

NEWS

and Notes

At ceremonies held on August 11 at Brookhaven National Laboratory ground was broken on the site of the first peacetime atomic pile, to be used for fundamental research in medicine, physics, biology, chemistry, and engineering. According to Lyle Borst, head of the group which designed the pile, it will contain a number of improvements which will make it the most flexible pile in the world. Although similar in general form to that at Oak Ridge, its neutron density will be several times greater. The air-cooled pile, which is expected to be in operation by mid-1948, will be housed in a building approximately 120 feet long by 100 feet wide and more than 6 stories high, flanked by two laboratory wings, each nearly 100 feet long. The total cost will be about \$10,000,000. The H. K. Ferguson Company, designers and builders of the Oak Ridge thermal diffusion plant, will be responsible for engineering design and construction. Sumner T. Pike and William W. Waymack, members of the U. S. Atomic Energy Commission, addressed the group present for the ceremonies.

About People

Joseph H. Burckhalter, for the past five years coordinator of research in synthetic antimalarial drugs for Parke, Davis & Company, Detroit, has been appointed associate professor of pharmaceutical chemistry at the University of Kansas, effective in September.

Alan Hisey, of the Medical College of Alabama, has been appointed associate professor of biochemistry, School of Chemistry, Metallurgy, and Ceramics, University of Alabama, Tuscaloosa.

Edward S. Ross has been promoted from associate curator to curator, De-

partment of Embryology, California Academy of Sciences, San Francisco; **Hugh B. Leech**, formerly of the Dominion Entomological Laboratory, Vernon, B. C., has been named assistant curator; and **Don Graeme Kelley**, Berkeley, has been appointed editor of the Academy's monthly publications.

Edward U. Condon, director, National Bureau of Standards, and **Detlev W. Bronk**, chairman, National Research Council, have accepted appointments as members of the Scientific Advisory Committee of Brookhaven National Laboratory. This Committee, created to assist and advise the director of the Laboratory, consists also of the 9 scientific members of the Board of Trustees (*Science*, May 9, p. 491).

Wilson Popenoe, director, Escuela Agricola Panamericana, Zamorano, Honduras, received the honorary D. Sc. degree from Pomona College at its last commencement.

Kinichi Watanabe, formerly of the University of Hawaii, has been appointed assistant professor, Department of Physics, Wabash College, Crawfordsville, Indiana.

Henry Quastler, radiobiologist, Carle Clinic, Urbana, Illinois, has been appointed half-time associate research professor of radiobiology, Departments of Zoology and Physiology, and Physics, University of Illinois.

George W. Stiles, head, Pathological Laboratory, Bureau of Animal Industry, U. S. Department of Agriculture, Denver, Colorado, since 1918, retired on June 30 after 45 years of service in the Department.

Harold C. Urey, Institute for Nuclear Studies, University of Chicago, has been named to represent the American Chemical Society on the U. S. National Commission for UNESCO.

C. L. Gazin, paleontologist, Smithsonian Institution, has begun a search for fossils in the Huerfano formation in southern Colorado. Among the specimens Dr. Gazin hopes to find are the tillodonts of the Eocene period, which are among the earliest known warm-blooded animals and which combined rat and bear characteristics.

Lowell T. Coggeshall, chairman, Department of Medicine, University of Chicago, has been appointed dean of the Division of Biological Sciences, which includes 13 Departments as well as the Zoller Memorial Dental Clinic, Nursing Education, the Food Research Institute, and the Institute for Radiobiology and Biophysics.

Robert M. Stabler, formerly assistant professor of zoology, University of Pennsylvania, has been appointed associate professor and acting chairman, Department of Biology, Colorado College, Colorado Springs.

P. B. Pearson, professor of biochemistry and nutrition, Agricultural and Mechanical College of Texas, has been appointed dean of the Graduate School, succeeding **T. D. Brooks**. Dr. Pearson assumes his duties September 1.

Grants and Awards

Derrick T. Vail, professor of ophthalmology, Northwestern University, and consultant to the Army Medical Department, was recently awarded the Legion of Merit for "outstanding services" as senior consultant in ophthalmology in the European Theater. The presentation was made by Major Gen. Paul R. Hawley, chief medical director, Veterans Administration, and formerly chief surgeon, European Theater of Operations.

