

on a series of tests carried out by Operation SCUD sponsored by the Office of Naval Research and conducted by a group of specialists at New York University [*Science* 121, 629 (29 Apr. 1955)]. These tests were conducted along the East Coast and extended from operational areas as far north as Massachusetts to others as far south as Florida. The evaluation of the results from Operation SCUD was by an outside group headed by John Tukey at the Forrestal Research Center, Princeton, N.J. On the basis of this evaluation, a statement was released which said, "No evidence of any large-scale meteorological effects due to seeding."

The feeling developed within the President's Advisory Committee on Weather Control that while wide-area control was not effective, there might be possibilities of success in an operation of somewhat limited scope. Thus plans have been laid for Operation OVERSEED, which will test cloud-seeding methods from the foot of Mount Washington, highest of the White Mountains in New Hampshire. The project will begin in the fall. Silver iodide crystals will be dispersed by 10 generators used in Operation SCUD and by other types favored by commercial operators.

■ Scientists assigned to the Air Research and Development Command from the Geophysics Research Directorate of the Air Force Cambridge Research Center began balloon launchings on 5 July at Orlando Air Force Base in Florida to study the electric charges set up by thunderstorms. Information was telemetered to ground-based receivers and collected for future studies of basic facts concerning the tremendously powerful electric impulses that are generated.

Two other Air Force bases aided in the project. Radar stations at Patrick Air Force Base, Cocoa, Fla., and at Pinecastle Air Force Base, Orlando, checked the height and position of the thunderclouds and tracked the balloons in flight.

The effect of lightning discharge on the normal earth's electric field was studied simultaneously with the balloon investigations. Instruments mounted on mobile trucks were used in the lightning discharge tests.

■ Chemists at New York University have synthesized chaulmoogric acid, until recently the drug most commonly used for the treatment of leprosy. Their findings are reported in the 20 July issue of the *Journal of the American Chemical Society*. Because chaulmoogric acid has been largely replaced in leprosy treatment in the last 5 years by synthetics, any therapeutic benefits of the work are secondary, according to Kurt Mislow, assistant professor of chemistry in the Uni-

versity College of Arts and Science. He and I. V. Steinberg, former N.Y.U. research fellow, published the report.

Of chief importance is the insight the synthesis gives into the molecular structure of certain fats. Of all the seed-fat acids, chaulmoogric is unique in being a cyclic, unsymmetrical structure. Its two stereoisomers are the same when they are represented in a projection formula but are different, structurally, in space. One form is the mirror image of the other, but the two are different when they are viewed in three dimensions, and only one of the forms, the dextrorotatory one, occurs in nature. Besides synthesizing the natural form, Mislow and his colleague determined its spatial arrangement and thus, automatically, that of the unnatural or levorotatory form.

### Scientists in the News

THOMAS M. RIVERS, vice president and director of the Rockefeller Institute and director of the institute's hospital, will retire in October after 33 years of service. However, he will continue his association with the institute on an emeritus basis. Rivers graduated from the Johns Hopkins Medical School in 1915.

After serving as resident in pediatrics and instructor in bacteriology at Johns Hopkins, he joined the Rockefeller Institute in 1922. He became a member of the institute in 1927, director of the hospital in 1937, and has been vice president and director since 1953.

Rivers is an authority on virus diseases and a leader in medical research in this country. He is a member of the National Academy of Sciences, the Board of Health of the City of New York, the Public Health Research Institute of New York, and the Advisory Committee of the National Foundation for Infantile Paralysis. During World War II he held the rank of commodore in the U.S. Naval Reserve and was in charge of the Naval Research Unit at Guam.

With the announcement of Rivers' retirement, Detlev Bronk, president of the institute, also announced two new appointments: FRANK L. HORSEFALL, JR., a member of the institute, has been named vice president for clinical studies and physician-in-chief, and DOUGLAS WHITAKER, now provost and professor of biology at Stanford University, has been appointed vice president for administration.

Simultaneously, Bronk announced the merging of the institute's department of the laboratories and department of the hospital. The former positions of director of the institute and director of the hospital will not be filled because of this reorganization. This fall the institute plans to add an academic program to its

long-established work in medical research. The first class, which will be made up of graduate students on fellowships, from the institute, will enroll in September.

