it is unlikely it could have escaped description if it had been previously observed. The conclusion is that either the prevalence of the disease has increased greatly or there is a new agent, as yet unidentified, in the environment.

Symptoms are shortness of breath, usually associated with cough and sometimes with fatigue and loss of weight. The characteristic of the disease is the filling of the alveoli with granular proteinaceous material. There is little or none of the inflammatory reaction observed in pneumonia. Fever was absent in most of the patients or, when present, was usually not high and occurred at intervals.

The disease may continue for years. The first patient observed, though improved and able to work, still has symptoms. Of the other 26 patients studied, one has completely recovered and four others have shown definite improvement. Eight have died, some of these from complicating fungus infections of the lung. Neither corticoids nor antibiotics seem to affect the course of the illness. The disease evidently strikes about two and a half times as many males as females. Most victims are between 20 and 50 years of age, though there has been one 2-year-old boy patient and a man of 57.

National Academy Elections

Detlev W. Bronk, president of Rockefeller Institute, has been elected to a third 4-year term as president of the National Academy of Sciences. The election took place on 29 April during the 95th annual meeting of the academy at its headquarters in Washington, D.C. Also elected were Howard P. Robertson, professor of mathematical physics at the California Institute of Technology, Pasadena, Calif., as foreign secretary, and two new members of the council of the academy: Thomas F. Francis, Henry Sewall professor of epidemiology and chairman of the department, School of Public Health, University of Michigan; and Saunders MacLane, professor of mathematics, University of Chicago.

Retiring foreign secretary is John G. Kirkwood, Sterling professor and chairman of the department of chemistry, Yale University. Francis and MacLane will succeed E. A. Doisy, director of the department of biochemistry, St. Louis University School of Medicine, and Theophilus S. Painter, distinguished professor of zoology at the University of Texas. The new foreign secretary and council members will assume their new positions on 1 July 1958. The term of the foreign secretary runs for 4 years and that of the council members, for 3 years.

At the recent meeting the National Academy also announced the election of 30 new members. Election to membership in the academy is one of the highest honors which can be conferred upon an American scientist. It is interesting to note that approximately one-third of the new members—nine of them—are naturalized American citizens.

The new members are as follows: Emil Artin, Henry B. Fine professor of mathematics, Princeton University; Dietrich H. F. A. Bodenstein, insect physiologist, Medical Laboratories, Army Chemical Center, Md.; David Bodian, professor of anatomy, Johns Hopkins University; André Frederic Cournand, professor of medicine, Columbia University, and Nobel laureate in physiology and medicine, 1956; Martin Deutsch, professor of physics, Massachusetts Institute of Technology; John Holmes Dingle, professor of preventive medicine, Western Reserve University; Marshall DeMotte Gates, assistant editor of the *Journal of the American Chemical Society* in charge of organic and biological chemistry; Walther Frederick Goebel, member, Rockefeller Institute for Medical Research; Leo Goldberg, chairman of department of astronomy at the University of Michigan and director of the McMath–Hulbert Observatory; Maurice Goldhaber, senior physicist, Brookhaven National Laboratory; William Zev Hassid, professor of plant biochemistry and biochemist at the University of California; Charles Row Hauser, professor in organic chemistry, Duke University; Alfred Day Hershey, staff member, department of genetics, Carnegie Institution of Washington, Cold Spring Harbor, N.Y.; Robert Hofstadter, professor of physics, Stanford University; Izaak Maurits Kolthoff, professor and head of the division of analytical chemistry, University of Minnesota; Henry Arnold Lardy, professor of biochemistry, University of Wisconsin; Robert Eugene Marshak, Harris professor and chairman of department of physics, University of Rochester; Robert Reynolds McMath, professor of astronomy, University of Michigan; Robert Franklin Mehl, dean of graduate studies, Carnegie Institute of Technology; Neal Elgar Miller, Angell professor of psychology, Yale University; Frank Press, professor of geophysics, California Institute of Technology, and director, Seismological Laboratory; Alfred Clarence Redfield, associate director, Woods Hole Oceanographic Institution; Dickinson W. Richards, Jr., Lambert professor of medicine, Columbia University, and Nobel laureate in physiology and medicine, 1956; David Shemin, professor of biochemistry, Columbia University; Thomas Kilgore Sherwood, professor of chemical engineering, Massachusetts Institute of Technology; Llewellyn Hilleth Thomas, member of the senior staff, Watson Scientific Computing Laboratory of International Business Machines Corporation, and professor of physics, Columbia University; Oswald Garrison Villard, Jr., professor of electrical engineering, Stanford University, and director, Stanford Radio Propagation Laboratory; Chien-Shiung Wu, associate professor of physics, Columbia University; Hatten Schuyler Yoder, Jr., petrologist, Geophysical Laboratory, Carnegie Institution of Washington; and Bruno Hasbrouck Zimm, research scientist, General Electric Company.

