biological, oceanographic, and military investigations conducted in this little known area during 1946. Approximately 60 civilian scientists and technicians participated in the resurvey, representing the U. S. Geological Survey, the Fish and Wildlife Service, the National Museum, the Navy Department, the Atomic Energy Commission, and various universities and research institutions. Four ships were assigned to the expedition including the *U.S.S. Chilton*, a transport of about 15,000 tons.

Although fishes and other marine animals from the entire lagoon area were often found to contain slight amounts of radioactivity, no large-scale changes were observed in population density of reef or pelagic animals or in the relative abundance of different species. Some coral patches in the target area showed evidence of destructive effects due to the atomic bomb explosions. Reproductive processes in living organisms appeared normal, and no morphological changes were found. Studies of permeability, salt accumulation, bioelectric potential, pigment content, photosynthesis, respiration, enzyme activity, and calcification were carried out on marine algae. Only one difference, a higher activity of the hydrogen peroxide decomposing enzyme, catalase, was noted between areas which had received heavy doses of radiation from radioactive substances and those which had not been affected by radiation. Marine bacteria and land organisms appeared unaffected by radiation. In the eastern end of Bikini lagoon the water is considerably more turbid than in the spring of 1946; the cause of this change is not well understood.

The subsurface structure of Bikini Island on the eastern end of the atoll was explored by core-drilling down to a depth of 2,556 feet, nearly two and a half times as deep as the Funa Futi boring, the only previous drilling on a coral atoll. Unconsolidated or very poorly consolidated calcareous sediments—beach rock, reef limestone, coral rubble, and calcareous sand—were found at all depths. Preliminary examination by geologists and paleontologists of the U. S. Geological Survey shows that late Tertiary corals and mollusks were encountered at 930 feet, and it is possible that the top of the Tertiary section may be considerably higher. Seismic velocity determinations in the deep hole suggest a continuous transition to more compacted calcareous materials near the bottom. On the basis of previous geophysical evidence, these may extend down to depths of one to more than two miles.

Studies of the deposition of calcium carbonate indicate a rate of upward growth of the reef of about 1 mm. per year.

Twenty-four dredge hauls were made on the outer slopes of the reef. These show that the outer slope consists near the surface of large blocks of limestone mixed with calcareous sand. The size of the blocks decreases with depth from several tons near the surface to several hundred pounds at depths of more than 200 fathoms. Below 200 fathoms these limestone blocks are rare. From 10 to 100 fathoms, living corals, algae, bryozoa, sponges, and other forms are present in abundance. The profusion and variety of life decreases rapidly with depth; below 100 fathoms the predominant forms are foraminifera, algae, a few deep-water corals, sponges, and brachiopods.

NEWS *and Notes*

The winners of the two $1,000 AAAS-George Westinghouse Science Writing Awards for 1947 were selected in New York City on November 20. George A. Keaney, feature writer on the *New York World-Telegram* won the 1947 Newspaper Writing Award for his series of five stories on blood, and more especially on the Rh factor of blood, which appeared in the *New York World-Telegram*, March 18–22, 1947. This year's Magazine Writing Award was won by Steven M. Spencer, associate editor of the *Saturday Evening Post*, for his story, "New Hope for the Anemic" (an article on folic acid), which appeared in the December 14, 1946, issue. The judges further recommended that honorable mention for the Magazine Writing Award be given Lorus J. and Margery J. Milne, free-lance writers, for their article, "The Life of the Water Film," published in the June 1947 issue of *Natural History*.

A newspaperman for only three years, Mr. Keaney had taught English and civics in the Lawrence, Massachusetts, high school for 13 years. He was born in Lawrence in 1906 and later received his A.B. and M.A. degrees in English from Boston College.

Steven Spencer was awarded a Nieman Fellowship in Journalism at Harvard University in 1939 while he was employed on the *Philadelphia Bulletin* as staff science writer. He later contributed articles to the *Saturday Evening Post* and joined its staff in 1946. Mr. Spencer was born in Omaha, Nebraska, and received an A.B. degree in English at the University of Pennsylvania. He is now living in Swarthmore, Pennsylvania.

The Milnes have contributed to several general circulation magazines during the last year as free-lance writers. They are now living in Burlington, Vermont, where Dr. Milne is associate professor of zoology in the University's Department of Zoology. Mrs. Milne was formerly associate professor of biology at Beaver College, Jenkintown, Pennsylvania.

The $1,000 Newspaper Writing Award was made for the first time at the Boston meetings of the AAAS in Chicago, and the Magazine Writing Award was incorporated into the annual program for the 1947 contests. Both of the 1947 awards will be made at a presentation dinner on December 27 during the AAAS meetings in Chicago. Upon this occasion Dr. Shapley will act as toastmaster, and the guest speaker will be George Stoddard, president of the University of Illinois. Through funds provided by the Westinghouse Educational Foundation of the Westinghouse Electric Corporation and under the administration of the AAAS, the annual science writing awards are made in an effort to stimulate and maintain a high standard of science reporting for the lay public through the newspapers and the general circulation magazines.