On the occasion of his 70th birthday, ALFRED KÜHN, director of the Max-Planck-Institute for Biology in Tübingen, was awarded an honorary doctor of medicine degree by the University of Göttingen, and was also presented with the Gauss-Weber medal.

RALPH F. FUCHS, professor of law at Indiana University, will become general secretary of the American Association of University Professors on 1 Sept. He succeeds Ralph E. Himstead, who died on 9 June.

The association has a membership of more than 43,000 teachers in 968 colleges and universities. The general secretary is the chief permanent officer of the association, and is in charge of its central office, which is in the American Council on Education Building, 1785 Massachusetts Ave. NW, Washington 6, D.C.

J. A. STRATTON, provost of Massachusetts Institute of Technology, and MERVIN J. KELLY, president of Bell Telephone Laboratories, have been elected chairman and vice chairman, respectively, of the Naval Research Advisory Committee of the Office of Naval Research. Stratton succeeds JOHN A. HUTCHESON, vice president and director of the Westinghouse Electric Corp., and Kelly assumes the vice chairmanship previously held by Stratton.

A. B. KINZEL, vice president of research for the Union Carbide and Carbon Corp., whose tenure with the committee recently expired, has accepted appointment for an additional 3 years. FREDERICK SEITZ, director of physics, physics department, University of Illinois, was also recently appointed a member of the committee.

Other members of the Naval Research Advisory Committee are A. V. ASTIN, director, National Bureau of Standards; R. E. DYER, director of research, Emory University Hospital; J. C. HUNSAKER, head of the department of aeronautical engineering, Massachusetts Institute of Technology, and chairman of the National Advisory Committee for Aeronautics; I. R. RABI, department of physics, Columbia University; WILLIAM R. SEARS, dean of the Graduate School of Aeronautical Engineering, Cornell University; E. H. SMITH, director, Woods Hole Oceanographic Institution; E. N. STEPHENS, vice president, central research department, Minnesota Mining and Manufacturing Co.; J. E. W. STERLING, president, Stanford University; and GEORGE D. STODDARD, former president of the University of Illinois.

The German Chemical Society, meeting in Frankfurt a. M., recently awarded the Liebig memorial medal to FEDOR LYNEN, professor ordinarius of biochemistry at the University of Munich, in recognition of his fundamental researches on the biological synthesis and degradation of the fatty acids and the role of coenzyme A in their activation.

On 27 July, ALLAN HANCOCK received a volume entitled *Essays in Natural Science in Honor of Captain Allan Hancock* from the staff of the Allan Hancock Foundation of the University of Southern California. Hancock was director of the foundation from 1940 to 1954. Commemorating his 80th birthday, the 350-page *Festschrift* contains 24 articles on varied subjects by scientists from this country and abroad who have participated during the last 25 years in the expeditions of the *Velero III* and *Velero IV*, or in related endeavors in marine biology and oceanography.

Henceforth the foundation will function under the direction of A. S. RAUBENHEIMER, educational vice president. The operation of the *Velero IV* for the coming year has been assured by Hancock. The foundation's collections will continue to be available to specialists for study, and ways are being sought to continue the extensive series of publications on expedition results.

WILLIAM M. SILLIPHANT, deputy director of the Armed Forces Institute of Pathology since 1952, has been appointed director. He succeeds ELBERT DECOURSEY, whose tour of duty ended on 1 Aug. Decoursey will become commandant of the Medical Field Service School at Brooke Army Medical Center, San Antonio, Tex.

SIDNEY W. NELSON, assistant professor of radiology at the University of Chicago, has been appointed professor and chairman of Ohio State University's department of radiology. The acting chairman for the past year has been JACK WIDRICH, who has joined the staff of the University of Miami.

ROBERT L. VOUGHT, former associate professor of epidemiology, Columbia University, has joined Bristol Laboratories, Inc., Syracuse, N.Y., as associate medical director. He will make his headquarters in Bristol's New York office.

GEORGE B. CRESSEY, Maxwell professor of geography at Syracuse University, left on 5 Aug. for a year of research on water problems in Southwest Asia. His headquarters will be in Baghdad, Iraq, and he plans to travel widely.

