah and Sarawak on the island of Borneo. Malaysia is a member of the Commonwealth. Population (1984 est.) 15,246,000; area 329,750 sq.km. Bahasa Malaysia, the Malay language, is the official language of the country.

History. Although monastic and temple collections and state archives existed in the Indianized empires of Southeast Asia, there is little evidence of their existence in the Malay states. The earliest libraries in Malaysia were subscription libraries established by the British in the 19th and early 20th centuries to serve the needs of the European community. The planned development of libraries in Malaysia only began in the late 1960s. In that early period, the Malaysian Library Association played a leading role by initiating and submitting to the Government a *Blueprint for Public Library Development in Malaysia* (1968) which provided a plan for the development of public libraries and outlined the role of the National Library.

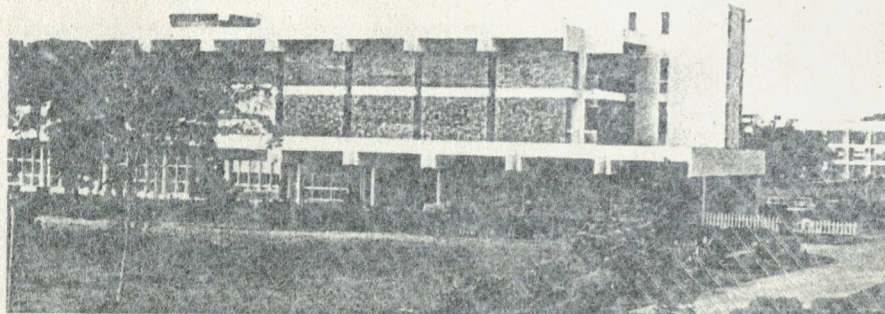
Libraries in Malawi (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (kwacha)	Population served	Professional staff	Total staff
National	1	1	31,000	7,000	--	2	4
Academic	4	4	182,000	400,000	3,500	22	97
Public	6	259	130,000	410,141	9,922	17	--
School	59	59	--	--	9,915	--	--
Special	13	13	--	--	--	7	--

National Library. The National Library, established under provisions of the National Library Act of 1972, formed part of the Federal Department of Archives and National Library until 1977, when it was separated from the Archives and established as a Federal Department. The primary objectives of the National Library include the collection, documentation, and preservation of library materials relating to Malaysia and its people; the provision of facilities for the use of library materials; the promotion of public library development; and the coordination of the development and use of the library resources of the nation. Since 1982 The National Library has been placed under the purview of the Ministry of Culture, Youth, and Sport, and it provided mainly bibliographic, reference, and lending services. Also provided were training and conservation facilities, as well as a consultancy service.

With a collection of 380,000 volumes by 1984, acquired through purchase, exchange, donation, and legal deposit, it ranks as one of the country's major libraries. It publishes the *Bibliografi Negara Malaysia* ("Malaysian National Bibliography") issued quarterly from 1967 with annual cumulations; *Indeks Suratkhabar Malaysia* ("Malaysian Newspaper Index") from 1969 (twice yearly); and *Indeks Persidangan Malaysia* ("Malaysian Conference Index") from 1984 (annual).

Public Libraries. The National Library plays a leading role in the development of public libraries within the country. Public library services in Peninsular Malaysia, in accordance with *Blueprint* recommendations, are provided by State Public Library Corporations established under state laws. These Corporations function in all the Peninsular states. The National Library and the Malaysian Library Association are represented on these Corporations. In Sabah, public library services are constituted as a Department of the State Government, and in Sarawak they are provided by state and local government authorities. While the federal government provides funds through the National Library for public library development in Peninsular Malaysia, all recurrent expenditures are met by state governments. In Sabah and Sarawak, however, both capital development and recurrent expenditures are met by the state governments. Although public library services are now provided in all states, services are largely urban-oriented



National Library of Malaysia

Universiti Pertanian
Malaysia Library, founded
in 1971.

but are being actively extended to the rural areas. However, the use of public library services was still minimal in the mid-1980s, only 11 percent of the literate population being regularly served as members of the public library system. In 1983 approximately 4,500,000 books were borrowed through the country's public libraries.

Academic Libraries. Academic libraries comprise the libraries within the country's seven universities, technical colleges, colleges of further education, and teacher training colleges. Particularly outstanding are some of the university libraries. These include the University of Malaya (established 1959), Universiti Sains Malaysia (1969), Universiti Kebangsaan Malaysia (1970), Universiti Pertanian Malaysia (1971), and Universiti Teknologi Malaysia (1972). Two newer universities are the Universiti Utara Malaysia (1984) and the International Islamic University (1983), which is co-sponsored by a number of countries. On the whole, university libraries are better funded and staffed than other libraries in the country. University library collections vary considerably in size and ranged in the mid-1980s from 730,000 volumes in the University of Malaya, 361,600 in Universiti Sains Malaysia, and 312,100 in Universiti Kebangsaan Malaysia, to 184,400 in Universiti Pertanian Malaysia and 116,400 in Universiti Teknologi Malaysia. The collections in the two newer universities are still relatively small. Of the technical colleges, the more outstanding were the Mara Institute of Technology with 191,500 volumes and the

Libraries in Malaysia (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (Malaysian dollar)	Population served	Professional staff	Total staff
National	1	3	333,962	5,102,400	607,407 ^a	76	239
Academic	45	--	2,786,143	--	54,548	270	1,316
Public	58	642 ^b	2,164,479	11,906,540	6,259,685 ^a	83	843
School ^c	14	6,862 ^d	12,336,000 ^e	6,500,000	3,392,539	156	7,202
Special	165	--	7,399,000 ^f	--	--	180	810
			1,275,458				

^aLiterate population.

^b42 branch, 30 mobile, 570 mobile stops.

^c1983 data.

^dSchools.

^eIn primary schools.

^fIn secondary schools.

Tungku Abdul Rahman College with 87,000 volumes. The 16 teacher training college libraries vary in size, with collections ranging from 15,000 to 21,000 volumes.

Cooperation between the university libraries and the National Library is well established. The National Library and most of the university libraries are active participants in the MALMARC (Malaysian MARC) System with Universiti Sains Malaysia functioning as coordinating center. The MALMARC database contains more than 200,000 records, and the system generates institutional catalogues (in COM) and accession lists as well as the union catalogue. A serials database called PERPUNET with wider institutional participation is also maintained. Online access to national databases was planned following the introduction of a public data network by the Telecommunications Department at the end of 1984. University libraries and the National Library are also linked by telex.

School Libraries. There are over 6,000 schools in Malaysia, many with their own libraries. School library collections on the whole are relatively small and do not exceed 3,000 volumes. Malaysian school libraries are managed by teacher-librarians who have basic educational qualifications with some library training. School libraries receive an annual grant based on student enrollment; they also charge library fees. Overall supervision of school libraries is provided through school library organizers, many with both teaching and library qualifications, who are attached to State Departments of Education. National coordination and supervision is provided by the School Library Unit within the Schools Division of the Ministry of Education. In 1979 the Malaysian Library Association submitted to the government its *Blueprint for School Library Development in Malaysia*. The major recommendations of the *Blueprint* began to be progressively implemented thereafter.

Special Libraries. Special libraries represent one of the fastest-growing library sectors in the country. There were nearly 165 special libraries in the mid-1980s, although many are relatively small. About 65 percent of special libraries have collections of fewer than 5,000 volumes. The largest special libraries are found in the research institutes. They include the Rubber Research Institute (97,000 volumes), the Forest Research Institute (60,000), the Malaysian Agricultural Research and Development Institute (40,000), and the Institute for Medical Research (20,000). Other large special libraries include the Ministry of Agriculture (80,000), the Dewan Bahasa dan Pustaka (58,000), the Bank Negara Malaysia (26,000), the Asian and Pacific Development Center (25,000), and the National Institute of Public Administration (16,000). Special libraries are largely staffed by professionally qualified librarians. Special librarians in government libraries serve in a Common User Library Service under the purview of the National Library.

The Profession. The Malaysian Library Association, established in 1955 as the Malayan Library Group, is the only association for professional librarians in the country. Professional education for librarians is provided by the School of Library and Information Studies, Mara Institute of Technology.

REFERENCES

- Hedwig Anuar, *Blueprint for Public Library Development in Malaysia* (1968).
Access to information: Proceedings of the Fifth Congress of South-east Asian Librarians, Kuala Lumpur, 25-29 May, 1981, edited by D. E. K. Wijasuriya, Yip Seong Chun, and Syed Salim Agha (1982).
 Lim Huck Tee, *Libraries in West Malaysia and Singapore: a Short History* (1970).
 D. E. K. Wijasuriya and others, *The Barefoot Librarian: Library Developments in Southeast Asia with Special Reference to Malaysia* (1975).
 B. A. J. Winslade, *Rancangan pembangunan perpustakaan sekolah di Malaysia; Blueprint for school library development in Malaysia* (1979).

D. E. K. WIJASURIYA

Malclès, Louise-Noëlle (1899-1977)

The career of Louise-Noëlle Malclès as a bibliographer embraced the three elements of practicing, teaching, and writing. They did not, however, fall into separate or even overlapping periods of her life, but were for the most part carried on simultaneously in Paris. There is no doubt that Malclès stands as one of the most distinguished practitioners and teachers of bibliography in 20th-century Europe.

Born in the south of France on September 20, 1899, she was the daughter of a professor of physics at the Faculty of Sciences of the University of Clermont-Ferrand, where she later received her university training. Her long association with the library of the Sorbonne (now designated one of the Inter-University Libraries in the Réunion des Bibliothèques Universitaires de Paris, reflecting the restructuring of the old University of Paris) began in 1928 and lasted until 1962. Working first under the Hispanist Louis Barrau-Dihigo and later Germain Calmette, Malclès established the Salle de Bibliographie (Bibliography Room) and presided over its collections and services to students, faculty, and scholars for many years. Separate from the main reading room of the Sorbonne Library and not a main reference/reading room as found in American university libraries, this room, accommodating perhaps 20 readers, contains a carefully selected but wide-ranging group of bibliographical tools (such as bibliographies, published library catalogues, guides to the literature, and periodical indexes) both of general nature and of individual disciplines, which Malclès and her small staff used in helping a generation of persons doing research. This high-level service was geared primarily to bibliographical and documentation needs rather than to general reference questions, although the distinction often blurred in the interest of providing help. Here, too, in the 1950s—as time permitted—Malclès did some of the work on the successive volumes of *Les Sources du travail bibliographique*.

In the 1930s she spent time in Germany (Leipzig and Berlin) studying German national bibliography and union catalogues. In the 1950s she visited a number of European cities (Rome, Lisbon, Madrid, Brussels, Amsterdam, and The Hague) prior to preparing the reports on bibliographical activities for Unesco.

Attached to the Direction des Bibliothèques de France in the last years of her professional career, she had responsibility for special projects for strengthen-

found scattered in various places, but thanks to the inexperience and carelessness of excavators or local handlers and arrangers we do not know from which of the two palaces involved any given fragment came. It can hardly be doubted that there were once a definite order and supervision, but we have neither knowledge of them nor any basis for reconstructing them.

Extraordinary care led to the discovery of subscripts on the tablets. Besides the ownership stamp, "Palace of Assurbanipal, King of the World, King of Assyria," precise data were furnished, the equivalent of book or manuscript description. It is now agreed that they were not created by Assurbanipal or his staff but borrowed from available models. These practices had been known at the state (?) library of the Hittites at Boghazköi, and it is no longer doubted that the seeds were planted in oldest Babylon.

That Assurbanipal was collecting systematically is plain from the tablet and series indexes, indexes that furnish at the beginning of each tablet in a series the number of lines on each tablet, and series indexes that bring together the titles of various series whose contents are related. The extant collections do not include index tablets of a bibliographical character or catalogues.

For indicators there were plain, oddly shaped little clay markers, which bear nothing but a series title, perhaps to facilitate finding the series, and which lay on the pile of series items or on the reed or clay receptacles that contained them. Such a receptacle was called *girginakku*, a designation that seems to have carried over to the whole library-like *biblio-theke*; at least the chief was called *rab girginakku*, or supervisor thereof. It may be that the scion of an old scholarly family, whose tablet collection Assurbanipal apparently acquired, was the actual organizer and first director of the royal library.