Louis Schmerling, Universal Oil Products Company, Chicago, will receive the first Ipatieff Prize in chemistry on September 15, during the national meeting of the American Chemical Society in New York City. The \$3,000 prize, honoring achievements in the study of catalysis or high blood pressure, was established by Vladimir N. Ipatieff, director, Ipatieff High Pressure and Catalytic Laboratory, Northwestern University, and Mrs. Ipatieff. The award, which will be presented to Dr. Schmerling for his contribution to the knowledge of catalytic reactions of hydrocarbons, will be given every three years to a chemist under 40 years of age.

J. C. Geiger, director of public health, City and County of San Francisco, has recently been awarded the Gold Cross of the Royal Order of Phoenix from the Greek Government, the Royal Order of

the Crown of Orange Nassau, officer grade, from the Queen of Holland, and the Meritorious Medal of the Canadian Legion of the British Empire Service League from the president of the Dominion Command, Ottawa, Canada, for his services and contributions to public health.

The School of Dentistry, Emory University, has received from the National Institute of Health a \$3,655 grant, according to Dean Ralph R. Byrnes. The grant, to be administered by James A. Miller, associate professor of anatomy, will be used for an analysis of factors in the newborn influencing survival under anoxia.

The Jane Coffin Childs Memorial Fund for Medical Research has recently announced the following appropriations, totaling \$62,764.50, for support of cancer research projects and fellowships for one year: Samuel C. Harvey, Yale University School of Medicine, \$3,000 for statistical studies of cancer, and \$8,500 for clinical and laboratory studies of cancer; Yale University School of Medicine, Administration, \$1,000 for maintenance of the animal house; C. C. Little and P. A. Gorer, Roscoe B. Jackson Memorial Laboratory, \$4,500 for continued study of the mammary tumor inciter by Dr. Little, and \$250 for 3 months for continued study of immunological aspects of genetics by Dr. Gorer; Yale University School of Medicine, Administration, \$500 for expenses of seminars of the Atypical Growth Research Unit; Eugene L. Opie, Rockefeller Institute for Medical Research, \$4,000 for continued studies of changes in cells undergoing malignant transformation, and dietary influences on liver tumor formation; Robert G. Green, University of Minnesota Medical School, \$5,000 for continued studies on the nature and mode of action of the milk agent; Alexander Haddow and associates, Chester Beatty Research Institute, Royal Cancer Hospital, London, supplement of \$2,500 for continued support of the Institute's research program on chemical carcinogenesis, viruses and cancer, and chemotherapy of cancer; Owen H. Wangenstein, University of Minnesota Medical School, \$5,000 for continued investigations of gastric carcinoma; Aubrey Gorbman, Barnard College, Columbia University, \$800 (September 15-June 30) for continued

study of atypical growth in the thyroid gland; Edwin D. Murphy, University of Tennessee School of Medicine, \$4,660 for the continued study of the biological behavior of experimental and human tumors; Paul R. Burkholder, Yale University, \$3,000 for the study of mechanisms of induction and propagation of atypical growth in plants; T. M. Sonneborn and W. J. van Wagtenonk, Indiana University, \$8,500 for studies on the biochemical nature of substances concerned in transmission of hereditary cytoplasmic factors in *Paramecium*; William B. Atkinson and Howard C. Taylor, Jr., Columbia University College of Physicians and Surgeons, \$4,000 for cytochemical investigations on hyperplastic and malignant uterine tissues in women in relation to their endocrine state; Joshua Lederberg, fellow, \$1,554.50 (September 7-June 30) to work with Francis J. Ryan, Department of Zoology, Columbia University; Charles Grégoire, fellow, \$1,500 (October 1-June 30) to work in the Department of Cancer Research, Rockefeller Institute for Medical Research; and \$4,500 to cover various projects of the Fund. These appropriations bring the total project and fellowship allocations for the year 1947-48 to \$171,308.66.

The Fund also announced the appointment on July 1 of M. C. Winternitz as acting director, Board of Scientific Advisers, succeeding Stanhope Bayne-Jones, who was appointed president of the Joint Administrative Board of the New York Hospital-Cornell Medical Center (see *Science*, June 27, p. 660).

Fellowships

A limited number of Fellowships in Medicine, designed to provide an opportunity for research training in the basic medical sciences or in their application to clinical investigation, will be available through the American College of Physicians from July 1, 1948 to June 30, 1949. Stipends will range from \$2,200 to \$3,000. The closing date for applications is November 1, 1947. Forms will be supplied on request to: The American College of Physicians, 4200 Pine Street, Philadelphia 4, Pennsylvania.