The judges selecting the 1947 winners were: Benjamin McKelway, editor of the Washington *Star*, and H. L. Mencken, of the Baltimore *Sun* papers, representing newspapers; Clifton Fadiman, of *'47*, and Edward Weeks, of the *Atlantic*, representing magazines; Kenneth Olson, of the Medill School of Journalism of Northwestern University, and Rudolf Flesch, author of *The art of plain talk*, general representatives; and Detlev Bronk, chairman of the National Research Council, and Edward Weidlein, of the Mellon Institute for Industrial Research, representing science. Dr. Morris Meister acted as chairman of the judging panel.

Visible Directory, Chicago Meeting

Advance registrants, please note: As soon as your hotel reservation in Chicago has been made, either notify the Washington Office of the name of your hotel or, upon your arrival in Chicago, give this information to the attendant at the Information Booth in the Stevens Hotel for posting in the Visible Directory.

About People

James B. Sumner, professor of biochemistry, Cornell University, and the first to crystallize an enzyme, has been appointed director of the Laboratory of Enzyme Chemistry, recently established by the trustees of Cornell University. Dr. Sumner was co-winner of the 1946 Nobel Prize in Chemistry. The new laboratory will be located in Savage Hall, the new building of the School of Nutrition (*Science*, October 10, November 14).

Samuel C. Schmittle has been appointed assistant in the Department of Veterinary Pathology and Hygiene, University of Illinois College of Veterinary Medicine. Dr. Schmittle was graduated from the Ohio State Veterinary College in 1947.

John C. Keresztesy, chemist, Cancer Research Laboratory, Mt. Sinai Hospital, New York City, has been commissioned in the U. S. Public Health Service and has been assigned to the Physiology Division, National Institute of Health, Bethesda, Maryland.

Florence B. Seibert, associate professor of biochemistry, Henry Phipps Institute, University of Pennsylvania, received the honorary D. Sc. degree from Lafayette College, Easton, Pennsylvania, at the Founders' Day exercises, October 18.

Thomas G. Digges, a member of the Metallurgy Division, National Bureau of Standards, since 1920, has been appointed chief, Thermal Metallurgy Section, succeeding **D. J. McAdam,** chief of the Section since 1930, who retired August 31.

Grants and Awards

A publication of the American Chemical Society, *Industrial and Engineering Chemistry*, has been awarded first prize for 1947 for "the best issue devoted to a single theme" in the annual competition sponsored by *Industrial Marketing*, Chicago, among the nation's business journals. The award, a silver plaque, was conferred in recognition of the quality and scope of articles on the utilization or disposal of industrial wastes which made up the May issue of the journal, which is edited by Walter J. Murphy, Washington, D. C.

The Seventh Annual Science Talent Search, sponsored by Westinghouse Electric Corporation and Science Service, is now under way. Examinations will be given to the contestants from December 1 to 26, the closing date. From the 300 top-ranking contestants, 40 will be chosen for all-expense trips to the five-day Science Talent Institute in Washington, D. C., February 27 through March 2, 1948, during which the winners will be selected. One girl and one boy will receive $2,400 Westinghouse Grand Science Scholarships ($600 a year for four years) and 8 others will receive scholarships of $400 ($100 a year for four years). An additional $3,000 worth of scholarships may be awarded to others of the 40 at the discretion of the judges. Concurrently with the national talent search, 9 states (Alabama, Georgia, Illinois, Iowa, Louisiana, Montana, Pennsylvania, Tennessee, and Virginia) will conduct state searches through a special arrangement with Science Clubs of America. The judges are Harlow Shapley, director, Harvard College Observatory, and president of the AAAS; Harold A. Edgerton and Steuart Henderson Britt, psychologists of New York City; and Rex E. Burton, psychiatrist of Washington, D. C. By discovering and developing scientific ability at the high school level the two sponsoring institutions, Westinghouse and Science Service, are playing a major role in relieving the critical shortage in scientific talent which is the growing concern of most countries of the world today. More complete information on this program may be obtained from Science Clubs of America, 1719 N Street, N. W., Washington 6, D. C.