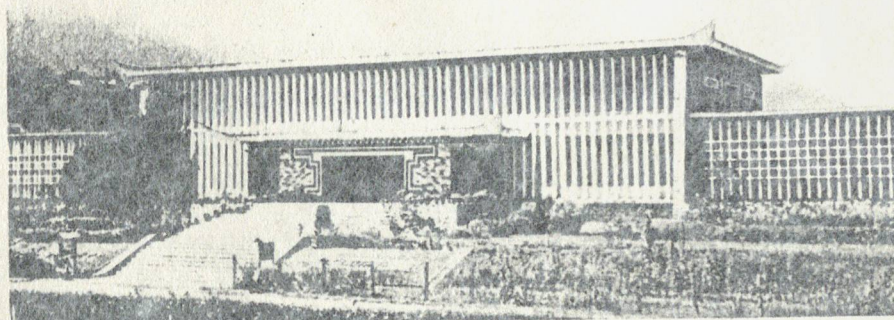
REFERENCE

Ernst Posner, *Archives in the Ancient World* (1973).

SIDNEY L. JACKSON
(d. 1979)

Nepal

Nepal, the only Hindu kingdom in the world, is a landlocked country in the Himalaya Mountains, shaped like a rectangle about 800 km. long and 200 km. wide. It lies between two powerful nations of Asia, China on the north and India on the south. Population (1984 est.) 16,104,000; area 147,181 sq.km. More than 93 percent of the total population live in rural areas and are engaged in agriculture, the



Tribhuvan University Library

backbone of Nepal's economy. The official language is Nepali.

History. Nepal has been a center of learning since ancient times. The low rate of literacy (25 percent) shows Nepal's lack of development, but interest in education has a long history there. It is mentioned in ancient stone inscriptions and early records preserved in the monasteries and temples. Sanskrit education flourished in Nepal before the 6th century, and Nepal is believed to have been a repository of untold treasures of manuscripts on Tantrism, philosophy, Sanskrit grammar, astrology, rituals, religion, medicine, and Vedic literature.

Nepal can be called a country with ancient library traditions, yet education and libraries could not develop in Nepal under the autocratic Rana rule from 1846 to 1951. Books, magazines, newspapers, the radio, and other media of communication and academic study were banned for the majority. Even expressing the need for a library was forbidden and could lead to punishment. In 1929 a great Nepali poet, Laxmi Prasad Devkota, and some of his friends were punished for their decision to establish a public library in Nepal. Nevertheless, public libraries came into existence in various places in Nepal as forerunners of the revolution of 1950.

After 1950, many schools and colleges were opened and so-called public libraries were established in the hope of giving free access to knowledge. But library services in a modern sense were introduced in Nepal only in 1959 with the establishment of a Central Library under an agreement between the government of Nepal and the United States; unfortunately the agreement came to an end within a short period of time.

Tribhuvan University Central Library was established in Kirtipur, Kathmandu, and the whole collection of the Central Library was handed over to it in 1962. Tribhuvan University Central Library

Tribhuvan University Library in Kirtipur. It is Nepal's principal academic library, and the country's only library in a separate building of its own.

Libraries in Nepal (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (rupee)	Population served	Professional staff	Total staff
National	1	--	70,000	344,500	--	3	20
Academic	120	--	495,403	3,747,000	67,518	63	339
Public	400	--	--	--	--	--	--
Special	71	--	293,944	872,000	--	13	157

P

The Islamic Republic of Pakistan, a federal republic in South Asia, was established on August 14, 1947, as a result of partition of the subcontinent. East Pakistan broke away in December 1971 to form the independent state of Bangladesh. Pakistan is bordered by Afghanistan and the U.S.S.R. on the north, the People's Republic of China on the northeast, India on the east and southeast, the Arabian Sea on the south, and Iran on the west. Population (1984) 91,880,000; area 796,095 sq.km. The national language is Urdu, but English continues to be the official language.

History. Although Pakistan is a young country, the areas that it includes have had a long history and gained eminence for library facilities far and wide. Even in the immediate past, under British rule, Lahore, now the capital of Punjab, was regarded as a Mecca of libraries. The Punjab University inaugurated the first library course at university level in 1915 under the directorship of an American librarian, Asa Don Dickinson (1876-1960), who had taken his training under Melvil Dewey. His *Punjab Library Primer* (University of the Punjab, 1916) served as a manual and reader for librarians and library science students alike.

The Punjab Library Association, founded during Dickinson's one-year stay in Lahore, was short-lived, but the All-India Conference of Librarians, convened by the government of India in Lahore January 4-8, 1918, paved the way for the organization of the Librarians Club. The club hosted the seventh All-India Public Library Conference in Lahore in 1929. The Association was revived after the conference and began publishing a journal, *Modern Librarian*, as its official organ in 1930. It continued publication until partition in 1947.

The riots that occurred at the time of the partition and the mass influx of refugees from India in August 1947 had adverse effects on the new country's library resources. The library school, the Punjab Library Association, and its journal all closed. Four renowned libraries of Lahore, which were then the largest libraries in West Pakistan, were damaged and their services disrupted. They were the Punjab University Library (opened 1906-08, with a collection of 105,295 volumes and 15,000 manuscripts in 1947); the Punjab Public Library (founded in 1884, with a collection of 82,530 volumes and bound journals in 1947); the Punjab Civil Secretariat Library (founded 1885); and the Dayal Singh Trust Library (founded 1908, with a collection of 40,000 volumes in 1947).

Khan Bahadur K. M. Asadullah (1890-1949), the founding Secretary of the Indian Library Association and the former Librarian of the Imperial Library, Calcutta, who was born and educated in Lahore, returned to the city in 1947, but could not help the worsening library situation in the newly emerging country.

Pakistan, therefore, had to start its library development from scratch. The Karachi Library Association was founded in 1949 in Karachi, then the federal capital. A year later a locally based national organization, the Pakistan Bibliographical Working Group, was established. Also in 1950, Dickinson's school was revived in Lahore. 1950.

Library campaigns that followed and the arrival of visiting library experts helped bring about notice-

able changes in attitudes to library service in the mid-1950s. Landmark events were the first post-graduate diploma course at the then federal University of Karachi in 1956, thanks to the efforts of Abdul Moid (1920-84), and the founding of the Pakistan Library Association in 1957, with Abdul Moid as the founding Secretary General.

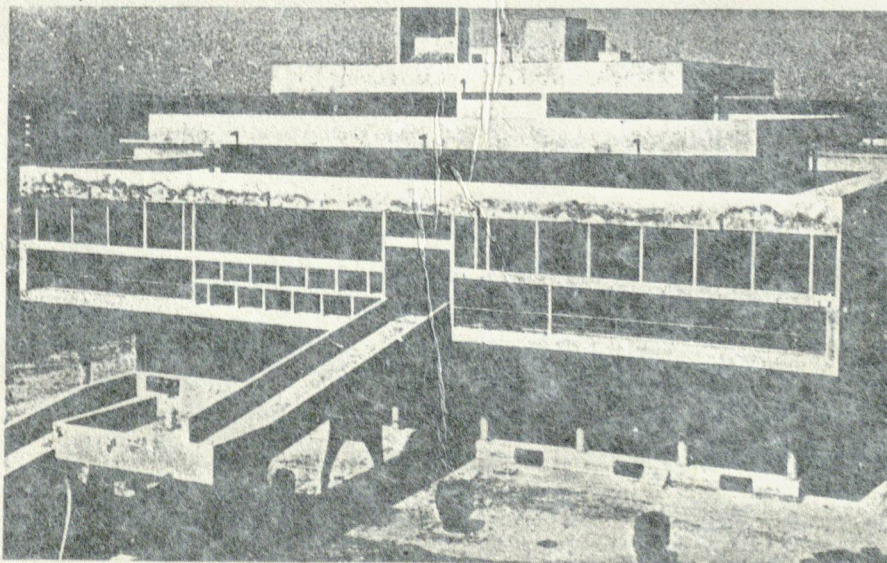
Pakistan librarianship had yet to face many ups and downs. The publication of the Report of the Commission on National Education in 1961 helped place emphasis on much-neglected public libraries in the 1960s, but national development during that period was oriented towards research and industry, and libraries in those sectors also tended to get more development attention.

The Education Policy (1972-80) on which work was started in the later 1960s once again created enthusiasm for the development of public libraries in the country. But the separation of East Pakistan in 1971 and the political unrest in 1977 forestalled any lasting developments in public library service. The appointment of a Cabinet Committee for Reading Libraries, headed by the Federal Minister of Finance, marked a significant breakthrough in 1981.

National Library. Ad hoc functions of a national library are performed in part by the Department of Libraries in Islamabad (founded in 1949 in Karachi), the Liaquat Memorial Library in Karachi (founded in 1950), and the Central Secretariat Library in Islamabad (founded in 1951 in Karachi). Funds for the construction of the National Library of Pakistan, to be located in Islamabad, were made in each Five Year Plan from 1965, but construction of the building was not started until the later years of the Fifth Five Year Plan (1978-83). Builders hoped to complete the library in mid-1985.

By 1984 a collection of 15,000 volumes had been accumulated for the national library under the Copyright Ordinance of 1967. In addition, some 22,000 local and foreign publications were also acquired. The library was designed to have the facilities of a first-rate auditorium for cultural and educational functions in the federal capital and 15 research rooms, 500 seats for readers, and modern microfilming and computing services.

University of Karachi



The Dr. Mohamed Husain Library, University of Karachi.

played a leading role in the library movement in Nepal from 1963.

National Library and Archives. The Nepal National Library was established in 1955 with the private collection of the royal priest Pandit Hemraj Pandey bought by the royal government. It is located at Pulchok, Patan, in Kathmandu Valley. It contains 70,000 books in 11 languages. The library has not been able to function as a national library should. It is more like a museum than a library.

The Nepal National Archive has a long history. It began in the time of the Malla kings more than two centuries ago. The Bir Library, the oldest library of Nepal, was renamed the Nepal National Archive. At Thapathali, Kathmandu, it has 65,750 manuscripts; of these, 12,000 are on palm leaves. It has many valuable manuscripts that are not available in any other part of the world. These manuscripts were microfilmed under a joint Nepal-German Manuscript Preservation Project.

Academic Libraries. Schools and colleges lack library facilities. Collections of a few hundred or a few thousand books can be found at some institutions, but without much organization. Tri-Chandra Campus Library, established in 1918, is the oldest among academic libraries. It has about 23,300 volumes. Tribhuvan University, the only University of Nepal, has 69 campuses. All have library services of a sort. Their collections consist of from 5,000 to 15,000 volumes. With foreign aid projects, appreciable attention has been given to library services on technical campuses such as those on agriculture, engineering, medicine, and forestry.

Tribhuvan University Central Library in Kathmandu is the biggest systematically organized library in the country. Starting from a 1200-book collection in 1959, it had 125,000 volumes by the mid-1980s. It promotes the importance of improving library services for national development, serves as the depository library of the UN for Nepal, and cooperates in other international activities. The Library has published the *Nepalese National Bibliography* since 1981. It also issues occasional bibliographies on various topics of interest.

Public Libraries. It is said that Nepal has 400 public libraries. But they can hardly be called true public libraries judged by professional standards because of deficiencies in objectives, space, budget, books, and newspaper collections. They have only randomly-donated collections and often have difficulty in keeping open a few hours a day or a week at a time. Pradipta Library started in 1946 in Kathmandu, Dhawal Library established in 1936 in Palpa, and Adarsh Library founded in 1946 in Biratnagar are among the leading public libraries. The collections of public libraries in Nepal range from 200 to 10,000 volumes.

School Libraries and Media Centers. Most of the schools do not have libraries. The few that exist cannot be called school libraries in any real sense. Schoolchildren buy textbooks for their use. Some foreign-aided schools, such as Budhanilkantha School, St. Xavier's, and St. Mary's High Schools, give good attention to school library services.

Special Libraries. There are more than 70 libraries in various government departments, research organizations, and other organizations. Notable

among them are Madan Puraskar Pustakalaya, the Library of APROSC (Agricultural Projects Services Centre), the Department of Botany Library, the Rastriya Bank Library, and the Library of the Trade Promotion Centre. Madan Puraskar Pustakalaya is well known for its good collection on Nepali literature and languages. APROSC Library serves as the National Agricultural Documentation Center.

The Profession. The library profession has not been fully recognized in the country. Nepal has no library school. Professional librarians are trained from abroad. Tribhuvan University Central Library organizes training courses for working librarians. There were about 75 professional librarians in the country in the mid-1980s.

REFERENCES

- E. W. Erickson, "Libraries in Nepal," *Wilson Library Bulletin*, (1961), on the library scene in Kathmandu in the late 1950s. John L. Hafenrichter, "Planning Document: Library Development Activity, Central Library," Kathmandu, 1961.
Shanti Mishra, "Library Movement in Nepal," *Unesco Bulletin for Libraries*. (January-February 1974); summarizes library history.

SHANTI MISHRA

Netherlands

The Kingdom of the Netherlands lies on the North Sea, bounded by Belgium on the south and the Federal Republic of Germany on the east. Population (1984 est.) 14,437,000; area 41,509 sq.km. Part of the country is below sea level. The official language is Dutch.