The American Association of University Women is offering a series of fellowships for graduate study or research for 1948-49. The National Fellowships are open to American women for study

here or abroad, and the International Fellowships include one to enable a Latin-American woman to study in this country and others which are open to members of the International Federation of University Women. The majority carry a stipend of \$1,500. Detailed information may be obtained from the Secretary, Committee on Fellowship Awards, American Association of University Women, 1634 I Street, N.W., Washington 6, D. C.

Colleges and Universities

Iowa State College plans to build a 3-story connecting link between the chemistry and physics buildings, joining the two buildings now housing integral parts of the Institute for Atomic Research, of which F. H. Spedding is director. The new building will contain spectrographic laboratories, facilities for tracer chemistry, reading room for the joint use of the Physics and Chemistry Departments and the Institute, staff and administrative offices, conference rooms, and research laboratories.

Stanford University has disclosed the development by Lester M. Field, electrical engineer, School of Engineering, and his staff of a traveling wave radio tube which could amplify simultaneously 250,000 telephone conversations or 300 black-and-white television broadcasts or 100 in color. The slender, foot-long tube, doubling the ability of earlier models to cover a wide range of frequencies and handle a huge volume of radio traffic, differs from ordinary radio tubes in that it provides a system of lengthy exposure of microwaves to a stream of electrons from which the microwaves build up their energy. The new tube will facilitate commercial expansion of television, since the vast number of frequencies it covers will enable many television stations to operate simultaneously. It also provides a feasible method by which long-distance lines can be replaced by a chain of radio relay stations in which the tubes will provide ample amplification and room for simultaneous transmission of large volumes of telephone and radio traffic.

The University of Notre Dame has established in its Department of Aeronautical Engineering a unique engineering flight demonstration program, designed to supplement theoretical principles of aerodynamics and airplane dynamics taught in the classroom with actual flying experi-

ence. Lt. Col. Francis X. Bradley, A. C. Reserve, instructor in mathematics, is providing instruction in flight demonstration in the air, while R. S. Eickenberry, associate professor of aeronautical engineering, is conducting a concurrent series of lectures to provide the theoretical basis for the flight program.

The New Mexico School of Mines has announced the following appointments to the teaching staff at Socorro: **John Harty**, formerly associate professor of physics, St. Louis University, as professor and head, Department of Physics; **Rafael Sanchez-Diaz**, formerly professor and head, Department of Mathematics, College of Agriculture and Mechanical Arts, University of Puerto Rico, as professor and acting head, Department of Mathematics; **William W. Long**, formerly an exploration engineer with the Freeport Sulphur Company of New York, as assistant professor of mining engineering; and **Albert A. Koch**, of Pasadena, California, as associate professor of engineering.

A \$200,000 contract for leather research centering at the Tanners' Council of America Laboratory on the University of Cincinnati campus has recently been renewed by the Quartermaster General of the Army. This research program, which has been under way for several years, involves the following projects and institutions: University of Cincinnati—production of highly water-resistant leather for Army shoes, study of temperature and humidity conditions and their effect on leather held in stock piles, and development of synthetic tanning materials; Massachusetts Institute of Technology—basic research on the composition and structure of skins; Lehigh University—study of all mineral tannages; Ohio State University—development of artificial fat-like materials; Institute of Paper Chemistry—study of new tanning materials; Eastern Regional Research Laboratory, USDA, Philadelphia—improvement of military insoles; and U. S. Bureau of Standards—study of the increased wearability of leather by use of plastics and other resinous materials. Fred O'Flaherty, director of the Tanners' Council Laboratory, is coordinator of the program.

A special surgical unit for plastic and maxillofacial surgery and neurosurgery is being developed at the University of Texas Medical Branch, Galveston. This unit, which will probably be opened

in September, was planned by the late Albert Singleton. It will be under the direction of T. G. Blocker, Jr., professor of plastic and maxillofacial surgery, and Samuel Snodgrass, associate professor of neurosurgery.