The Research Corporation, New York, has recently made several awards of interest. Two physics teachers, **A. A. Knowlton,** Reed College, Portland, Oregon, and **Clifford N. Wall,** formerly at North Central College, Naperville, Illinois, and now at the University of Minnesota, received special awards of $1,000 each for distinguished teaching. A survey had shown that of all physicists granted Ph. D. degrees in this country between 1936 and 1945, an outstanding number had been undergraduates at Reed and North Central. Two other awards, each consisting of a plaque and a $2,500 honorarium, went to **Lee A. DuBridge,** president, California Institute of Technology, "for his outstanding scientific achievements in directing the Radiation Laboratory of OSRD in the field of microwave radar research, development, and application to national defense," and to **Merle A. Tuve,** of the Carnegie Institution of Washington, in recognition of his scientific contributions in making possible the proximity fuse and his administration of the various groups which equipped the Armed Forces with the device.

William F. Meggers, chief, Spectroscopy Section, National Bureau of Standards, Washington, D. C., was the recipient of the Frederick Ives Medal, presented by the Optical Society of America at its 32nd annual meeting at the Netherland Plaza Hotel, Cincinnati, Ohio, October 24.

The University of Pennsylvania has received a grant of $155,000 from the Carnegie Corporation which is to be extended over a five-year period for the support of a program of Indian and related Asian studies. The program, including both teaching and research and combining the activities of several fields and departments, will include studies of the cultural, political, social, economic, historical, anthropological, and other aspects

of the national life in relation to one another and to the total character of present-day civilization in the Union of India and Pakistan. A special department to be created for administration of the program will be directed by **W. Norman Brown,** professor of Sanskrit and chairman, Department of Oriental Studies, who is now en route to India and Pakistan. The program, designed to train students in many different disciplines to apply their particular techniques to research and study of the Indian aspects of those fields, and to train them for government, business, teaching, and other types of service in India, will be in full operation by the fall of 1948.

Colleges and Universities

The University of Illinois, Division of Biological Sciences, will sponsor three lectures at Urbana by **R. Ruggles Gates,** emeritus professor of botany, University of London. The first lecture, December 1, will be on the topic, "The Evolution of Man." On December 2, Dr. Gates will deliver addresses on "Some Principles of Human Genetics" and "The Nature of Species."

The University of Chicago Cancer Research Foundation has launched a campaign to raise the funds needed to provide Chicago with a very modern and complete cancer center. The sum of $2,580,000 has already been provided for this program, including $1,600,000 for the Nathan Goldblatt Memorial Hospital and $980,000 toward the construction of a new 170-inch cyclotron. Immediate objective of the campaign is to raise the additional $570,000 necessary to complete the financing of the cyclotron, which has promise, theoretically, for deep radiation, and will be used extensively for research toward this end. It has been so designed that patients may be brought to it for treatment. Final objective is $2,000,000 for an isotope laboratory, which will be the first building designed for research with radioactive isotopes. Plans for the campaign were outlined at a civic dinner, November 10, in the ballroom of the Stevens Hotel, Chicago, at which, Charles B. Huggins, of the University of Chicago, who developed one of the first chemical tests for cancer, gave an address on "New Horizons in Cancer Research," and Enrico Fermi, Nobel Prize winner and distinguished service professor of physics at the University, spoke on "Atomic Energy—Servant of Mankind." The 1,000 guests present also heard special messages from President Truman, who was represented by his personal physician, Brig. Gen. Wallace H. Graham; Martin H. Kennelly, mayor of Chicago; and Maurice Goldblatt, president of the Cancer Research Foundation.

Iowa State College will have in operation by next spring a new food-processing laboratory, with equipment on a semi-commercial scale for research in canning, freezing, and dehydrating. The building is a two-story barracks-type which will be moved from the Ottumwa naval air base to the Iowa State campus. The processing laboratory and an evaluation laboratory for testing results will be on the ground floor. The second floor will contain an analytical laboratory, classrooms, and space for graduate students to work. Research work will be carried on by the horticulture subsection of the Iowa Agricultural Experiment Station. **E. S. Haber,** head, Department of Horticulture, and **Robert G. Tischer,** research associate professor in charge of food-processing research, will be in charge of the laboratory. The work in the new laboratory will involve cooperation with the Departments of Poultry Husbandry, Home Economics, Bacteriology, Animal Husbandry, and others.

The University of Illinois Graduate School has been renamed the Graduate College upon the recommendation of George D. Stoddard, president of the University, in recognition of the increasing importance of advanced studies. The enrollment at the Graduate College is now 2,359, an increase of 34 per cent over last year's enrollment, which in turn had been greater than all previous enrollments. **Louis N. Ridenour,** editor-in-chief of the 28-volume McGraw-Hill series of books on the wartime developments of the Radiation Laboratory at Massachusetts Institute of Technology, is dean of the Graduate College.