History. The contents of the many medieval monastery libraries are widely scattered and mostly known only by their contemporary catalogues; a notable exception is the library of the Carthusian monastery at Utrecht, now in the local University Library. The only late medieval library still extant is the Librije at Zutphen, built as an annex of the Walburgis church in 1563. The number of Dutch, mostly late medieval, manuscripts described in the *Bibliotheca Neerlandica Manuscripta*, a central catalogue in the University Library at Leiden, totals more than 12,000. The products of the earliest printing presses set up in Holland, 1566-72, are known as "prototypography." The first dated book was printed in Utrecht in 1473. Up to 1,500 Dutch presses produced 2,100 editions. The postincunabula (1501-40) are well documented.

With the coming of Protestantism, secularization of the properties of the monasteries gave rise to city libraries that in Amsterdam, Utrecht, and Groningen developed into university libraries. In the 17th century the firms of Blaeu, Elsevier, and others were the printers for the whole of Europe, specializing in scientific and cartographic works.

A national library was founded in 1798 after a political revolution. Two of its librarians, J. W. Holthrop (1806-1870) and M. F. A. G. Campbell (1819-1890), laid the foundations of incunabular studies. The number of incunabula in Dutch libraries is about 8,000. P. A. Tiele (1834-1889), who worked in the university libraries of Amsterdam, Leiden, and Utrecht, was important as a bibliographer and cata-

The *National Bibliography*, to be published annually and also to be housed in the new library, was published in Karachi at annual but irregular intervals for the years 1962-77, with gaps for 1965-67 and 1970-71. The *Bibliography* for 1978 was published in Islamabad, but no further volumes have followed.

Archival materials in Pakistan are maintained at the federal and provincial government levels. The National Archives of Pakistan is in Islamabad. The Ministry of Foreign Affairs maintains its archives independently. The National Archives of Pakistan also collects and maintains private collections, including Quadi-e-Azam papers and a Lakha collection on Quadi-e-Azam. A number of catalogues of Quaid-e-Azam papers have been published by the National Archives. It will also house the Freedom Movement Archives, housed in the Dr. Mahmud Husain Library at Karachi University.

Academic Libraries. University libraries increased from 15 in 1978 to 20 in 1981. Two libraries (the NWFP University of Engineering and Technology, Peshawar, and the University of Azad Jammu and Kashmir, Muzaffarabad) were opened in 1980 and three (the Islamic University, Islamabad, the NWFP Agricultural University, Peshawar, and the Aga Khan University of Health Sciences, Karachi) in 1981.

Of these universities, 3 are federal, 16 are provincial or state institutions, and 1 is private. These universities (except the private Aga Khan University of Health Sciences) are funded by the University Grants Commission in Islamabad.

By and large, these university libraries constitute an advanced group of libraries in the country. Together (but excluding the University of Azad Jammu and Kashmir, which does not maintain a central library) they hold a sizeable collection of some 2,406,300 volumes (26.8 percent of the collections of all types of libraries in the country). For 34,500 students in 1978, 15 university libraries then held a collection of 1,608,500 volumes. By the early 1980s collections registered an increase of 49.6 percent in bookstock and catered to the needs of 47,400 students. Thus they had been able to catch up with the student growth of 37.4 percent over the period.

Notable central university library collections are at the Universities of Punjab (founded in 1882 and opened 1906-08; 309,970 volumes); Karachi (founded in 1952; 240,000 volumes); and Sind (founded in 1948; 137,813 volumes; with 50,000 volumes at Shah Latif Campus, Khairpur, 70,000 volumes at the Institute of Sindology, Jamshoro; and the Agricultural University, Faisalabad (founded in 1961; 118,000 volumes).

Libraries in Pakistan (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (rupee)	Population served	Professional staff	Total staff
National	1 ^a	--	37,000	21,490,000	84,253,000	--	--
Academic							
University	74 ^b	--	2,406,300	16,586,300 ^c	47,400	223	772 ^d
College	410 ^e	--	3,025,300	34,747,500	472,400	246	586 ^f
Public	136		1,340,500	12,947,900	84,253,000	85 ^g	547 ^h
		18 + 11 reading rooms ^{g,h}					
School	343 ⁱ	--	690,500	--	235,100	18	--
Special	178 ^k	--	1,368,000	--	--	90 ^l	358
Pakistan National Center Libraries	25	--	87,500	93,800	4,300	50	121
Box Libraries	55 ^m	--	15,000	--	--	--	--

^aPart of the functions of a national library are performed on an ad hoc basis by the Department of Libraries, Liaquat Memorial Library, Karachi, and Secretariat Library, Islamabad. The building of the National Library of Pakistan was under final stages of construction in 1984.

^b19 universities and 55 constituent colleges/institutes; the University of Azad Jammu and Kashmir has no central library.

^cFigures for four or five universities are not available.

^dLargely of the central library except in a few cases, such as Punjab, Quaid-e-Azam, and Aga Khan.

^eOut of 682 colleges in Pakistan, figures for 315 colleges are given. All the colleges (69) in Karachi are included.

^fFigures for colleges in Karachi only.

^gBranches in Karachi.

^hOne reading room in Karachi and 10 in Peshawar.

ⁱFor 106 public libraries only.

^jOut of 500 Secondary Schools in Karachi, figures for 335 Secondary Schools only are given here. Also included are 8 schools in the interior of Sind.

^kOut of 242 libraries, figures for 178 libraries are available.

^lFigures for 72 special libraries are given.

^mSponsored by the Ministry of Local Government and Rural Development in cooperation with the Asia Foundation, the experimental phase of box libraries to Union Councils was completed in 1983.

Sources: Anis Khurshid, *The Status of Library Resources*, Lahore, Student Services, 1982 [1984]; Nasim Fatima, *Secondary School Library Resources & Services*, Karachi, Library Promotion Bureau, 1984; Hasam Akhtar, *Kalyati Kutub Khanay: ek Jacza* (Urdu; College Libraries: a Survey), Lahore, Directorate-General of Public Libraries, Punjab, 1982; and Mah Talat and Zubair Malik's unpublished master's theses submitted to the Department of Library and Information Science at the University of Karachi in November 1981 relating, respectively, to the library resources of college libraries in Karachi and those of all types of libraries of Pakistan.

The Punjab University Library had a rich collection of manuscripts (19,931) in Arabic, Gurmukhi, Persian, Sanskrit, and Urdu. A three-volume catalogue of the manuscripts in Arabic, Persian, and Urdu (1942-48), a two-volume catalogue of those in Sanskrit (1932-41), and a one-volume catalogue of those in Arabic alone (1982) have been published. The special collections of the library are renowned equally for their rarity and richness. A three-volume catalogue of the Sherwani collection was published from 1968 to 1973.

The Dr. Mahmud Husain Library at the University of Karachi is known for the size of its collection of relatively modern literature. It has also published a number of catalogues of its holdings in various forms, subjects, and areas of national interest. The Freedom Movement Archives, housed in the Library, contain about 100,000 documents and pieces pertaining to the All-India Muslim League and the Freedom Movement. These documents were in the process of transfer in the mid-1980s to the National Archives of Pakistan in Islamabad. The University has also acquired personal collections of national leaders and freedom fighters such as Sardar Abdur Rab Nashtar and Haji Abdullah Haroon that will be retained in the University. The University is also considering a proposal for the establishment and maintenance of its own university archives. The rare books and manuscripts in the Sind University Library and those of the Institute of Sindhology are also of great research value to the history and culture of the country.

The building of the Dr. Mahmud Husain Library, at Karachi University, completed in 1964, stands out as the premier library building of architectural significance in the country.

Public Libraries. The concept of a public library was grossly misunderstood in the country until the 1950s. The publication of the report of the Commission on National Education in 1961, requiring local bodies to maintain public libraries and reading rooms directed toward the promotion of reading materials, resulted in a burst of enthusiasm for public libraries in the country. The Education Policy (1972-80), for which a stage was set in the mid-1960s, further promoted the idea of public libraries in the country. A broad-based system adequate to sustain even a small number of public libraries did not come about, however. An exception was the city of Karachi, where a loosely knit system had been evolved. After 1980, and especially after a Cabinet Committee for Reading Libraries was established in 1981, some positive change in the provision of public library service became apparent.

Public libraries grew from just 21 in 1951 to some 136 by the early 1980s. In 1978 there were reportedly some 240 public libraries in the country, but a good number of them were closed because of neglect in maintenance.

Many of the 136 libraries hardly merit the designation "public libraries," but still they are the only libraries accessible to the public at large. These libraries together hold a collection of 1,350,500 volumes (14.9 percent of the country's total collection). For their maintenance, support is provided by governments at the federal, provincial, and local levels. The use of these libraries is minimal.

The Punjab Public Library, Lahore (founded in

1984), holds the country's third largest collection (200,000 volumes) with 1,200 manuscripts in Arabic, Gurmukhi, Persian, and Urdu, of which printed catalogues are available. The Library also maintains a special collection, *Baitul Qur'an*, containing special materials on Qur'anic studies in the form of microfilms and tape recordings.

The Dayal Singh Trust Library (founded in 1908), also in Lahore, is the second largest public library in the country, with 100,000 volumes. It published a three-volume catalogue of its manuscript holdings (1974-82).

Good libraries maintained by the federal and provincial governments include the Liaquat Memorial Library, Karachi, run by the federal government (1950; 93,846 volumes); the Central Public Library, Bahawalpur, run by the government of Punjab (1948; 77,773 volumes); and the Khairpur Public Library, Khairpur, run by the government of Sind (1955; 43,260 volumes). In particular, the Central Public Library, Bahawalpur, is known for its good library services, including those for children. The Quaid-e-Azam Library, Lahore (1981; 30,000 volumes), in a beautiful garden, Bagh-e-Jinnah, was to be opened to the public as a research and reference library. A directorate-general of public libraries, the only provincial administrative unit of its kind in the country, was established in Lahore in 1981 to administer that library and other public libraries in the province of Punjab.

At the local government level, the Karachi Metropolitan Corporation maintains the largest number of public libraries in the country. The system, although weak in coordination of resources and services, comprises one central library, the Karachi Metropolitan City Library (1851; 42,115 volumes), and 18 branch libraries of varying sizes. These libraries together hold a collection of 158,000 volumes.

A seven-member Technical Working Group, headed by Amis Khurshid, was appointed in 1982 to conduct a survey of public library facilities in Pakistan. Under a directive of the Cabinet Committee for Reading Libraries, the group is to prepare the "design and size of a national system of public libraries in Pakistan."

School Libraries. These libraries are the most neglected libraries in the country. Libraries at the primary school level are almost nonexistent. Complete statistics for the libraries at the secondary school level are not available, and those available for the city of Karachi are only partial. Out of 500 such schools, statistics for 335 schools showed that in the early 1980s a collection of 687,900 volumes was available in the city for 235,100 students. The library collections varied from 17,000 volumes to fewer than 100 volumes; 61 libraries contained collections of 500 to 1,000 volumes and another 61 libraries between 1,001 and 2,000. The situation in other parts of the country is no better.

Special Libraries. Special libraries, in quality of resources and in accessibility, come next to academic libraries in Pakistan. They contained 1,368,000 volumes in the mid-1980s. Some of these libraries were established in the 1800s, including the Punjab Civil Secretariat Library, Lahore (founded in 1885; 60,000 volumes) and the Punjab Textbook Board Library, Lahore (1892; 32,000 volumes).

These libraries numbered 132 in social sciences

and 110 in sciences and technology. A large concentration of the libraries in both fields is in Punjab, mostly in Lahore.

The largest collections in these libraries after the Punjab Civil Secretariat Libraries are held by the State Bank of Pakistan Library, Karachi (1949; 55,000); the National Bank of Pakistan Library, Karachi (1965; 40,000); the Anjuman Taraqq-e-Urdu Library, Karachi (1952; 36,000); the High Court Bar Library and the Hamdard Foundation Library, both in Karachi (1940 and 1948, respectively; 35,000 volumes each); and the Islamic Research Library, Islamabad (1960; 30,000 volumes). Two libraries in Karachi, the Patent Office Library and the Pakistan Standards Institution Library, hold 918,957 and 25,000 patents respectively. The Sandeman Public Library, Quetta (1856) is also a depository for patents.

In the field of science and technology, the Pakistan Scientific and Technological Documentation Centre (PASTIC), replacing the former Pakistan Scientific and Technical Documentation Centre (PANS-DOC), which was founded in 1957 in Karachi under a Unesco subsidy, from 1974 became a self-contained system without any defined sharing arrangement with outside libraries in the country. Strictly centralized, PASTIC plans to establish a national science reference library at its headquarters in Islamabad. The existing libraries at various regional offices will serve as branch libraries.

For the social and humanistic sciences, there is no documentation center in the country. A privately organized center, the Islamic Documentation and Information Centre (ISDIC), was established in 1982 at the University of Karachi.