The Syracuse department of geography has a rotating scheme whereby at least

one member of the staff is always on leave for fieldwork. During the past year, JOHN THOMPSON has been in Japan, and HIBBERD KLINE has worked in Africa.

M. O. WILSON will retire on 1 Sept. as chairman of the department of psychology at the University of Oklahoma but will continue as professor. CARL R. OLDROYD succeeds him as chairman. Another member of the department, MUZAFER SHERIF has been named director of the newly established Institute of Group Relations.

The following appointments to assistant professor have been announced. Dickinson College: WILLIAM H. BENSON, mathematics. Harvard School of Public Health: THEODORE B. VAN ITALIE, clinical nutrition; FRANKLIN A. NEVA, tropical public health. West Virginia University: MASON E. HALE, JR., biology. Union College: THOMAS L. FINCH, physics. Pennsylvania State University: THOMAS SMYTH, JR., entomology.

### Necrology

RAYMOND C. ARCHIBALD, Providence, R.I., 79, professor emeritus of mathematics at Brown University, author, editor, past president of the Mathematical Association of America, twice a vice president of AAAS, 26 July.

CHARLES T. BRUES, Cambridge, Mass., 76, professor emeritus of entomology at Harvard University, 22 July.

WELDON S. CALDBECK, Hillside, N.J., 42, chemical engineer, 23 July.

FRANK W. CARPENTER, Santa Barbara, Calif., 74, former head of the research department of General Mills Corp. in St. Paul, Minn., 24 July.

JOHN W. E. GLATTFELD, Chicago, 72, associate professor emeritus of chemistry at the University of Chicago, research consultant at the Argonne National Laboratory, 26 June.

MARTIN L. KATZENSTEIN, New York, 75, marine engineer, 21 July.

GEORGE C. KEEFE, West Hartford, Conn., 50, chief of the department of medicine at St. Francis' Hospital, 21 July.

CHARLES F. W. MCCLURE, Princeton, N.J., 90, professor emeritus of zoology at Princeton University, 23 July.

JACOB J. MENDELSON, Chicago, 64, professor of medicine at Stritch College of Medicine of Loyola University, director of Fox River Sanatorium, Batavia, Ill., 26 July.

GLADYS A. REICHARD, New York, 62, professor of anthropology at Barnard College, secretary of AAAS Section H in 1945, 25 July.

HOWARD C. SHAUB, Washington, Pa., 63, head of the mathematics department

of Washington and Jefferson College, 20 July.

WILLIAM H. SCHULTZ, New York, 83, retired pharmacologist and medical scientist, 24 July.

WILLIAM SEIFRIZ, Philadelphia, 66, professor of botany at the University of Pennsylvania, 13 July.

GEORGE F. SIMMONS, Glen Ellyn, Ill., 60, former president of Montana State University at Missoula, member of the School of Medicine staff of Loyola University, 19 July.

WILLIAM H. WARN, Little Silver, N.J., 69, retired mining engineer, 25 July.

### Education

■ The Alfred P. Sloan Foundation has announced a grant of \$750,000 to Cornell University for the establishment of the Sloan Institute of Hospital Administration. A principal aim of the new unit will be to train a select group of students for careers in hospital administration.

The program of study, which will lead to the degree of master of public administration in hospital management, or, with slightly different emphasis, to the degree of master of business administration in hospital management, will require 2 years of intensive work in Ithaca and a year of residency in an appropriate hospital. The number annually accepted for the training will be limited to about a dozen highly qualified applicants. To insure that only the best qualified will be admitted to the course, the foundation's grant for the new institute has included a generous provision for fellowships.

■ The *Engineering and Scientific Manpower Newsletter* (5 July 1955) published by the Engineering Manpower Commission and the Scientific Manpower Commission, carries a list of suggestions for steps that can be taken by industry and professional society local sections to help resolve the science-teacher problem. Since the suggestions are very pertinent to the AAAS Science Teaching Improvement Program, we reprint them here.

Under the title, "Brass tacks and science teachers," the commissions state that this list was prepared in response to numerous requests for information about specific ways by which the local groups could tackle the problem. The Newsletter points out that although the problem "can be described nationally it can be attacked only locally." The list includes the following questions and suggestions addressed to local groups.

1) *What can you do to improve the quality of science teaching in your community?* (i) Is the most efficient use being made of the present science teachers in your community? Work through