Cornell University has established an endowed professorship of metallurgical engineering, named after **Francis Norwood Bard,** owner of the Barco Manufacturing Company, Chicago, who presented a fund of $250,000 to endow the professorship at a dinner given in his honor. The first occupant of the new chair is **Peter E. Kyle,** of the Cornell faculty, who will also head a broadened program in metallurgical engineering, already organized in the School of Chemical and Metallurgical Engineering, which is under the over-all direction of **F. H. Rhodes,** director of the School of Chemical Engineering since its founding in 1938. The school will continue to train chemical engineers while preparing other students for responsible positions in research, development, and administration in the metallurgical industries. The new curriculum, a five-year course leading to the degree of bachelor of engineering, already has an enrollment of 27 students. The new program stems from the pioneer interest in metallurgy of the late Robert Henry Thurston, an early leader in engineering education, who placed metallurgical engineering among the most important fields of instruction and research at Cornell University.

The Institutum Divi Thomae, Cincinnati, has appointed a Clinical Advisory Committee composed of 9 physicians and scientists to act as a consulting staff in those aspects of its research which pertain to clinical medicine. In addition to Andrew C. Ivy, vice-president in charge of the Chicago Professional Colleges, University of Illinois, who is chairman of the Committee, the membership includes, E. V. Cowdry, Washington University, St. Louis, vice-chairman; Josiah J. Moore, treasurer, American Medical Association; James H. Hutton, internist and endocrinologist, Chicago; Edward C. Compere, associate professor of orthopedics, University of Illinois College of Medicine; Karl F. Meyer, director, George Williams Hooper Foundation for Medical Research, University of California; Hobart A. Reimann, professor of medicine, Jefferson Medical College, Philadelphia; William D. Stroud, professor of cardiology, Medico-Chirurgical College, Graduate School of Medicine, University of Pennsylvania; and Albert E. Casey, assistant professor of pathology, Medical College of Alabama, Birmingham. Lawrence C. Salter, Chicago, is secretary of the Committee.

The University of Washington, Seattle, has established a Department of Meteorology and Climatology, which will offer courses in physical and synoptic meteorology, meteorological laboratory, and physical and regional climatology.

Phil E. Church is acting executive officer, and **William L. Schallert,** formerly a major in the Air Forces Weather Service, is a member of the staff.

Alabama Polytechnic Institute has added four new members to its Department of Botany and Plant Pathology: **Kenneth H. Garren,** Georgia Agricultural Experiment Station; **Donald E. Davis,** Ohio State University; **Henry S. Ward, Jr.,** Iowa State College; and **James A. Lyle,** University of Hawaii Experiment Station.

Industrial Laboratories

The Kellex Corporation, atomic energy subsidiary of the M. W. Kellogg Company, has appointed as its new director of research and development **H. Hugh Willis,** formerly chief research director and vice-president, Sperry Gyroscope Company, Inc., and vice-president, Engineering and Product Development, Eversharp, Inc. Mr. Willis will be in charge of all Kellex research and development on nuclear energy and assist in certain phases of guided missiles development.

Food Research Laboratories, Inc., Long Island City, has named **Milton Blitz** assistant to the chief chemist, and has appointed **Edward Eigen,** formerly of the Quartermaster Food and Container Institute, Chicago, to the technical staff.

Meetings

At the 32nd annual meeting of the Institute of Medicine of Chicago, to be held in the Red Lacquer Room, Palmer House, on the evening of December 2, Joseph L. Baer, Rush clinical professor emeritus of obstetrics and gynecology, University of Illinois College of Medicine, will deliver the presidential address on "American Obstetrics and Gynecology: A Mature Specialty."

The American Society of Tropical Medicine, the **American Academy of Tropical Medicine,** and the **National Malaria Society** are meeting conjointly for the first time December 2–4, in Atlanta, Georgia. The meeting will feature a symposium on "The Virus Diseases in the Tropics" on the afternoon of December 3. All those interested in tropical medicine and malaria are invited to attend the meetings.

A Conference on Methods in Philosophy and the Sciences will be held December 7 at the New School for Social Research, 66 West 12th Street, New York City. The morning program will include: "History and the Philosophy of History," Maurice Mandelbaum, Dartmouth College; and "The Great Historian and the Meaning of Truth," Kurt Riezler, New School for Social Research. The afternoon session on "American Public Policy on Science" will be a Symposium on the Report of the President's Scientific Research Board, and will include the following: "Selig Hecht, 1892–1947," Leslie C. Dunn, Columbia University; "The National Planning of Science," Robert F. Steadman, Wayne University, and staff member, President's Scientific Research Board; "Scientific Freedom and National Planning," P. W. Bridgman, Harvard University; and "Science and Secrecy," James R. Newman, Yale University Law School. A discussion from the floor will follow both sessions. All those interested are invited to attend. Registration fee is $1.00.