The Islamic Library Information Centre (ISLIC) at the Department of Library and Information Science of the University of Karachi was established in 1974 to act as a clearinghouse for information on libraries and books in the Muslim world.

The Pakistan National Documentation Centre, established in Lahore in 1974, started collecting microfilmed materials of India Office Library records pertaining to the history and culture of Pakistan.

Other Libraries. Rental or vending libraries, popularly known as *anna* libraries, continue to grow, largely because of the absence of public libraries at easily reachable locations in cities and, more important, because most of the libraries that do exist have few reading materials that appeal to popular tastes.

The Pakistan National Centres run 25 libraries in various cities of Pakistan under the administrative supervision of the federal Ministry of Information and Broadcasting. Designed on the pattern of the American Center and British Council libraries, these libraries contain some 87,000 volumes for services to about 4,300 members. The size of collections varies from 20,100 volumes in Rawalpindi to 1,029 volumes in Muzaffarabad.

The Hatim Alavi Memorial Library in Karachi (founded in 1977; 2,000 braille books) provides valuable library services to the blind. Some college libraries in Karachi also maintain braille books in their collections.

The Profession. Education. There are six library schools offering courses at the university level leading to the Diploma in Library Science, Bachelor in Library and Information Science, and M.A. in Li-

brary and Information Science. The oldest school is that of the University of the Punjab (founded in 1915; suspended, 1947-50), but the University of Karachi was the first in the country to offer the post-graduate Diploma course (now called Bachelor in Library and Information Science), in 1956, and first to offer an M.A. in Library Science (now called M.A. in Library and Information Science), in 1962. It offered the Ph.D. in Library Science from 1967. The school produced more than 900 graduates.

Other universities offering the M.A. in Library Science are those of the Punjab (1974) and Sind (1974). The University of Peshawar offered a diploma course from 1960. Undergraduate courses largely designed for user education were started in junior colleges in 1976 and at the bachelor's level at one degree college in Karachi in 1982.

Associations. The first library associations to be founded in the country were the Punjab Library Association (1948) and the Karachi Library Association (1949). The former manages to survive, although it remained suspended for a number of years in the early 1950s, but the latter closed in 1969. The Pakistan Bibliographical Working Group, founded in 1950 as a result of a Unesco-Library of Congress survey of bibliographical activities throughout the world, still exists after many slack years. The *Pakistan National Bibliography* (1947-61) is its important contribution. Two fascicles of this *Bibliography*, listing materials on General Works, Philosophy, Religion, Law, and Languages, were published in 1972-73 by the National Book Centre of Pakistan.

The Pakistan Library Association (founded in 1967) is the only association in the country that is active in the profession. It rotates its headquarters every two years to one of the capital cities. It organizes annual conferences and publishes proceedings. The membership of the Association numbered more than 600 by 1982. The Association also publishes an irregular *Newsletter*. Mahmud Husain (1907-75), an eminent historian and educator of the country, led the Association until 1973 except for a few years in the mid-1960s. Under his leadership the Association was able to campaign effectively for the idea of library service in the country.

In 1960 the Society for the Promotion and Improvement of Libraries (SPIL) was established under the dynamic leadership of a noted philanthropist, Hakim Muhammed Said (1920-). The Society held a number of seminars, conferences, and workshops from 1961 to 1974 and published their proceedings and thus was also instrumental in creating awareness of the need for library service in the country. From 1975, however, the Society was inactive.

The Department of Libraries was founded in 1949 as a part of the Federal Ministry of Education. It was a subordinate branch of the Department of Archives and Libraries, under an archivist, and was taken over by a librarian in 1972, after the separation of East Pakistan. Thereafter, it continued to look after library affairs exclusively, but even that change failed to provide the needed library leadership in the absence of a national library.

REFERENCES

Zahiruddin Khurshid, *Ten Years' Work in Librarianship in Pakistan, 1963-1972* (1973).

traliens made of his overseas achievements and the small encouragement they gave him to develop his collection further, compensated only by a belated appointment as C.M.G. in 1916. Predeceased by his wife on May 10, 1915, Petherick died in Melbourne on September 17, 1917. He is commemorated today in the Petherick Reading Room of the National Library of Australia.

REFERENCE

The papers and correspondence of E. A. Petherick are held in the National Library of Australia, Canberra.

C. A. BURMESTER

Philippines

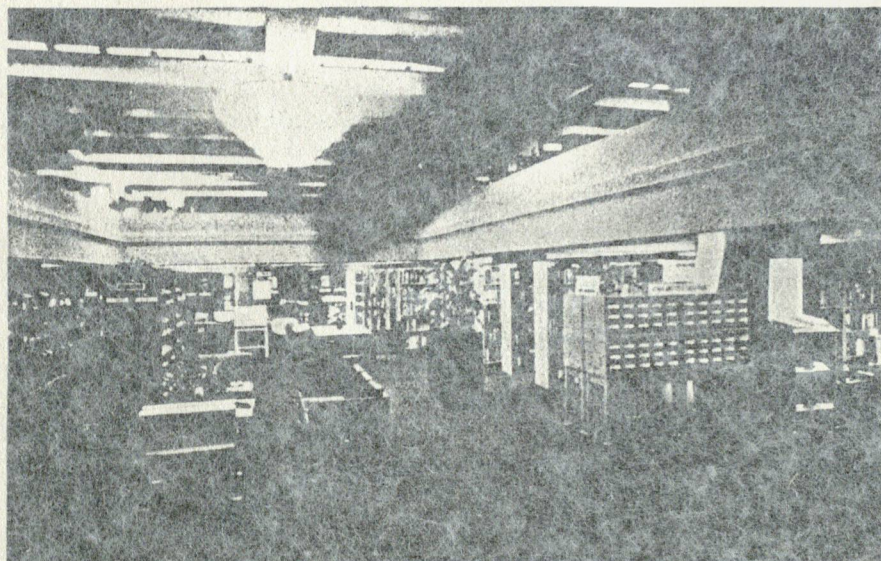
The Philippines, on the western rim of the Pacific Ocean, is an island republic of 7,107 islands. Population (1984 est.) 53,000,000; area about 300,780 sq.km. English and Filipino are the official languages, but there are more than 120 Philippine languages.

History. Philippine script can be found in specimens of writings used by the Tagbanwa of Palawan and the Mangyans of Mindoro, in early Spanish works published in the country, and in pre-Spanish artifacts such as clay pots and burial jars dating from the 14th and 15th centuries. The Filipino alphabet and script has a Hindu-Buddhist affinity but there is no extant pre-Hispanic written body of literature. Epics, poems, and songs were transmitted by oral tradition. Ancient Filipinos wrote on bamboo and other plant materials, using knives to scratch the characters.

Printing was introduced in Manila in 1593. Father Francisco de San José was the first to use a printing press in the provinces, in 1610, with Tomás Pinpin as his first Filipino printer.

The earliest libraries were the convent libraries of the Spanish missionaries, built from 1565 when the Augustinian friars began to arrive in the islands. By 1593 the Augustinian Francisco de Ortega reported a total of 72 convents and monasteries; probably all carried on the European tradition of having books and libraries in their religious houses. The Dominicans had the greatest number of books, with some 10,000 volumes besides their archives. Academic libraries began with the founding of the University of Santo Tomás in 1611. Acquisition of books for its library commenced in 1610 with the donation of volumes made by the Archbishop of Manila, Miguel de Benavides, and Diego de Soria, Bishop of Nueva Segovia. Among other libraries established were the Colegio de San Felipe de Austria, Colegio de San José, and Colegio de San Ignacio.

Nonreligious libraries were established toward the end of the 18th century. The first was the Real Sociedad Económica de Amigo del País library in 1781, the Biblioteca Militar in 1846 for the use of the Spanish soldiers, and much later the Museo Biblioteca de Filipinas in 1887 and the small library of the School of Arts and Trades in 1889. The Museo Biblioteca was in essence a national library with a scanty collection of about 1,000 volumes and with only 74 Philippine titles. Don Pedro A. Paterno, its first Director, also published the first library periodical, *Boletín del Museo Biblioteca de Filipinas*, in 1895. Paterno, a lawyer, poet, and statesman, is also the



Theodore F. Welch

author of the law creating the Philippine Library which consolidated all government libraries.

The first library established during the American period was public in nature: a subscription library whose objective was "to create a source of instruction and profitable entertainment for the residents of Manila." The book collection of the American Circulating Library was donated to the Philippine government to become the nucleus of a public library system and a national library through a law approved in 1901. By 1903 the book collection had grown to 21,750 volumes; Nelly Young Egbert served as Librarian and James Alexander Robertson as Director. The first public school library was established in 1907 by Lois Stewart Osborn, an American teacher assigned at the Pampanga High School.

Libraries today vary widely in size, services, resources, and staff. Most libraries continue traditional library methods, but others are rapidly adopting new technology. In the late 1970s computerized information services began to appear, notably at the University of the Philippines at Los Baños (UPLB), the National Science Development Board (NSDB), and the National Library. Still, the rapid development of libraries was hindered by budget cuts, freezing of promotions and appointments, retrenchments, and other measures to combat inflation. In Central Philippines ALBASA (Academic Libraries Book Acquisition Systems Association Inc.) is a cooperative acquisitions project among 56 libraries. In metropolitan Manila the Inter-Institutional Consortium of Southern Manila Area composed of six government and private educational institutions embarked on a shared cataloguing project.

National Library and Archives. The National Library of the Philippines serves both as a repository of the nation's recorded cultural heritage and as a public library through its 493 branch libraries in various cities and towns in the country. It provides leadership among the nation's libraries; serves as a permanent depository of all publications issued in the country; maintains an up-to-date *Philippine National Bibliography*, a *National Union Catalogue*, and other bibliographical services; acquires and makes available

The Asian Development Bank Library in Manila, an extensive book and pamphlet collection on finance and economics.

other types of reference materials; serves as a coordinating center for cooperative activities; and provides library and information services to government agencies.

The *Philippine National Bibliography*, begun in 1974, is a current listing of books published in the Philippines by Filipino authors and of books relating to the Philippines even if published abroad. It lists books, first issues of periodicals, theses and dissertations, government publications, music scores, and conference proceedings. It is published quarterly and cumulated annually.

The Decree on Intellectual Property (the copyright law of the Philippines) and two other presidential decrees are the bases of the national bibliography. The Decree on Intellectual Property (presidential decree 49) requires the deposit of at least two copies of each work published if the copyright claimant wants his work registered with the copyright office of the National Library. Presidential decree 812, known as the Decree on Legal and Cultural Deposit, designates the National Library as the prime depository library for all publications issued in the country, together with four other state institutions. The law requires each publisher to deposit at least two copies of each work at the National Library, as well as a copy each to the University of the Philippines Library in Diliman, Quezon City; the Cultural Center of the Philippines in Manila; the University of the Philippines-Cebu in Cebu City, Central Philippines; and Mindanao State University in Marawi City in Mindanao. Presidential decree 285, aimed at reducing costs and making reading materials available to the broader masses for research and study, requires the deposit of two copies of each textbook or reference book of foreign imprint intended by a publisher to be reprinted and distributed in the Philippines.

Among notable possessions in the National Library are books and manuscripts in the Rizaliana collection, by and about the national hero, José Rizal y Alonso; and original records of the Filipino-American war of 1898-1903 in Spanish and Tagalog, turned over by the United States government to the Philippine government in 1955. The President Manuel L. Quezon papers comprise an estimated 180,000 items, and the President Carlos P. Garcia papers consist of 162,000 items.

The National Archives was a division of the National Library until it was transferred to the Bureau of Records Management in 1958 as the Division of Archives. In 1982 it was renamed Records Manage-

ment and Archives Office. The archival records consist of Spanish and American documents: naturalization papers, citizenship records, civil service records, notarial records, cattle brands, public works contracts, court records, and civil registers. Altogether there are about 13,321,000 items.

Academic Libraries. The Ministry of Education, Culture, and Sports requires each of the 942 institutions of higher learning to have library facilities; 75 are state-supported colleges and universities. There is, however, wide disparity in both human and financial resources as well as in facilities and book collections.

The University of the Philippines Library System, established in 1908, is the largest of the state-supported academic institutions, with a total book collection of 1,141,130 volumes, 19,247 serial titles, and 39,713 pieces of nonprint materials as of 1984. The UPLB Library is the national center for AGRIS (Agricultural Information System); the UP Law Center is the largest and most comprehensive in law literature in Southeast Asia.

The University of Santo Tomás (UST) Library is the oldest university library. It has one of the largest book collections, consisting of 280,000 books, 30,000 serials, and 8,930 nonprint materials. The Ateneo de Manila University Library, founded in 1859 by the Jesuits, also has excellent book and microform collections.