The following were elected as foreign associates of the academy: Per Adolf Geijer, director, Geological Survey of Sweden, Stockholm; Hitoshi Kihara, professor of genetics, Kyoto Imperial University, and director, Kihara Institute for Biological Research, Kyoto, Japan; and Max von Laue, director, Fritz Haber Institute of Max Planck Society, Berlin, Germany.

Satellites Could Be Mistaken for Missiles

John P. Hagen, director of the Navy's Project Vanguard satellite program, said recently that there was a danger that satellites passing through space could be mistaken for incoming ballistic missiles, thus precipitating a global war. In testimony before the House Select Committee on Astronautics and Space Exploration, Hagen suggested that an international commission be established to set limitations on the objects put into space. He also asked for regulations to establish the identifying radio transmitters they should carry. He pointed out that it would take "very close observation" with radar detection devices to distinguish between a dead satellite passing overhead, an incoming intercontinental ballistic missile, and a stray meteor.

North Pacific Salmon

Biologists of the Bureau of Commercial Fisheries of the U.S. Fish and Wildlife Service at Seattle, Wash., left on 1 May in two chartered schooners to continue their effort to determine which North Pacific salmon are Asiatic and which are American. Investigators from the Pacific Salmon Investigations Laboratory will make a 4-month study that will cover the central North Pacific Ocean and much of the Bering Sea from 46° to 58° North Latitude and from the West Coast to 172° East Longitude, an area of about 1,500,000 square miles.

Also participating in the high-seas studies of salmon will be vessels of the Fisheries Institute of the University of Washington, the Fisheries Research Board of Canada, and the Fisheries

Agency of the Japanese Government. The work is being conducted under the International Convention for the High Seas Fisheries of the North Pacific Ocean, signed at Tokyo, Japan, 9 May 1952.

Serving as research agency for the United States Section of the International North Pacific Fisheries Commission, the investigators are trying to determine the home base of salmon taken on the high seas. Were these salmon spawned in American or Asiatic streams? In what areas do they mingle in the high seas? By what characteristics may the Asiatic and American fish be distinguished?

This is the fourth year of the salmon studies. Results of the 1958 studies will be presented at the next meeting of the International North Pacific Fisheries Commission, to be held in Tokyo in November 1958.

National Committee of History and Philosophy of Science

The United States Committee of the International Union of the History and Philosophy of Science has been established to effect appropriate United States participation in the International Union through the National Academy of Sciences–National Research Council, which adheres to the union on behalf of the historians and the philosophers of science in the United States. The first meeting of the committee was held in January at the National Academy.

The committee is composed of Marshall Clagett, Charles C. Gillespie, Henry Guerlac, C. Doris Hellman, and Conway Zirkle, representing the History of Science Society; C. J. Ducasse, Ernest Nagel, and Henry Margenau, representing the Philosophy of Science Association; Willard van Orman Quine and J. Barkley Rosser, representing the Association for Symbolic Logic. In addition, there are ex-officio voting members in their capacity as U.S. officers of international organizations; Alfred Tarski, president of the Division of the Philosophy of Science of IUHPS; Stephen C. Kleene, president of the Association for Symbolic Logic; and Philipp Frank, director of the Institute of the Unity of Science. Finally, there are three ex-officio nonvoting members: Raymond J. Seeger, deputy assistant director of the National Science Foundation as liaison representative, and Wallace W. Atwood, Jr., and André C. Simonpietri, respectively director and associate director of the Office of International Relations of the National Academy of Sciences–National Research Council.