The American Mathematical Society will hold its 54th annual meeting at the University of Georgia, Athens, December 29–31, in conjunction with the annual meeting of the Mathematical Association of America. The sessions of the Society will begin at 2:00 P. M. Monday and continue through Wednesday. The Association will meet Thursday morning and afternoon. P. M. Morse, Massachusetts Institute of Technology, will deliver the 21st Josiah Willard Gibbs Lecture on "Operational Research," on Monday at 8:00 P. M. On Tuesday at 2:00 P. M., E. F. Beckenbach, University of California at Los Angeles, will speak on "Convex Functions." There will also be an address on applied mathematics, the title and name of the speaker to be announced later. The Board of Trustees will meet on Monday, and the Council on Tuesday evening. The Annual Business Meeting and Election of Officers will be held Wednesday at 9:30 A. M.

The American Physical Society will hold its annual meeting at Columbia University, January 29–31. Programs are now being arranged by the Division of Electron Physics, the Division of Solid-State Physics, and the Committee representing the nascent Division of Fluid Dynamics. Those desiring to present papers at the meeting should submit titles and abstracts (not over 200 words) in duplicate to Karl K. Darrow, secretary, American Physical Society, Columbia University, New York 27, New York, before December 9. A maximum of 10 minutes will be allowed at the meeting for the oral presentation of a contributed paper.

The 10th annual Midwest Power Conference, sponsored by Illinois Institute of Technology, will be held April 7–9, 1948, at the Sheraton Hotel, Chicago, with Stanton E. Winston, of the Institute staff, as director. Cooperating institutions are: Iowa State and Michigan State Colleges; Northwestern and Purdue Universities; the Universities of Iowa, Illinois, Michigan, Minnesota, and Wisconsin; the Illinois section of the American Society of Civil Engineers; Illinois chapter of American Society of Heating and Ventilating Engineers; Western Society of Engineers; Engineers' Society of Milwaukee; and the Chicago sections of the American Institute of Electrical Engineers, American Institute of Mining and Metallurgical Engineers, and American Society of Mechanical Engineers.

The American Dairy Science Association will hold its 43rd annual convention at the University of Georgia, Athens, June 14–16, 1948, making the first time the Association has met at a school farther south than the University of Kentucky. About 600 leading dairy scientists are expected to attend the meeting. The Association's president is Paul H. Tracy, professor of dairy manufactures, University of Illinois.

The Chinese Association for the Advancement of Science (formerly the Science Society of China) held its 25th annual meeting August 30–September 1 at the Academia Sinica and National Medical College of Shanghai, with the Natural Science, Astronomical, Meteorological, Geographical, Zoological, and Anatomical Societies of China participating. H. C. Zen presided over the meeting. The program included addresses by W. H. Wong, who spoke against the secrecy of scientific research and its results, and by K. C. Chu, who emphasized the utilization of scientific knowledge for

peace; the presentation of papers in the various sections; and discussions among the members on "Atomic Energy and Peace" and "Improvement of Scientific Education in China."

The members of these 7 Chinese scientific societies wish to place on record their unanimous opinion with respect to (1) the control of atomic energy and (2) the development of scientific research in China:

(1) "We feel that the probing into the mysteries of atomic energy, like scientific research work in all other fields, should have as its objective the promotion of human welfare. The atomic nucleus was successfully cracked at a time when the democracies were locked in a life-and-death struggle with the totalitarian states. Quite naturally it was taken advantage of in the making of weapons of war. This is a misfortune for atomic energy and also for scientific research. Now that the war has been concluded and the democracies are endeavoring to bring about world cooperation, it is our conviction that atomic research should be freed from its closely guarded secrecy to be directed toward the advancement of world peace and welfare of the human races. We object to the application of achievements in atomic research for the manufacture of bombs and other weapons and emphatically to the competition in, or secrecy attached to, such manufacture, which threatens the friendly ties among democratic countries and jeopardizes the freedom of scientific research. Therefore we unreservedly pledge our support to the stand of the Association of Science for Atomic Education and the Federation of American Scientists.

(2) "We Chinese as a race are still facing starvation and other acute shortages in this atomic age, backwardness in the development of science being one of the causes. The significance of scientific development lies in its power to raise proportionately the standard of living. We have never before given sufficient emphasis to the fundamental sciences and cannot hope suddenly to acquire a mature status in scientific work by the importation of a few instruments for atomic studies. We must lay the foundations first by the strengthening of the physical equipment for science education and by extending adequate facilities and stable living conditions to our teaching and research personnel. What is more important, we should adopt a definite and long-range plan for the development of scientific undertakings with the necessary budgets to carry it out to the fullest extent. The discontinuation of the YVA project shortly after its inception is an example that we hope will not be repeated. If we want science to serve as an important contributing factor in the reconstruction of the nation, we believe it must be made to stand on firmer ground. Scientific development cannot be bought ready made, as some people thought half a century ago that it could be in the form of firearms and gunboats."