Other notable library buildings and collections are those of the De La Salle University in Manila, the St. Louis University in Baguio, the Silliman University in Dumaguete City, the University of the East in Manila and the Mindanao State University. The University of San Carlos possesses outstanding collections of Filipiniana, Cebuano materials, and the humanities. Generally, private college and university libraries are supported mainly from matriculation and library fees, gifts, and endowments from foreign agencies. The Fund for Assistance to Private Education (FAPE) also gives training grants to libraries in the private educational institutions and provides books to libraries through its Filipiniana Book Enhancement Program.

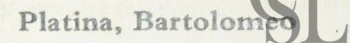
Libraries of state colleges and universities are minimal because a large portion of their budgets goes to personnel for wages and is spent on other maintenance services. Donations are also a source of funding for the libraries.

Public Libraries. In the Philippines, public libraries rely almost entirely on the financial support of their respective local governments, whether city, mu-

Libraries in the Philippines (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (peso)	Population served	Professional staff	Total staff
National	1	8	439,588	9,258,600	6,914,581	155	258
Academic	--	942	5,770,522	--	1,576,500	--	--
Public ^b	--	510	1,599,228	--	24,674,000	180	764
School	--	35,793	--	--	13,464,123	--	--
Special	--	495	3,820,678	--	--	558	821

Sources: The National Library of the Philippines, *Sports Statistical Bulletin*; Directory of NEDA Yearbook; Ministry of Education and Culture and Special Libraries and Information Centers in the Philippines.



sources Research (PCARR) Library in Los Baños, Laguna, was established in 1972. Its resources consist of 4,416 books, 1,100 periodical and serial titles, and 3,014 nonprint materials in the field of agriculture and allied disciplines.

The Dansalan Research Center in Marawi City has an extensive collection of Islamic literature, and the Cebuano Studies Center at the University of San Carlos in Cebu City has a strong collection of Bisayan literature, history, languages, and anthropology.

The Profession. As early as 1914, a library science course was offered at the University of the Philippines with American library pioneers such as Mary Polk and James Alexander Robertson as teachers. The U.P. Institute of Library Science offers library science course at the Master's level. Other library schools offering graduate library science courses are the University of Santo Tomás, University of the East, Philippine Women's University (all in Manila), and University of San Carlos in Cebu City.

The Philippine Library Association, founded on October 22, 1923, by Trinidad H. Pardo de Tavera, former Director of the National Library, is the umbrella organization of some 24 sectoral and local library associations. It publishes the quarterly *Bulletin of the Philippine Library Association* and the *PLA Newsletter*. The Association of Special Libraries in the Philippines publishes the quarterly *ASLP Bulletin*; the Philippine Association of Academic and Research Libraries, its quarterly *PAARL Newsletter*; and the Agricultural Libraries Association of the Philippines, its *ALAP News*, irregularly published.

REFERENCES

Concordia Sanchez, *Philippine School Libraries: Their Organization and Management* (1972).
Filomena Tann, *Philippine Librarianship: the Past and the Future* (1982).
Rosa M. Vallejo, *Philippine Librarianship: a Historical Perspective* (1981).

Platina, Bartolomeo (1421-1481)

Italian librarian and Humanist, Bartolomeo Platina was Vatican Librarian under Pope Sixtus IV.

Two years later Platina was one of the Humanist scholars employed by the papacy to draft social letters

and have participated in one of the University's library training courses.

Many secondary schools have also appointed teacher/librarians to be in charge of their libraries. These are qualified teachers, often graduates, who are required to attend short library courses organized annually by the University.

The Sierra Leone School Library Association produced minimum standards for secondary school libraries, which were endorsed and accepted by the National Conference of Principals of Secondary Schools.

Special Libraries. The establishment of special libraries is based on the provision of library facilities in government administrative departments and ministries. On the country's independence in 1961, foreign embassies and other parastatal institutions were established, many of which have libraries or information centers serving their individual needs. There are about 20 special libraries in addition to libraries in ministries. Many suffer from lack of funds for the purchase of materials, but the collections are useful.

The National Museum Library's basic collection was formed by Captain Butt-Thompson's Library, donated to the museum. This Library serves as a research library for museum users.

The Profession. The Sierra Leone Library Association was founded in June 1970 and the Sierra Leone School Library Association in 1975. The Sierra Leone Library Association holds workshops, seminars, and conferences to further the general development of libraries in Sierra Leone. It published *The Sierra Leone Library Journal* from 1974 (two issues a year) and a *Directory of Libraries and Information Service* in Sierra Leone. The Sierra Leone School Library Association operates through four regional branches. It holds an annual conference.

GLADYS M. JUSU-SHERIFF*

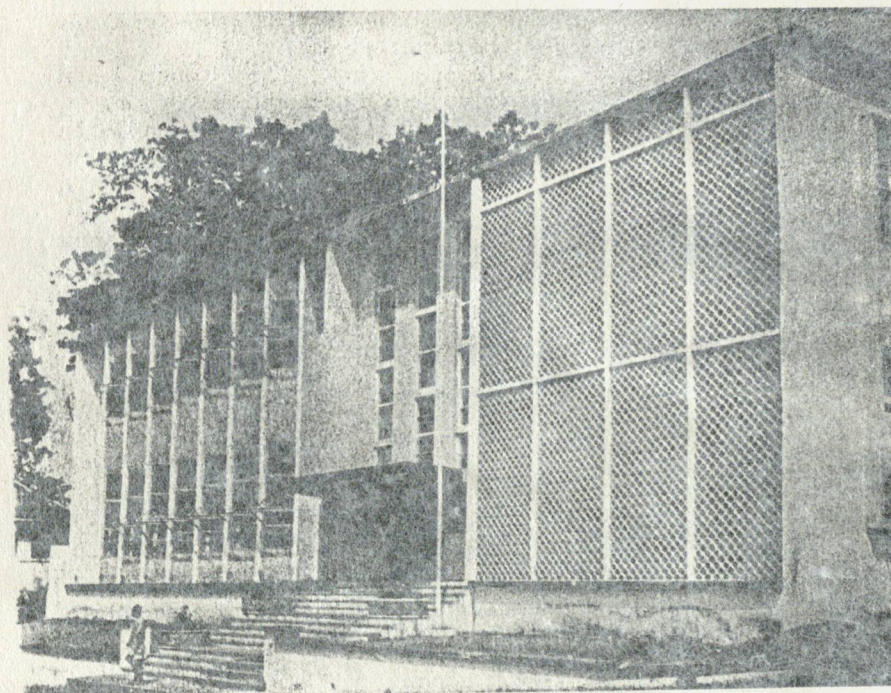
Singapore

Singapore, a republic on the southern tip of the Malay Peninsula in Southeast Asia, includes the island of Singapore and 50 islets. Population (1984 est.) 2,529,000; area 616 sq.km. The official languages are Chinese, English, Malay, and Tamil.

History. The earliest records are presumed to have been printed on palm leaf, bark, clay, sandstone, and other such materials but few examples have survived, the most notable being fragments of the undeciphered *Singapore Stone*, from about the 13th or 14th century and now in the National Museum.

The history of Singapore libraries began soon after the founding of modern Singapore by Sir Stamford Raffles in 1819 as a trading post of the East India Company. In 1823 Raffles founded the Singapore Institution as a school for promising students, with a library open to parents, teachers, and students. It became the forerunner of the Raffles Library, a subscription library that was eventually reconstituted as the National and Public Library of Singapore from 1958.

The earliest special library was that of the Botanic Gardens, founded in 1859. Most special libraries developed after World War II, particularly governmental libraries devoted to economics, foreign affairs,



The Sierra Leone Library Association

education, and industry. There are also a few attached to foreign and regional organizations and to firms in the private sector.

The earliest academic libraries were those of the King Edward VII Medical College (founded in 1905) and Raffles College (founded in 1928), which later formed part of the University of Malaya (founded in 1949). Other academic libraries are those of the Institute of Education (for teacher training) and two polytechnic libraries, the Singapore Polytechnic (founded in 1958) and Ngee Ann Polytechnic (formerly College, founded in 1963). There is also a library attached to the Trinity Theological College.

A number of small school libraries were attached to government and government-aided schools before World War II. School library development was limited owing to priority for the attainment of universal free primary education, which was achieved by 1967, with resources being channelled for school buildings, textbooks and equipment, and teacher training. Pioneer efforts to develop and improve school libraries were made by the Library Association of Singapore from 1962 through courses for teacher-librarians, provision of booklists, and representations to the Ministry of Education. A Standing Committee on School Libraries that operated from 1970 to 1980 drew up recommended standards for secondary school libraries (1972) and for primary school libraries (1974); it organized courses for teacher-librarians and placed bulk orders for school libraries. The first full-time Library Development Officer was appointed by the Ministry of Education in 1973 and by 1984 the School Library Section consisted of five such officers.

The greatest incentive to the development of all types of libraries was the attainment of self-government in 1959, followed by independence in 1965. With the expansion of primary, secondary, and tertiary education since 1959, the literacy rate increased from about 50 percent in 1957 to 84.2 percent by 1980. Previously extant libraries were expanded and

Central Library in Freetown, Sierra Leone, which performs certain national library functions.

new libraries set up to meet educational, informational, and cultural needs.

National Library. The National Library of Singapore was established in 1958 following the passage of the Raffles Library Ordinance of 1957 under which the former Raffles Library, a subscription library, became a public and national library. It was called the Raffles National Library until 1960. The National Library inherited the legal deposit functions that had been in force since 1886 as well as the archival functions that had been added in 1938. With the National Archives and Records Centre Act of 1967, the archives were separated from the Library and administered as a separate department but continued to be housed in the National Library until 1970 and headed by the same Director until 1978. The National Library provides reference services, interlibrary loans and exchanges, reprographic services, and bibliographic services, including the compilation of the national bibliography, periodicals index, and various union catalogues. Its research collection on Southeast Asia is open to local and overseas scholars and researchers.

The National Library's collection totaled 1,860,872 volumes in Malay, Chinese, Tamil, and English in the fiscal year 1983-84, plus more than 97,000 items of special materials, including sheet music and scores, microforms, films, slides, tapes, and recordings.

Academic Libraries. The only university library is at the National University of Singapore. There are two technical colleges, the Singapore Polytechnic and the Ngee Ann Polytechnic (formerly the Ngee Ann Technical College); one teacher training institution, the Institute of Education; and a private theological college, Trinity College.

The University of Singapore was founded in 1949 as the University of Malaya, which amalgamated the former King Edward VII Medical College, founded in 1905, and the Raffles College, founded in 1928. In 1959 the University was split into two autonomous divisions, the University of Malaya in Kuala Lumpur and the University of Malaya in Singapore. From 1962, the former became known as the University of Malaya and the latter the University of Singapore. Nanyang University, founded in 1956 as

a Chinese-language institution, gradually included English as the medium of instruction for some courses. A policy of having its first-year students undergo courses jointly with University of Singapore students at the Bukit Timah campus took effect in 1978. In 1980 the two universities were merged to form the National University of Singapore. The National University of Singapore Library has more than 1,000,000 volumes (including more than 300,000 volumes of the former National University Library), in six constituent libraries—the Main Library; Chinese Library; Architecture, Engineering, and Law Libraries at the Kent Ridge Campus; and the Medical Library in the Faculty of Medicine building at Scopy Lines.

Public Libraries. The National Library operates the public library system, which includes a central library, four full-time branches, three part-time branches, and 10 bookmobile points. The fourth full-time branch opened in 1982. Loans of books and periodicals totaled more than 6,000,000 in fiscal year 1983, including bulk loans to social welfare homes, community centers, and other agencies. The total number of registered users in fiscal year 1983 was estimated at 25.9 percent of the total population. Young people (aged 12 to 19 years) formed the largest group, with 36 percent of total membership, followed by children under the age of 12 (32.4 percent) and adults (31.6 percent).

School Libraries. All 146 secondary schools, including 11 junior colleges (which provide two years of preuniversity education), had centralized libraries (1985). Of the 274 primary schools (a school conducting both primary and secondary classes is treated as one primary and one secondary school), about 99 percent also have centralized libraries, while the remainder have classroom libraries. All new schools are equipped with libraries, including furniture, equipment, and initial bookstock. School libraries are also developing into resource centers with audiovisual resources and facilities as well as printed materials. An Instructional Materials Library also provides additional audiovisual resources on loan to schools.

In late 1982, a five-year grant of S\$27,000,000 was provided to increase collections in school libraries to meet the quantitative standards of British

Libraries in Singapore (1982)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (Singapore dollar)	Population served	Professional staff	Total staff
National and Public	1	17	1,694,045	9,580,530	2,471,800 ^a	83	347
Academic	5	17	1,366,980	8,800,208	40,507	64	318
School	401	--	3,687,787	2,676,865	467,141	7 ^b	14 ^b
Special ^c	52	63	1,105,308 ^d	2,181,420 ^e	90,218 ^f	49	254 ^g

^aEstimate.