At the first meeting Nagel was nominated as chairman of the committee and Guerlac as vice-chairman. Hellman was appointed secretary. Three members-at-large were nominated: Percy Bridgman, Richard H. Shryock, and Carl B. Boyer. The respective appointments have been made by the president of the academy.

There are two permanent subcommittees of the National Committee, one on the History of Science and one on the Logic, Methodology and Philosophy of Science. Clagett was elected chairman of the former and Quine chairman and Margenau vice-chairman of the latter.

Radiocarbon Dates

The Committee for Distribution of Radiocarbon Dates was formed at the Conference on Radiocarbon Dating held in Andover, Mass., October 1956. The committee has created a service organization capable of (i) assembling all known radiocarbon dates, (ii) producing complete description of all dated samples on punched cards coded for sorting into universally useful categories, and (iii) distributing to subscribers this set of cards carrying complete information otherwise nearly impossible to assemble. The service organization plans to distribute some 5000 cards to each subscriber during the next 5 years, including about 3000 now available. The necessary coding and sorting equipment and index guides will be included.

However the committee must know how many sets of cards to prepare and how much cash from subscriptions may accrue to meet the expenses of production. Therefore, a questionnaire is being circulated. It is estimated that the total cost for 5000 cards will be about $250, provided a sufficient number subscribe. If only a few subscribe, the cost will be almost double this amount. For further information and a copy of the questionnaire, write to Frederick Johnson, R. S. Peabody Foundation, Box 71, Andover, Mass.

Grants, Fellowships, and Awards

Connective Tissue. The Helen Hay Whitney Foundation, which was originally established in 1947 to stimulate and support research in rheumatic heart disease, has announced its annual fellowship program. Any properly qualified person up to the age of 35, holding the M.D. or Ph.D. degree or the equivalent, who is seriously considering a career in biological or medical research, preferably relating in some way to connective tissue and its diseases, is eligible for consideration.

The applicant must have a commitment for adequate facilities and research expenses other than salary during the tenure of the fellowship from an institution or laboratory acceptable to the Scientific Advisory Committee. A contribution of $1000 will be made to the laboratory of the fellow selected.

Application forms should be requested from the Executive Secretary, Helen Hay Whitney Foundation, 525 E. 68 St., New York 21, N.Y. Applications should be mailed prior to 15 August for fellowships commencing 1 July of the following year.

In addition to the fellowship program, the foundation will select a small number of established investigators to be supported for a period of 5 years or more, such support to include salary and certain minimal research expenses. Preference will be given to past and present fellows of the foundation.

History of Science. An annual award of $250 has been established by Henry and Ida Schuman of New York City for an original prize essay in the history of science and its cultural influences. This competition is open to undergraduate and graduate students in any American or Canadian college, university, or institute of technology. Papers should be approximately 5000 words in length, exclusive of footnotes, and thoroughly documented. It is hoped that the prize-winning essay will be suitable for publication in *Isis,* the journal of the History of Science Society.

Papers may deal with the ideas and accomplishments of scientists in the past; they may trace the evolution of particular scientific concepts; or they may study the historical influences of one branch of science upon another. Essays dealing with medical subjects are not acceptable, although papers dealing with the relations between medicine and the natural sciences will be welcomed.

For further information, write to the Chairman of the Prize Committee, Prof. Raymond P. Stearns, 313 Lincoln Hall, University of Illinois, Urbana, Ill. Inquiries about the competition may also be addressed to Stearns. Papers must be received on or before 1 July.

Photobiology. Brandeis University has announced the establishment of 20 fellowships, made possible through a grant from the National Institutes of Health, to cover the costs of tuition, room, and board at the Institute of Photobiology that is to be held in Waltham, Mass., 23 June through 1 August. For further information, write to Brandeis University, Photobiology Institute, Waltham, Mass.

Public Health. Nominations for the sixth Kimble Methodology Research Award are being accepted until 1 June 1958. This award, which gives recognition to the application of scientific knowledge to the public health laboratory, was established by the Kimble Glass Company of Toledo, Ohio (subsidiary of the