Elections

United Engineering Trustees, Inc., at its annual meeting October 23 in the Engineering Societies Building, 29 West 39th Street, New York, elected J. Schuyler Casey, president, M. H. Treadwell Company, Inc., New York, as president; Gen. William H. Harrison, chief engineer, American Telephone and Telegraph Company, New York, and director, Procurement and Distribution Service, Office of Chief Signal Officer, Washington, D. C., as vice-president; Edward C. Meagher, assistant to the president, Texas Gulf Sulphur Company, New York, as vice-president; Kurt W. Jappe, retired director of purchases, Hercules Powder Company, Wilmington, Delaware, as treasurer; James L. Head, Department of Mines, Chile Exploration Company, New York, as assistant treasurer; and John H. R. Arms was re-elected secretary.

At the 20th annual meeting of the Texas Archaeological and Paleontological Society, October 25, Cyrus N. Ray, Abilene, Texas, was elected president for the 20th consecutive year; Tom N. Campbell, Austin, was elected vice-president; Earnest Wallace, Lubbock, secretary-treasurer; and W. C. Holden, Lubbock, editor of publications. Other officers elected included Alex Krieger, Austin, Rupert N. Richardson, Abilene, and Joe Ben Wheat, Tucson, Arizona, as directors, 8 regional vice-presidents, and 8 trustees.

The Ohio Branch, Society of American Bacteriologists, elected the following officers at its Autumn Conference October 25 on the Ohio State University campus: Orton K. Stark, Miami University, president; John Dingle, Department of Preventative Medicine, Western Reserve University, vice-president; and H. H. Weiser, Department of Bacteriology, Ohio State University, secretary-treasurer. Robert Parker, College of Medicine, Western Reserve University, was elected consular to the Society of American Bacteriologists, and Lloyd C. Ferguson, Department of Bacteriology, Ohio State University, member of the Policy Committee.

The Engineering Foundation, at the annual meeting of its Board, October 16, in the Engineering Societies Building, New York, elected as officers for the coming year: A. B. Kinzel, vice-president, Union Carbide and Carbon Research Laboratories, Inc., chairman; L. W. Chubb, director, Westinghouse Research Laboratories, vice-chairman; Edwin H. Colpitts, formerly vice-president, Bell Telephone Laboratories, director; and John H. R. Arms, secretary. Newly appointed to the Executive Committee were: George L. Knight, formerly vice-president, Brooklyn Edison Company; and Joseph W. Barker, president, Research Corporation.

NRC News

The name "Committee on Aviation Psychology" has been substituted for "Committee on Selection and Training of Aircraft Pilots" to designate a committee of the Division of Anthropology and Psychology which has conducted research in the field of aviation psychology since 1939. As in the past, the work of the Committee is supported with funds allotted by the Civil Aeronautics Administration, although steps have recently been initiated to undertake research for other government agencies.

The Committee has from its very beginning conducted research involving the maintenance as well as the selection and training of aircraft pilots. Among the more than 70 reports published by the Committee in the Technical Series, Division of Research, Civil Aeronautics Administration, there are many which are concerned with the psychological aspects of fatigue, accidents, air sickness, etc. The change in name, which has been under consideration for some time, has been made in order to describe Committee functions more accurately.

The current research program of the Committee on Aviation Psychology, which is largely concerned with air transport pilots and, most particularly, with human factors in airplane accidents, includes

research on the selection, upgrading, and certification of pilots; studies of stall-warning devices; psychological aspects of instrumentation; and investigation of methods of training civilian and commercial pilots. Such research is being conducted through The Ohio State University, the American Institute for Research, the Educational Research Corporation, and other agencies. The Executive Subcommittee will be pleased to consider proposals for grants-in-aid to research personnel working in universities and other institutions who are interested in carrying out investigations in the field of aviation psychology under the auspices of the Committee. Proposals should be submitted to: M. S. Viteles, Chairman, National Research Council Committee on Aviation Psychology, University of Pennsylvania, Philadelphia, Pennsylvania.