^bFull-time staff in junior college libraries. Schools are staffed by teacher-librarians and are not included.

^c1983 data given for one special library, 1984 data for another.

^dExcludes data for one library. Periodicals included.

^eIn many cases personnel expenses not reported. No expense data available for nine of the special libraries.

^fExcluded population served by five libraries.

^gPart-time staff reported by two libraries have been counted as half-time workers.

Source: Replies to questionnaires.

school libraries. However, school library development is still handicapped by the lack of trained or additional manpower for the running of school libraries.

Special Libraries. There are 44 special libraries attached to government departments and statutory boards, including 16 government libraries staffed by professionals and a few others with subprofessional staff. Most serve only the staffs of their agencies, but the Department of Statistics Library is open to the public. In addition there are nine professionally staffed libraries of statutory bodies, including the Civil Aviation Authority and the Institute of Southeast Asian Studies, and 12 libraries attached to such foreign and regional agencies as the American Resource Center, the British Council, the Goethe-Institut, the Regional Language Center, the Colombo Plan Staff College for Technical Education, and the Regional Institute of Higher Education and Development. A few special libraries are attached to banks, newspapers and other firms in the private sector.

The Profession. The library profession is essentially a young and post-World War II profession as there were hardly any qualified librarians earlier.

The Malayan Library Group was founded in 1955 and succeeded by the Library Association of Singapore (LAS). At that time, there were only about a half dozen qualified librarians in Singapore, most of whom were expatriates from Britain, Australia and New Zealand, working mainly at the University of Malaya Library. Since then, the library profession has grown in keeping with library development in Singapore. The LAS membership (March 1985) includes 235 qualified librarians out of a total of 363 members, most of whom are Singapore citizens. Most of them have also been trained abroad, in Australia, Britain, Canada, New Zealand, and the United States. The largest number are employed by the government. Singapore lacks a library school.

The continued shortage of librarians led to provision of a basic part-time Postgraduate Course in Library and Information Science jointly organized by the LAS and the National Library from 1982. The first 21 students who completed the course were graduated in 1984.

Continuing education courses are organized by the National Library and the LAS. The Association publishes *Singapore libraries*, its official journal, annually as well as a quarterly *Newsletter*, a *Directory of libraries in Singapore* (latest edition, 1983), and other occasional publications such as conference proceedings. The Association works closely with the PPM (Library Association of Malaysia), with which it shares a common origin in the Malayan Library Group. Cooperation is fostered through a joint liaison council of the two associations as well as work in various bibliographical and other projects. The LAS and the PPM were also joint sponsors of the Congress (originally Conference) of Southeast Asian Librarians.

HEDWIG ANUAR

Somalia

Somalia is a republic on the Horn of Africa. It lies in the northeastern corner of Africa, bounded by the Gulf of Aden on the north, the Indian Ocean on the

east, and Kenya, Ethiopia, and Djibouti on the west. It has the longest coastline in Africa, 3,000 km. Population (1984 est.) 5,423,000, 80 percent of whom are nomads; area 638,000 sq.km. The official languages are Somali and Arabic, but English and Italian are also used in communication.

History. Somali became a written language only in 1972. So written Somali literature is not yet abundant, in spite of the language's rich cultural past. Also, book development is of comparatively recent origin, and adequate printing and production facilities had yet to be organized in the mid-1980s. Paper requirements are met through imports, and research facilities are modest and mainly problem-oriented.

Library facilities in Somalia are in an early stage of development and literature resources in the country are, by and large, scanty, if not poor. Formal education and literacy training did not receive much attention in colonial times, and reading has been of little interest to the majority of the population who are nomads. The lack of qualified staff is a serious barrier to the systematic organization of libraries. The importance of library and information services for supporting national development programs is being recognized. Many government departments and agencies planned to set up library and documentation centers with the help of international organizations such as Unesco, the World Health Organization, and the World Bank. Other countries, among them the United States, the Federal Republic of Germany, Italy, and India, provided technical assistance in the field of librarianship and documentation.

There were no public libraries in 1984; at the most there were a few reading rooms in some regions of the country.

National Library Services. Plans for a national library were begun in 1976 on the initiative provided by Unesco. Proposals were made from time to time to construct a permanent building. The National Library holdings comprised only a few thousand items in the mid-1980s. Under library legislation of 1976, the Ministry of Higher Education and Culture was given responsibility for library development. In spite of the enactment of library legislation and formulation of guidelines for evolving a national library system, there was no strong commitment on the part of the country to undertake development of libraries. Under a five-year development plan (1982-86), however, a permanent building for a National Library was under construction.

Academic Libraries. The university library system under the Somali National University consists of a central library and seven faculty libraries. The central library, organized largely with Italian technical assistance, has a collection of about 28,000 volumes. Among the faculty libraries, the library of the College of Education has good facilities and resources, a result of Indian technical assistance and U.S. AID assistance to the college. The Library of the College of Education has 37,500 volumes, and it includes textbooks in multiple copies. The library of the Faculty of Medicine has 6,000 volumes. The library of the Faculty of Agriculture is also fairly well equipped. Generally speaking, the university library system is far from adequate for supporting instructional and research programs.

School Libraries. School libraries hardly ex-

11, 1908.

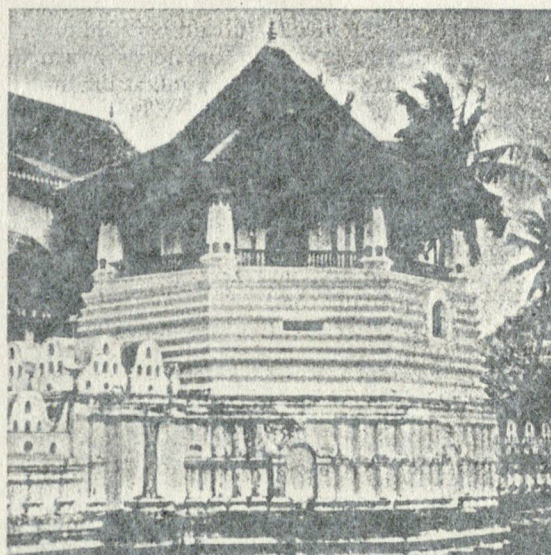
Spofford's professional and personal interests were perhaps most accurately described in the formidable title of his *A Book for All Readers, Designed as an Aid to the Collection, Use, and Preservation of Books and Formation of Public and Private Libraries* (1900). He was respected by librarians, politicians, and the general public, not only because of his accomplishments at the LC, but also because of his fair-mindedness and his continual delight in sharing his views about his favorite subjects—reading, bibliography, and collection-building.

REFERENCES

John Y. Cole, editor, *Ainsworth Rand Spofford: Bookman and Librarian* (1975).

Cole, "Spofford, Ainsworth Rand," *Dictionary of American Library Biography* (1978).

JOHN Y. COLE



Sri Lanka Library Association

Sri Lanka

Sri Lanka, an island republic in the Indian Ocean, lies off the southeastern coast of India. It occupies the island long called Ceylon. Population (1984 est.) 15,756,00; area 65,610 sq.km. The official language is Sinhalese.

History. Possessing an ancient civilization stretching back over 2,500 years of recorded history, Sri Lanka has a longstanding intellectual tradition and a background of learning and scholarship. Temple libraries were widespread, but not until British colonization and the development of Western-style institutions of education in the 19th century did a modern system of libraries begin to appear. Subscription libraries, subsidized by the government, were established in the early part of the century, and the Government Oriental Library, operated under the Colonial Secretary, was opened in 1870. Over a hundred years of state-sponsored education have provided the stimulus to a growing network of libraries of all kinds serving a population whose general literacy rates are in the region of 75 to 85 percent.

National Library. There was no National Library as of the mid-1980s, but the blueprint for its construction had been accepted, and the foundation stone was laid in 1977. The principal state reference library is the National Museum Library, established in Colombo, the capital city, in 1877. Its collections number 600,000 volumes, including manuscripts, and it served as a legal deposit library as well from 1885.

The Sri Lanka National Library Services Board was begun under an act of 1970. Its primary objectives are to formulate a national library policy, to promote and assist the development of all types of libraries, especially those maintained by state funds, and to set up a National Library. It is responsible for producing the Sri Lanka National Bibliography (begun in 1962) and has been accorded legal deposit privileges for this purpose from 1974.

The Department of National Archives is also a legal deposit library, and the Director of National Archives is the Registrar of Books, Periodicals, Newspapers, and Printing Presses.

Academic Libraries. At the apex of the tertiary (or higher) system of education, established in 1870 with a Ceylon Medical College and in 1921 with the Ceylon University College, are the nine universities and their affiliated colleges and institutes. The oldest and largest of these are the universities of Peradeniya and Colombo. Peradeniya has much the larger library, amounting to 400,000 volumes, excluding its legal deposit materials since 1952. Colombo holds some 140,000 volumes. The collections in the universities alone total nearly a million vol-

Libraries in Sri Lanka (1977)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (rupee)	Population served ^a	Professional staff	Total staff
National	1	3	13,000	476,000	4,800	4	38
Academic ^b	5	14	540,000	3,401,000	7,184	16	206
Public ^c	650	684	--	5,498,000 ^d	197,200	7	952
School ^e	793	--	1,423,000	660,000	4,000,000	60	793 ^f
Special ^e	51	--	435,000	2,100,000	3,000	37	185

^aRegistered borrowers.

^bUniversity libraries only.

^c1980 data.

^dEmployees and acquisitions.

^e1976 data.

^fIncludes part-time staff.

Source: Unesco, *Statistical Yearbook*, 1984; Annual reports and personal inquiries.

Oriental Library in the Temple of the Tooth, Kandy, Sri Lanka. Built in the 17th century, it houses ancient ola (palm) manuscripts.



times covering all disciplines. There are special collections on Sri Lanka and Oriental subjects in the larger universities. The libraries in technical colleges and institutes are much smaller and of more recent origin.

Public Libraries. Various sorts of subscription libraries existed from early British times, and two of them (the United Services Library and the Colombo Pettah Library) were amalgamated in 1925 to form the Colombo Public Library, which developed into the premier public library in the island. The organization and maintenance of public libraries is not obligatory for local government authorities but is a permissive function. The scope and nature of such libraries vary widely from region to region. The Ministry of Local Government stepped up the provision of library services and elevated the resources of buildings, staff, and books. Most of the local government bodies maintained libraries in 1980.

School Libraries. Despite considerable activity in public education since independence in 1948 and the high participation rate in the free educational stream, the provision of school libraries of sufficient quality lagged behind that of other educational facilities. The Ministry of Education took active steps to remedy this deficiency and to promote the concept of a school library as a center of learning. Most schools have libraries of sorts and, as in public libraries, literature is provided in all three languages—Sinhalese, Tamil, and English—used as media of education and administration.

Special Libraries. Special libraries and documentation centers are located in state corporations, government departments, and private organizations dealing with industry, commerce, scientific research, technology, agriculture, and allied fields. The clientele are select groups of users connected with the institutions, and this class of library service has grown rapidly. The National Science Council of Sri Lanka operates a Science and Technology Information Center.

The Profession. The Sri Lanka Library Association was established in 1960 and conducts part-time classes in librarianship and information studies at various levels. A Department of Library Studies in the University of Kelaniya was begun in 1973.

REFERENCE

1. Corea, editor, *Libraries and People* (Colombo Public Library, 1975), a valuable symposium of articles on all aspects of the library scene in Sri Lanka.

HENRY ALFRED IAN GOONETILLEKE*

Standing Conference of African University Libraries (SCAUL)

The Standing Conference of African University Librarians (SCAUL) was formed as a result of the discussions at the Leverhulme Inter-University Conference on the Needs and Problems of University Librarians in Tropical Africa, held in Salisbury, Rhodesia, September 14-23, 1964. At the end of the Conference, a Continuation Committee was appointed and charged with the responsibility of implementing the conference resolutions, one of which recommended that further conferences be held periodically.

Members of the Continuation Committee took the opportunity of the Conference of Librarians from Commonwealth Universities in Africa, sponsored by the Commonwealth Foundation and held in Lusaka, Zambia, August 24-29, 1969, to discuss further the organization of the Standing Conference of African University Librarians. At this conference, the non-Commonwealth Committee members, Ethiopia and Senegal, took part as observers. Some important recommendations concerning the organization of SCAUL were made, and a draft constitution was drawn up.