At the 95th annual commencement of the Woman's Medical College of Pennsylvania, held on June 6, Louise Pearce, president of the Board of Corporators, conferred degrees on 35 graduates. Carmen C. Thomas, president of the Alumnae Association, presented special citations to members of the Class of 1897, 7 of whom are still living. Dr. Pearce announced plans for the expansion program of the College, to be completed by 1950, the centennial of its founding. These include raising a \$4,000,000 fund for general endowment and for physical expansion of facilities of both College and Clinic.

Meetings

The Fourth International Cancer Research Congress, which is to meet in St. Louis on September 2-7 (*Science*, August 8, p. 124) will have as its secretary general Frank McGurk, of Montgomery, Alabama. Mr. McGurk, on detached service with the Congress through August and September, is assistant regional director and state relations officer for the American Red Cross in Alabama.

The Pennsylvania Academy of Science, which held a well-attended meeting on the campus of the Johnstown Center of the University of Pittsburgh and Johnstown Central High School, April 4-5, was addressed by J. Kenneth Doult, curator of Mammalogy, Carnegie Museum, Pittsburgh, on "Life on an Unexplored River in the Hudson Bay District." A symposium was held on flood control and soil conservation. The Junior Academy, which met at the same time, was attended by a large number of enthusiastic junior scientists from all parts of the state. The spring 1948 meeting is scheduled to be held at Grove City College; the summer 1948 meeting, at State Teachers College, Kutztown; and the spring 1949 meeting at Franklin and Marshall College.

The Eighth World's Poultry Congress will be held in Copenhagen, Denmark, in the summer of 1948. Morley A. Jull, Poultry Department, University of Maryland, who was recently elected vice-

president, U. S. Executive Committee on the Congress, has explained that these Congresses are held under the auspices of the World's Poultry Science Association, an international organization composed of government poultry leaders, experiment station research workers, college teachers and extension personnel, and poultry producers and distributors. Regulations on the marketing of poultry products and the control of poultry diseases in the various countries are discussed, as are methods of conducting extension work among farmers and commercial poultrymen, and practical problems confronting producers in the breeding, feeding, incubation, management, and marketing of all classes of poultry.

The International Geographical Union is to hold its next Congress in Lisbon, Portugal, in September 1948. Among the topics to be considered are cartography, physical geography, biogeography, human and economic geography, colonial geography, the history of the subject, and methodology. Further information may be obtained from George B. Cressey, head, Department of Geography, Syracuse University, who has recently been appointed chairman of the National Committee of the United States. This Committee serves under the Division of Geology and Geography, National Research Council.

The Office of Naval Research is supporting a program of biological research at Pt. Barrow, Alaska, in a project called the Pt. Barrow Arctic Science Station. The initial biological program will be carried out by Laurence Irving, Per F. Scholander, Reidar Wennesland, Walter Flagg, and Erik T. Nielsen, of the Department of Zoology, Swarthmore College, and Donald R. Griffin and Raymond J. Hock, of the Department of Zoology, Cornell University, working under contracts between their respective institutions and the Office of Naval Research.

In order to assess the basic biological conditions of Arctic life, the party will study the metabolism of warm- and cold-blooded animals, the expenditure and economy of animal heat, and the orientation and metabolism of Arctic birds during migration. Following these studies through the transition from summer to winter and from winter to summer will give evidence concerning the basis for

biological acclimatization and adaptation to an Arctic environment, to the stresses imposed by climate, and to the profound and rapid seasonal changes which occur.

Pt. Barrow, the only station in the possession of the United States lying within the Arctic circle, faces an Arctic ocean with shores, waters, and ice biologically only little explored. Southward, the tundra land rising gradually to the Brooks Range has not been studied in its biological details. Over these regions modern transportation is rapidly extending geographical, geological, aerological, and oceanographic surveys, which provide clear outlines upon which to examine the patterns of Arctic life and its active adjustments to many of the high-latitude conditions which cover large and important areas of the earth. These areas have hitherto been screened from view by the difficulties of travel and existence. Now that Arctic outposts have become accessible, it is possible to carry on detailed and consistent studies of Arctic biology which will permit accurate descriptions of life in high latitudes. Scientific experience upon the cold frontiers of the North will also improve, by the contrasts which it presents, our knowledge of life in other climates.

According to Laurence Irving, director, Edward Martion Biological Laboratory, Swarthmore College, from whom the announcement was received, "it is believed that the initiation of this program will lead to sustained biological research in the Arctic which will develop the means for making human life in the Arctic more effective and more interesting."