The present membership of the Committee includes: Brigadier Gen. Milton W. Arnold, vice-president, Operations & Engineering, Air Transport Association of America; Cdr. Norman L. Barr, Division of Aviation Medicine, Bureau of Medicine & Surgery, Navy Department; George K. Bennett (*ex officio*), president, Psychological Corporation; D. R. Brimhall, assistant to the Administrator for Research, CAA; Paul M. Fitts, chief, Psychology Branch, Aero Medical Laboratory, Wright Field; Frank A. Geldard, professor of psychology, University of Virginia; Capt. B. Groesbeck, Division of Aviation Medicine, Bureau of Medicine & Surgery, Navy Department; Major Gen. Malcolm C. Grow, Air Surgeon, Army Air Forces; George E. Haddaway, editor, *Southern Flight*, Air Review Publishing Corporation; A. I. Hallowell (*ex officio*), chairman, Division of Anthropology and Psychology, and professor of anthropology, University of Pennsylvania; J. G. Jenkins, head, Department of Psychology, University of Maryland; Capt. Wilbur E. Kellum, U. S. Navy, School of Aviation Medicine, Pensacola, Florida; Peter C. Kronfeld, associate professor of ophthalmology, and director of education, Illinois Eye and Ear Infirmary, University of Illinois; Jerome Lederer, chief engineer, Aero Insurance Underwriters; Donald B. Lindsley, professor of psychology, Northwestern University; W. R. Miles, professor of psychology, School of Medicine, Yale University; C. L. Shartle, professor of psychology, The Ohio State University; Lt. Col. Anthony C. Tucker, Office of the Air Surgeon, Headquarters, Army Air Forces; and M. S. Viteles (chairman), professor of psychology, University of Pennsylvania.

Cdr. Barr, Drs. Bennett, Brimhall, Fitts, Geldard, Hallowell, Lindsley, and Viteles, and Capt. Kellum and Lt. Col. Tucker make up the Executive Subcommittee.

Recent Deaths

Erik Lysholm, 55, Swedish radiologist who produced the first "precision skull apparatus" and who also contributed the so-called "fixed" or "Swedish grid," died in Stockholm September 26.

Mrs. David R. Merrill, 52, died October 8 at Burlington County Hospital, Mt. Holly, New Jersey.

George W. Wilson, 57, dean, Marquette University Dental School, died in Milwaukee November 11, after a long illness.

Clovis Vincent, 68, chief, Neurosurgical Services, Pitie Hospital, Paris, France, and a noted brain surgeon, died November 14.

George Grant MacCurdy, 84, professor emeritus of anthropology, Yale University, and retired director, American School of Prehistoric Research, Washington, D. C., was fatally injured November 15, when he was struck by an auto while crossing the road on Route 29, near North Plainfield, New Jersey.

William M. Malisoff, 52, director, Longevity Research Foundation, New York City, and formerly associate professor of biochemistry, University of Pennsylvania, and Brooklyn Polytechnic Institute, died November 16 at his New York home after a day's illness. Dr. Malisoff had edited *Philosophy of Science* since 1934.

A Mission on Science and Technology will soon be established in the U. S. Embassy in London. According to a joint White House and Department of State release, the Mission staff will be a small one, headed by **Earl A. Evans, Jr.,** chairman, Department of Biochemistry University of Chicago. These scientists and engineers will be assigned for short-term periods on a rotating basis. Main duty of the Mission will be to supply to interested individuals and agencies in Great Britain information concerning current developments in such fields as organic chemistry, biochemistry, physics, engineering, biology, and agronomy, and to collect similar information on British developments for dissemination to government agencies and scientific societies in this country. Specifically, the Mission will also assist in facilitating exchange of scientific personnel, develop and continue close personal contact with government agencies and research institutions in the United Kingdom, answer inquiries about particular developments in Great Britain originating in this country, and stimulate exchange of reports of a scientific and technical nature. Such an arrangement was recommended by John R. Steelman, special assistant to the President, in his series of reports entitled *Science and public policy*. The British have for some time maintained in the United States the British Commonwealth Scientific Office, which has proved extremely successful. In a letter to the Rt. Hon. Herbert Morrison, Lord President of the Council, London, dated October 30, Mr. Steelman, in announcing the proposed establishment of the Mission, stated that "an exchange of ideas and information, in accordance with the freedom that has always characterized the relations between scientists in our two countries, should result in substantial benefits not only to specialists in the fields of science, medicine, and engineering, but to all citizens in both our Nations."

The Committee on Russian Literature of the Geological Society of America has begun the compilation of a list of translations of geologic papers and books from Russian into English—that is, a list of translations extant in manuscript form in the United States. The readers of *Science* are requested to send information concerning any such translations to the committee chairman, Ronald K. DeFord, Box 1814, Midland, Texas, or to Geological Society headquarters, 419 West 117th Street, New York 27, New York. The word *geologic* is used here in its widest sense to extend inclusively from geophysics to paleontology.

If information about translations of *recent* publications is received soon enough, it will be included in forthcoming volumes of the *Bibliography and index of*

geology exclusive of North America and the *Bibliography of economic geology*, subject to permission from proprietors of translations.