According to this constitution, full membership in SCAUL would be open to heads of libraries of universities eligible for membership in the Association of African Universities, with associate membership open to university libraries in other parts of the world, SCAUL activities would be developed mainly within Area Organizations of SCAUL. A Central Committee, comprising the Convener/Secretary (Chairman), representatives of Area Organizations, and the Editor of the *Newsletter*, would meet periodically to coordinate the work of the Areas. Each member of SCAUL would be free to choose the Area that it would join and would be allowed to attend as an observer the conferences in the Areas to which it did not belong. Each Area would determine its own membership requirements and draft its own constitution based on that of SCAUL. The *Newsletter* was to be published as the official organ of SCAUL. The name of the organization was changed to Standing Conference of African University Libraries.

These recommendations were subsequently approved in a postal ballot, and the draft constitution was fully discussed at Area meetings in 1971 and 1972 and subsequently approved.

SCAUL now operates through two Area Organizations: the Eastern Area (SCAULEA), headquartered at the library of the University of Nairobi, Kenya, and the Western Area (SCAULWA), at the University of Lagos Library, Lagos, Nigeria. Each of the Area Organizations has both anglophone and francophone countries as members. SCAULEA has held conferences in Addis Ababa (1971), Mauritius (1973), and Nairobi (1977). SCAULWA held conferences in Lagos (1972), Dakar (1974), Accra (1976), Kinshasha (1978), Monrovia (1980), and Lagos (1982).

The aims of SCAUL are (1) to keep members informed of each other's activities and, whenever possible, to correlate such activities in the common interest; and (2) to support and develop university library services in Africa.

SCAUL seeks to advance the development of university libraries by organizing conferences as a forum for discussing the problems of university librarianship in Africa and of the programs of each member library. SCAUL sponsors individual research activities and projects and meetings of specialists on African bibliography, cataloguing, classification, and other library topics.

SCAUL publications include proceedings of the conferences of SCAULEA and SCAULWA and SCAUL *Newsletter*. SCAULWA also publishes *African Journal of Academic Librarianship*, established in 1983 and edited by E. Bejide Bankole.

E. BEJIDE BANKOLE

cites 75 survey reports, of which 5 were on a national level (libraries in Australia); 45 on university, college, and research libraries; 5 on public and school libraries; 11 on special libraries; and 9 on state libraries and library systems. Among the institutions he surveyed were Columbia University (1943 and 1957); Cornell (1947); Dartmouth (1952); Barnard College Library (1954); Boston University (1956); Manhattanville College (1958); University of South Carolina (1958); Montana State University (1959); and Australian libraries (1964).

Szigethy also credits Tauber with 20 monographs; 25 conference papers, proceedings, and reports; and 85 articles and essays. Tauber was Editor of *College and Research Libraries* for 18 years. He was also on the editorial advisory boards of *Library Sources and Technical Services*, the *Journal of Cataloging and Classification*, the *Journal of Documentation*, the *Journal of Higher Education*, and others.

Tauber's first publication was a 17-page monograph, *Brief History of the Library of Temple University* (1934). Among his many publications, *The University Library* (1945), on which he collaborated with Louis Round Wilson, and *Technical Services in Libraries* (1954), stand out as classics. Tauber was interested in all aspects of the library and information profession but distinguished himself as a champion in the specific areas of reclassification and recataloguing.

In technical services, he loudly and clearly sang his song in favor of centralization of services. Academic and research libraries became his main platform. He also became deeply interested in the planning and design of library buildings. Sixteen of his surveys were primarily concerned with design of library buildings. Tauber's interests were not limited to American institutions. In Australia he visited 162 libraries in 1964; his report included approximately 300.

His service to ALA and other professional associations was extensive. He received many national awards, among them the Margaret Mann Citation (1953) and the Melvil Dewey Award and Medal (1955).

As a teacher he won the affection and admiration of many of his students; he opened his house to them, especially to those from foreign lands.

In 1981 the Maurice F. Tauber Foundation was established in New York. It sponsors an annual memorial lecture hosted by library schools throughout the United States, publication of appropriate scholarly works, and an annual award for excellence in library and information science. The first memorial lecture was delivered by Lowell A. Martin at Columbia University, December 12, 1981, on "The Library Surveyor—Innovator or Intruder?"

REFERENCES

- Richard L. Darling, "Maurice F. Tauber, 1908–1980," *Library Service News* 41 (Fall, 1980).
Kurt S. Maier, "Maurice F. Tauber," *Leaders in American Academic Librarianship 1925–1975*, edited by Wayne A. Wiegand (Beta Phi Mu, 1983), provides the most comprehensive information.
Marion C. Szigethy, *Maurice Falcom Tauber: A Bibliography 1934–1973* (1974), provides biographical information.

NASSER SHARIFY

Thailand

Thailand, an independent constitutional monarchy in southeastern Asia, is bounded by Laos on the north-east, Kampuchea on the southeast, the South China Sea on the south, and Burma on the west; a section of Thailand extends down the Malay Peninsula to Malaysia on the south and the Indian Ocean on the west. Population (1984 est.) 50,382,000; area 514,000 sq.km. The official language is Thai.

History. The National Library has more than 184,000 Thai manuscripts. Written on palm leaves and Thai paper folded in accordion pleats, they are mainly copies of Buddhist sacred books and other Buddhist literature, literary compositions, and works on medicine, law, history, arts, and astrology. There are 87 stone inscriptions in various ancient languages and scripts of the Southeast Asian region.

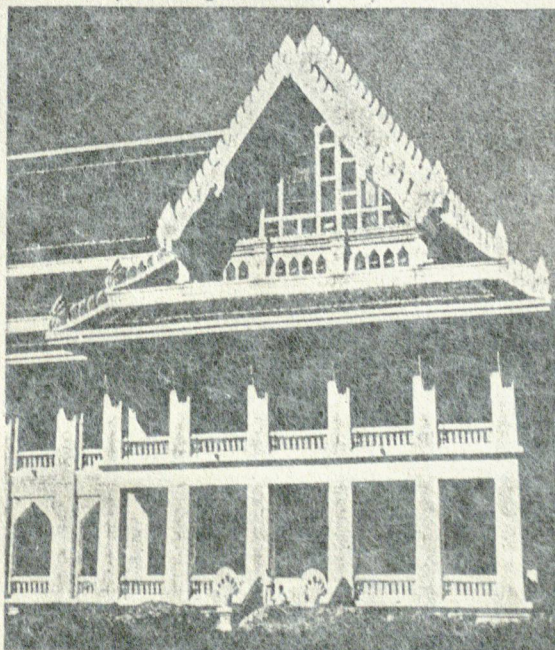
National Library. The National Library of Thailand is composed of three libraries: the Vajirayana Library, Vajiravudh Library, and Damrongrajapharb Library. Established in 1905, the National Library is a division in the Department of Fine Arts of the Ministry of Education.

The present National Library building was opened in May 1966. Its printed book collection is strong in the history and geography of Thailand and totals about 900,000 volumes in Thai and other languages. The Library is entitled by law to receive two copies of every book published in Thailand, but this has not been well enforced. There is no copyright registration in Thailand.

Audiovisual materials include a collection of tapes and Thai folklore, important lectures and discussions, and parliamentary debates and speeches. The library compiles various bibliographies.

Two libraries in addition to the National Library are the Phya Anuman Rajadon Memorial Library and the Library of King Rama VI. The National Archives was developed along with the National Library and has its own building.

Central Library, Chulalongkorn University



Central Library of
Chulalongkorn University,
Thailand.

Academic Libraries. Thailand has 11 universities. All have their own libraries, many with more than 100,000 books, most in foreign languages and inadequate in all subjects. Financial support for university libraries varies from one institution to another. In most faculties, lecturers act as librarians along with their teaching.

In 1967 the Thai and U.S. governments set up funds for each university to acquire more books on science, technology, and the social sciences, a project that had ended by the late 1970s. In 1968 the National Council formed the Committee on Development of University Libraries, comprising 10 university librarians and an official of the Council. The Committee planned to compile a union list of serials from all university and some government libraries and a union catalogue of books in all universities. There are incomplete union catalogues at Chulalongkorn and Kasetsart University Central libraries.

The Committee also attempted to promote recognition of higher status for university libraries and librarians and solve other problems. Cooperation among university libraries includes interlibrary loan and duplicate exchanges with hope for cooperative acquisition and cataloguing.

Public Libraries. Public library development has been slow. The government initiated services in 1949. Though more than 300 public libraries were established, most had small reading rooms and an average of 300 volumes and had no professionally trained librarians. The government agencies operating public libraries are the Adult Education Division, Elementary and Adult Education Department, Ministry of Education; the Bangkok Municipality; the National Security Command Community Development Department; and the Ministry of Interior. Each government agency followed its own information policies.

Public libraries of the Bangkok Municipality and the Dhonburi Municipality have trained librarians and adequate budgets. Public libraries under the supervision of the Adult Education Division lack trained librarians, and librarians are placed at the lowest grade of the civil servants. Budgets are too small to bring the public libraries up to the standards set by the Ministry of Education in 1968. Those standards grew out of a 1962 Unesco study.

School Libraries. The Ministry of Education supervises school libraries. Lack of suitable children's books, few professional librarians, and low status accorded the school librarian contributed to limited student use of libraries. Out of some 28,000 schools of all levels, fewer than 10 percent have libraries rendering good services to students.

A committee for library development appointed in 1963 helped improve salary scales for school librarians and led to the adoption of standards. There were later projects to provide all schools with libraries and in-service training for staff. The Comprehensive School Project aims to improve the quality of instruction, library quarters, and book collections of 20 schools throughout Thailand.

Special Libraries. Special libraries in Thailand are found in research institutes, government agencies, professional and trade associations, learned societies, and business firms. Among the libraries that have special resources in the field of science are the Division of Scientific and Technological Information Department of Science Service, Ministry of Science, Technology, and Energy; the Faculty of Science Library, Chulalongkorn University; and the Faculty of Science Library, Mahidol University. Several outstanding libraries in health sciences, such as Siriraj Medical Library of Mahedol University, Chulalongkorn Medical Library, and Ramathibodhi Hospital Library, are part of the medical schools of major universities. A number have had assistance from the China Medical Board and the Rockefeller Foundation.

The Library of the National Institute for Developmental Administration has a collection of about 60,000 volumes. The Thailand Information Center at the Faculty of Political Science, Chulalongkorn University, specializes in information on Thailand, with particular emphasis on the behavioral and social sciences and related disciplines. The Asian Institute of Technology has an engineering library that pioneered in introducing computerized systems to library work. It worked toward becoming a regional information center for science and technology in Southeast Asia.

Other special libraries include the Siam Society Library of Southeast Asian materials, the Bank of Thailand, the Highway Department, and the Department of Technical and Economic Cooperation.

The Thai National Documentation Center supplies scientific and technical information and holds some 126,000 volumes. Other international organizations have libraries in Thailand.

The Profession. The Thai Library Association was founded in 1954 with the help of the Asia Foundation. The Association sponsors workshops, conferences and seminars, radio and television programs, publications, and other activities and has played an important role in the library development of the country.

REFERENCES

Suthilak Ambhanwong, *Libraries and Librarianship in Thai-*

Libraries in Thailand (1981)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (baht)	Population served	Professional staff	Total staff
National	1	6	1,245,000	13,005,000	--	35	399
Academic	--	--	--	--	--	--	--
Public	--	--	--	--	--	--	--
School	--	--	--	--	--	--	--

Source: Unesco, *Statistical Yearbook*, 1984.

land, Chulalongkorn University Department of Library Science, paper no. 5 (1967).
David Kaser, Walter C. Stone, and Cecil K. Byrd, *Library Development in Eight Asian Countries* (1969).

UTHAI DHUTYABHODI*

Thorpe, Frederick A. (1913-)

Frederick A. Thorpe, British publisher, founded large-print book publishing in Britain.

Thorpe was born on October 22, 1913, in Leicester, one of the major English provincial cities, and brought up there. His initial experience in publishing was interrupted by war service in the Royal Air Force from 1940 to 1946. On his return to Leicester he resumed his publishing interests, which developed and expanded to become a highly successful business. In it he gained the experience in every aspect of the book trade and publishing that, like the contacts he made with agents and distributors worldwide, was to prove an apprenticeship for his second career, that of pioneering the publication of books in large print.

In 1963, when he was about to retire from his business, Thorpe was approached by a committee set up in response to the concern expressed by the British Government for the cultural well-being of elderly people. There were books available in abundance, but many elderly people could not easily read normal-size print. The committee sought Thorpe's advice, and he applied his experience in printing and publishing to the problem. He discussed it with the Library Association and learned of the results of earlier investigations into this and similar problems; none of which had produced a solution. He decided that the technical difficulties of printing and producing books in print twice as large as that in normal books, and with an ink density and paper quality that would ensure a sharp contrast, could be solved; he founded the non-profit publishing house of Ulverscroft Large Print Books to produce them.