The American Library Association, 50 E. Huron Street, Chicago, has just published a new *Subject guide to United States government publications*, by Herbert S. Hirshberg and Carl H. Melinat. The book, which sells for \$5.00, presents documents by subject rather than by office of issue. The documents analyzed are selected from those of the last 20 years, with emphasis on the more recent ones and on subjects of continuing and current interest. Some 1,200 subjects are covered in its 236 pages, and many cross-references and bibliographies are included.

A new international journal of genetics is currently being published by Oliver and Boyd, Ltd., of London and Edinburgh. Bearing the title *Heredity*, the journal, which will devote itself

principally to original articles, will appear three times a year. Volume I, Part I, was published in July. The editors are C. D. Darlington, John Innes Institution, London, and R. A. Fisher, Whittingehame Lodge, Cambridge, England. The first issue contains a section on genetic research in Britain, 1939-45; a bibliography of Italian and German research for the same period; and original articles by Th. Dobzhansky, Ø. Winge and E. Ditlevsen, D. Lewis, Otto H. Frankel, Sydney C. Harland, L. L. Cavalli and G. Magni, D. S. Falconer, and Margaret E. Wright. Single numbers sell for 14/-, or \$3.00 net; an annual subscription, for 40/-, or \$8.50.

The Helen Hay Whitney Foundation for basic scientific research in rheumatic fever has recently been formed. T. Duckett Jones has been appointed medical director of the Foundation, with temporary offices in the New York Hospital, 525 East 68th Street, New York City.

The formation and functions of the Associates of the Food and Container Institute were revealed at a press conference in Chicago on August 7. The new nonprofit organization, comprised of companies and corporations in the food, container, and allied industries, has listed the following objectives: (1) to promote the dissemination to industry of fundamental scientific information pertaining to foods and containers; (2) to function as a clearinghouse on research activities; (3) to attract scientists to engage in food and container research; (4) to ascertain fundamental research problems; (5) to minimize unnecessary duplication of research; (6) to keep members of the Associates informed of the Institute's activities; and (7) to assist the Institute with technical information relating to industrial experience and practice. The chairman of the Interim Board of Directors, which will manage the affairs of the Associates prior to a regular election, is Harry J. Williams, Wilson and Company, who is also chairman of the Executive Committee. Offices of the Associates are located at 1849 W. Pershing Road, Chicago 9, Illinois.

The Quartermaster Food and Container Institute now has projects under way in 15 institutions dealing with the discoloration of foodstuffs; 17 institutions are investigating the problem of rancidity; 13 are concerned with microbiological spoil-

age; 26 are working on nutritional deficiencies of foods; 24, on food acceptance research; and one project is devoted to the study of containers.

A new periodical publication appearing in two sections and entitled *Applied Scientific Research* will be published by Martinus Nijhoff, The Hague, The Netherlands, beginning in September. The two sections, (A) Mechanics, Heat and (B) Electrophysics, Acoustics, Optics, will provide a medium of publication for original technical-scientific investigations in these fields. Articles will be preferably in English, although French or German will be permitted. Subscriptions, which should be sent to the publisher, may be obtained for each section separately at 20 guilders (about \$7.60) per volume. Manuscripts should be sent to the secretary, Dr. Ir. C. W. Kosten, Laboratorium voor Technische Physica, Mijnbouwplein 11, Delft. Published under the auspices of the Central Organization for Applied Scientific Research of the Netherlands, the Netherlands Physical Society, and the Royal Institute of Engineers, the journal will be supervised by a Governing Board, an Editorial Board, and a group of foreign editors.

The British Scientific Instrument Research Association formally opened its new laboratories last month. The laboratories are located at "Sira," Southill, Elmstead Woods, Chislehurst, Kent.

Make Plans for—

Mathematical Association of America, September 1-2, Yale University, New Haven, Connecticut.

Fourth International Cancer Research Congress, September 2-7, St. Louis, Missouri.

American Astronomical Society, 77th Meeting, September 3-6, Dearborn Observatory, Evanston, Illinois.

First International Biometric Conference, September 5-6, Marine Biological Laboratory, Woods Hole, Massachusetts.

American Psychological Association, September 9-13, Detroit, Michigan.

American Association for the Advancement of Science, 114th Meeting, December 26-31, Chicago, Illinois.