The National Applied Mathematics Laboratories, which sprang from the realization by the Office of Naval Research in 1946 of an urgent need for a national center where facilities and staff would be available to develop and use new high-speed computing machines in service to the field of applied mathematics, has now been established as a division of the National Bureau of Standards. The center is headed by **John H. Curtiss,** formerly director's assistant in applied mathematics at the Bureau. The work of the new division, concentrating on mathematical statistics as applied to the physical and engineering sciences, will be carried on with the advice of an Applied Mathematics Council made up of representatives from interested government agencies and private organizations.

Within the new center are four separate laboratories: the Institute of Numerical Analysis, on the campus of the University of California at Los Angeles, which, under the auspices of the Office of Naval Research, will do research and training in mathematical fields best suited to the use and development of high-speed automatic digital computing machines, and also provide computing service for local groups; the Computation Laboratory, headed by **Arnold N. Lowan,** formerly technical director, Mathematical Tables Project, and also underwritten by ONR, which will continue the work of the Mathematical Tables Project and provide a computing service for use by private industry, government agencies, and educational and research institutions; the Statistical Engineering Laboratory, headed by **Churchill Eisenhart,** formerly senior staff member, Statistical Research Group, Columbia University, which will provide a consulting service on methods of statistical inference as applied to engineering and physical sciences for government and private agencies, and training in the theory of statistics; and the Machine Development Laboratory, headed by **E. W. Cannon,** statistical engineering officer, Bureau of Ships, which will develop and construct the new computing machinery according to the specifications set forth by the other laboratories, the Office of Naval Research, the Bureau of the Census, and other government agencies.

The carnivorous Army Ants will be the subject of a study by a field group which left the American Museum of Natural History for Panama, November 4. **T. C. Schneirla,** curator, Department of Animal Behavior of the Museum, who heads the expedition, was accompanied by **Ernest Enzmann,** research associate in zoology, Massachusetts Institute of Technology, and **Robert Z. Brown,** graduate student of zoology, Swarthmore College. The group will spend 5 months on Barro Colorado Island in Gatun Lake and in the Darien country of eastern Panama. The Army Ant derives its name from its highly military society; it moves in colonies of 65,000 and more in long, narrow columns sometimes stretching out 300 yards. The ants move in regular cycles traveling nightly for 17 days and resting for 20. When on the move, they send out flanking columns for scouting and food securing. The field group hopes to discover how the ant colony queens are formed, and how and why the queen ants possess the ability to produce broods at regular intervals of 36 days throughout the year, all of these broods but one consisting of about 30,000 nonreproductive workers; the remaining brood consists of about 3,000 males born in the dry season. A brood containing queens may prove to be another exception.

From the waste pulp of the coffee bean comes a new corn-substitute cattle feed for milk production, developed through the cooperative effort of agricultural technicians of the United States and El Salvador. Tests under specific conditions have proved that the coffee pulp can be substituted, pound for pound, for corn as cattle feed for milk production. Coffee pulp is the fleshy covering of the bean and is largely a waste product, and although it has limited use as a fertilizer, its disposal has usually been a problem. In recent years the potential value of coffee pulp as a feed has been recognized by **Felix Choussy,** Instituto Tecnologico, El Salvador, and **R. L. Squibb,** formerly of the Inter-American Institute of Agricultural Science. Studies regarding the substitution of dried coffee pulp for corn in the ration of milk cows were conducted in El Salvador by **Samuel H. Work,** Office of Foreign Agricultural Relations, and **Mario Lewy Van Severen,** chemist, and **Louis Escalon,** dairying technician, El Salvador. It has been found that the palatability of the pulp is increased by mixing it with banana leaves, molasses, or other feedstuff. Additional tests will be made at the U.S. Department of Agriculture's research center, Beltsville, Maryland, and at various other state experiment stations.

Marine life in the Bikini lagoon appears little changed by the atomic bomb radiations, according to the observations of **Leonard P. Schultz,** curator of Fishes, Smithsonian Institution, who has just returned from Bikini after taking part in the Bikini Scientific Resurvey carried out by the Navy Department in cooperation with the Army and other government agencies. Dr. Schultz explained that undoubtedly enormous numbers of fish and other marine organisms were killed by the bomb explosion, but their places have been filled by overpopulation pressure from outside the immediate explosion area, with the result that life seems about as abundant as ever. There was no observable sterility caused by the continued radioactivity, as various specimens were found spawning in normal fashion. Genetic effects or possible weaknesses from continued radiation are impossible to discern at this early date.

Make Plans for—

American Academy of Pediatrics, annual meeting, December 9, Dallas, Texas.

National Council of Geography Teachers, December 27–29, Charlottesville, Virginia.

American Society for Professional Geographers, December 27–30, Charlottesville, Virginia.

American Anthropological Association, December 28–31, Albuquerque, New Mexico.

American Astronomical Society, December 28–31, Ohio State University, Columbus, Ohio.

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