In selecting the first titles for publication, Thorpe found publishers reluctant to allow their authors' work to appear in a new and untried format from an unknown publisher. His market for large-print books was mainly the elderly who looked for established authors and well-written books. After some initial disappointments he approached Dame Agatha Christie, who gave the project her full support and encouraged other well-known authors to allow their books to appear in the new series. Four thousand copies of each of the first four titles were published in September 1964: *Pocketful of Rye* by Agatha Christie, *I Brought a Mountain* by Thomas Firkbank, *The Avenger* by Edgar Wallace, and *The Fettered Past* by Netta Muskett. They established a precedent both in the careful selection of titles that is a hallmark of the firm and in their format. They were printed by offset lithography from photographic enlargements of the normal-size books. Their size, eleven by eight inches, and their distinctive book jackets (blue for romances and historical and romantic suspense; orange for westerns; black for mystery; red for general fiction,

adventure, and suspense; green for nonfiction; and, later, purple for specialist series and brown for individual specialist titles) made them immediately recognizable.

Thorpe decided that the books should be sold directly to libraries and other institutions, not through the book trade, which helped to keep the selling price low. The Library Association sent one book, with a letter supporting the venture, to each library. While orders from libraries reached the expected level, there were few from hospitals and welfare institutions, which had been expected to purchase half the copies. Thorpe therefore sought overseas markets. Through his own international contacts, and others made through the American and Canadian Library Associations, Rotary International, and a number of interested individuals, the sale of Ulverscroft Large Print Books spread throughout the English-speaking world. Thorpe's personal interest, his visits to libraries, and his presence at conference exhibitions made him an internationally recognized figure in librarianship.

The development of large print books from 1963 to 1969 was one of technical experiment to improve quality and overcome the difficulties caused by the photographic enlargement of existing typesetting, especially broken type and uneven inking, which are much more noticeable when enlarged. The solution was to reset the books in large print; this decision, along with the production of a thinner but opaque paper, led in 1969 to a new nine-by-six-inch format, easier for the reader to enjoy and the library to shelve. The new format was greatly appreciated, and Thorpe went on to newer, still thinner papers, producing even longer books in the series that are not uncomfortable to handle.

The 500th title appeared in 1971 and the 1,000th in 1976, an event marked by the publication of a five-volume edition of *War and Peace*. Thorpe introduced the Charnwood Series in 1981 in order to include a wider range of titles to meet the needs of a new generation of large-print readers and began the Linford Series of paperback books in 1983 to help frail elderly readers. By 1984 the number of titles published had reached more than 2,400, and Thorpe had plans for further developments.

The profits from Ulverscroft Large Print Books are covenanted to the Ulverscroft Foundation, a charity that also receives donations from individuals, including many readers of Ulverscroft books. The Foundation is administered by trustees and assists hospitals, schools, and libraries.

The importance of Thorpe's work has been recognized in several ways. In 1969 he was awarded the Order of the British Empire (OBE) by the Queen, in 1972 the ALA's Francis Joseph Campbell Award, in 1973 the Queen's Award to Industry and the Grimshaw Memorial Award from the National Federation of the Blind, in 1976 an ALA Centennial Citation and in 1984 an engrossed resolution of the Council of the Library Association.

Thorpe's achievement is expressed in the title of the book he chose as the 500th Ulverscroft large-print title *A Many-Splendoured Thing*. He had made reading possible for many people by bringing unbounded energy and business experience to the creation of a new and now essential part of the resources of libraries in

meeting the needs of the disadvantaged.

REFERENCES

- F. A. Thorpe, "Large Print: An Assessment of its Development and Potential," *Library Association Record* (March 1972).
W. A. Munford, "Books for the Partially Sighted," *British Book News* (April 1976).

GEOFFREY SMITH

Tibet

Also known as the Land of Snow, Tibet occupies an area of approximately 1,221,700 sq.km. on the Himalayan plateau and has within its borders some of the highest mountains in the world. The average elevation of its inhabited areas is 16,000 feet (4,876 meters). It is bordered by China on the north and east, India, Bhutan, and Nepal on the south, and Jammu and Kashmir on the west. Lhasa, the capital and former seat of the Dalai Lama, has an elevation of 12,000 feet; Shigatse, the former seat of the Panchen Lama, has an elevation of 9,000 feet. This vast area is but scantily populated; according to a 1980 estimate, the population was about 2,000,000. Most of the people live in the southern valleys. The chief languages are Tibetan and Chinese.

Religion constitutes the principal form of Tibetan cultural life. In the 8th century the native Bon religion was displaced by a tantric form of Buddhism, a form that flourished from the 10th through the 13th centuries and has become known as the *rNin-ma-pa*, or Red Hat sect. In the 15th century, in reaction against the decadent practices of the Red Hat sect, a reform took place that led to the formation of the *dGe-lugs-pa*, or Yellow Hat sect. Quickly the Yellow Hat sect became Tibet's major Buddhist sect and transformed Tibet into a theocratic state under the leadership of the Dalai Lama and the Panchen Lama. Tibet was incorporated into the People's Republic of China in 1951.

No structured library system existed in Tibet prior to 1951. Each monastery had its own library, and some of the major ones, such as Drepung and Sera, also functioned as publishing houses. No information is available on how materials in these monastic libraries were stored and made accessible, nor is there any indication that any monastery functioned as a national library or that material circulated among monasteries. The monasteries gradually disappeared after Tibet's incorporation into China.

Tibet's monastic libraries, however, never played an important role in the country's cultural life, serving more frequently than not as mere storage areas. In spite of a large output of religious literature, Tibet's population was, by and large, illiterate. Most of the monks limited their reading activities to a few basic texts. The degree of change in the country's literacy rate under Chinese rule is difficult to assess because of lack of reliable data. If, however, the experience in China proper can be used as a guide, the situation could have improved considerably. Observers assume that an increase in literacy means knowledge of Chinese rather than knowledge of Tibetan. Indeed, most material published in Tibet in the decades after mid-century was published in Chinese. The country's main newspaper, the *Hsi-tsang Jih-pao* (The Tibet Daily), is exclusively in Chinese. Libraries in

Tibet were likely to be structured along the lines followed in China.

In 1959 Tibet witnessed an uprising against the Chinese in Lhasa that forced many refugees, including the Dalai Lama, to go to India. The majority of them settled in Dharamsala, Himachal Pradesh, where they began a conscious effort to preserve their cultural heritage, encouraged by the Dalai Lama. In this context the Library of the Tibetan Works and Archives was founded in 1971, with the principal purpose of collecting all materials, in printed as well as in manuscript form, dealing directly or indirectly with Tibet. Only scant details about the Library's operation and holdings are readily available. The Library undertook an oral history project and a retranslation project; the former covers the recording of Tibetan oral traditions, the latter the translation of Tibetan Buddhist texts into Sanskrit.

REFERENCE

- H. Hoffman, *Tibet: A Handbook*, Indiana University Asian Studies Research Institute, Oriental Series (1977)

LUC KWANTEN*

Togo

Togo, a West African republic, is bounded on the north by Upper Volta, on the east by Benin, on the south by the Gulf of Guinea, and on the west by Ghana. Population (1984 est.) 2,947,000; area 56,785 sq.km. The official language is French.

National Library. The Bibliothèque Nationale in Lomé was decreed a national library on October 1, 1969. Under the directorship of the Ministère de l'éducation nationale, the library originally was established in 1937 as the Service de la documentation générale, a documentation center to study documentation concerns in museums, archives, and libraries. In 1945 it was taken over by the local IFAN Centre (Institut fondamental de l'Afrique noire), and in 1960 that center became the Institut togolais des sciences humaines. The Institut has departments of anthropology, archaeology, history, ethnography, geography, linguistics, and sociology. In the mid-1980s the Library's collection housed approximately 6,000 volumes and 1,000 periodicals; 85 percent of all holdings are in French.

The functions of a national archives are performed by the Institut togolais des sciences humaines and the Archives de la Présidence de la République. Although Togo has some laws relating to legal deposit, they have never been systematically enforced.

Academic Libraries. Togo has one university, the Université du Bénin, which was founded as a college in Lomé in 1965 and attained university status in 1970. All higher education institutions throughout the country are part of the University. The language of instruction is French. The University's libraries are decentralized. Holdings include 50,000 volumes and pamphlets, 90 percent of which are in French. Another institution of higher education is the École nationale d'administration (ENA), founded in Lomé in 1958 to provide a training center for Togolese civil servants. The library has more than 1,000 volumes. There are government-sponsored technical colleges at Lomé and at Sokodé and an agricultural school in Kpalimé with a library of about

(1898). Holdings total some 255,000 volumes and 2,550 periodicals. It too is a legal deposit for all Vietnamese publications and has two sections, natural and social sciences, which have a number of research institutes under them (such as those of Archaeology, History, Literature, and Philosophy). Each Institute possesses its own collection:

Hanoi University, re-founded in 1956, has a library containing approximately 62,000 volumes.

Public Libraries. These are state libraries rather than "public" in the usual Western sense. From 1956 the DRV set up a series of provincial and municipal libraries. The provincial libraries, the largest in Hanoi, Haiphong, and Nam Dinh, were meant to coordinate the use of written materials in their areas. By the 1970s there were 34 libraries in cities and provinces, 102 city or town reading rooms, and more than 20,000 libraries across the countryside. Their books totaled more than 6,000,000. More than 4,000 trade union libraries were established in work locations to provide both technical detail and recreational reading. The general public has access to books through factory, union, or village. All this helped push the major DRV literacy campaign.

In addition, collections of more than 500,000 items were made before 1975 to add to southern libraries upon unification. The latter thus joined the already existing network. Unesco reported 316 public libraries in Vietnam in 1977 with total holdings of 4,879,000 volumes.

School Libraries. Various units of government, such as the Ministries of Defense and Agriculture, have their own libraries. In the South before 1975 there were the collections of the National Institutes of Administration and of Statistics, the Industrial Development Center, and the Ministry of Information, all in Saigon. In Dalat existed an irreplaceable collection of 19th-century imperial and land records. Where these collections were later located is uncertain.

The Profession. There is an Association of Vietnamese Library Workers.

REFERENCES

- J. Rowlands, *Libraries in Indochina: A Brief Survey of Libraries in Laos, North Vietnam, South Vietnam* (1973), good summary of existing information.
J. K. Whitmore, "Vietnamese Retrospective Materials," *Foreign Acquisitions Newsletter* (Fall 1973), an examination of historical materials.
D. Kaser et al., *Library Development in Eight Asian Countries* (1969), a detailed, but early, description of the South.

JOHN K. WHITMORE*

Vosper, Robert G. (1913-)

Robert Gordon Vosper, university librarian and educator, gained recognition as a force in general support of librarianship in the United States and throughout the world.

Born in Portland, Oregon, on June 21, 1913, he early set a goal of pursuing scholarship in classics. After finishing his B.A. (1937) and M.A. degrees (1939) at the University of Oregon, he enrolled in the School of Librarianship at the University of California, Berkeley, as a logical next step when the pressures of the Depression foreclosed his first option. With an offer of a job as a student employee of the University Library, Vosper was successful in winning admittance to the School, beginning a long and outstanding career.

After completing his library studies at Berkeley in 1940, Vosper served as a Reference Librarian there, and then as an Assistant Reference Librarian at Stanford, 1942-44. There he was associated with Nathan van Patten, Director of the Library and an outstanding expert in the field of acquisitions for academic libraries. With van Patten's encouragement and assistance, Vosper moved to the University of California at Los Angeles in 1944 to head the acquisitions department under the direction of University Librarian Lawrence Clark Powell. He soon began to show his penchant for action under pressure in the building of research libraries and particularly their collections as UCLA continued its march from being the southern branch of the University of California to being a leading research agency.

Vosper quickly rose to the rank of Assistant, then Associate, Librarian under Powell before becoming the head of the University of Kansas Library in 1952. Kansas recognized that it needed a much-expanded library in order to become a first-rate research institution. Its new President, the young Franklin Murphy, former Dean of Medicine, was the chief advocate of the Library. With Vosper, he toured the state and proselytized the legislators with great success to obtain funds for the Library. Vosper enlisted the faculty's help in selecting materials and began to build a core of specialists in the Library to guide the development of the collections. In this manner, Vosper may be considered the agent who gave credibility and visibility to the position of "bibliographer" in libraries.

Murphy moved to become Chancellor at UCLA in 1960. The regents of the University of California



Robert G. Vosper

Libraries in Vietnam (1977)

Type	Administrative units	Service points	Volumes in collections	Annual expenditures (dong)	Population served	Professional staff	Total staff
National	1	1	818,000	285,000	--	19	120
Academic	--	58	2,922,000	--	--	--	--
Public	--	316	4,879,000	--	--	--	--
School	--	--	--	--	--	--	--
Special	--	44	1,070,000	--	--	--	--

Source: Unesco, *Statistical Yearbook*, 1984.