amination Board. He was also examiner for the New York State Education Department for several years.

These many duties did not interfere with his productive work, as is indicated by the fact that more than eighty major titles in science and education have come from his pen in the last forty-four years. These include articles on geology, geography and education and books for young and old in a wide field. High-school texts in geology, physical geography, with G. K. Gilbert, commercial geography and a series of elementary school texts, with C. T. McFarlane, were supplemented by books in the relation of geography and history and culminated in his volume on the United States based on a series of lectures at London.

For fourteen years Brigham taught in summer schools in this country and for five in England. He attended and took part in several geographical congresses and visited Europe many times. His acquaintance was wide and his many and varied contributions to all phases of geography made him one of the best known geographers of the world.

Honors came rapidly to him for many years. He served one year as president of the Association of American Geographers immediately after his retirement as secretary. He was also president of the National Council of Geography Teachers. His alma

mater, as well as Syracuse University and Franklin College, conferred honorary degrees upon him. But the compliment that he prized most was the number of the Annals of the Association of American Geographers that was issued on his seventy-fifth birthday. Here his colleagues and friends paid measured tribute to Brigham—the man, the geologist, the physiographer, the human geographer, the educator and the geographer-envoy from America to Europe. In these several papers, accompanied by a bibliography, is a summary—an appraisement of Brigham's life work to 1930, written with the restraint necessary in writing to the living. Between the lines one can see the affectionate regard and the honor that each writer, speaking for his colleagues, felt for Brigham. This volume was a deserved and yet inadequate tribute that may be summarized in the recent words of one of the younger men who said, "He was a Grand Man in the earth sciences."

His spirit will carry on, and like that of any great teacher or leader, his work will bear results for many generations yet to come. He honored the sciences to which he devoted the major part of his life, and the honors his colleagues naturally bestowed upon him were truly earned.

RICHARD ELWOOD DODGE

SCIENTIFIC EVENTS

SYMPOSIA AT THE SYRACUSE MEETING OF THE AMERICAN ASSOCIATION

PROGRAM plans for the association's approaching meeting at Syracuse, New York, June 20 to 25, 1932, are rapidly nearing completion. It is expected that the final program will include addresses on subjects of general interest by outstanding scientists in the fields of mathematics, physics, engineering, chemistry, botany, medicine, psychology and education. The association's sections are arranging a scientific session devoted to symposia on timely subjects and also a number of field trips. Program features include the following: Mathematics-invited addresses by four mathematicians of national reputation and a symposium on "The Teaching of Mathematics" (jointly with the Section of Education) with an address by Dr. E. R. Hedrick; Physics-symposium on "The Nature of Light," a joint session with chemists and biologists for a symposium and a general address by Dr. W. F. G. Swann on "Cosmic Rays"; Chemistry symposium with biologists and physicists on "The Effect of X-rays on Biological Life" and a regional meeting of the American Chemical Society; Geology and Geography—symposia on (1) "Paleozoic Stratigraphy of New York," (2) "Physiography near Syra-

cuse including Glacial Problems," (3) joint session with engineering section on "Aerial Photographic Surveying and Mapping," and conducted geological excursions; Zoology-symposium at joint sessions with chemists and physicists on "The Effect of X-rays on Biological Life" and a series of conducted field trips and a meeting of the Ecological Society of America; Botany-meetings of the Botanical Society of America and other societies and a series of field trips; Anthropology—symposium on Far Eastern Problems; Psychology—symposia on (1) "Industrial Psychology" (jointly with Engineering Section); (2) "Social Statistics" (jointly with Economics, Sociology and Statistics Section); (3) "Mental Hygiene" and a twoday meeting of the Upper New York psychologists; Economics, sociology and statistics—symposia on (1) "Demand and Supply," (2) "Money and Interest" and (3) "Social Statistics," and meetings of the Econometric Society and the American Statistical Association; Engineering—(1) Symposia on "Aerial Photographic Surveying and Mapping," (2) "Industrial Engineering" and (3) "Industrial Psychology" (jointly with the Section of Psychology) and a general address by Dr. J. O. Perrine on "Television"; Medical sciences—several symposia on subjects to be announced later and meetings of the Society for Experimental Biology and Medicine (Western New York Branch), The American Roentgen Ray Society, the Society of American Bacteriologists (Central New York Branch), Onondaga County Medical Society, and the Syracuse Academy of Medicine; Agriculture—series of symposia on "Land Use" and a symposium on "The Future of the Farmer, Peasant or What?"; a meeting of Northeastern Section of American Society of Agronomy at Geneva and Ithaca; Education—a symposium on (1) "The Teaching of Mathematics" and (2) "Educational Psychology" and a general address by Professor E. L. Thorndike. In addition, several sections of the association will hold sessions for the reading of contributed papers.

CHARLES F. Roos, Permanent Secretary

NATURE SANCTUARIES

The Ecological Society of America has maintained a committee concerned with reservation of natural areas for research purposes since 1917. This committee called a conference on Nature Sanctuaries at New Orleans on December 30, 1931, including the following representatives of societies and government bureaus:

Dr. Francis Ramaley, chairman, Ecological Society; Dr. W. R. Chapline, U. S Forest Service; Dr. S. B. Locke, Izaak Walton League; Dr. H. C. Bryant, National Park Service; Dr. Walter P. Taylor, U. S. Biological Survey; Dr. T. Gilbert Pearson, American Ornithological Union; Dr. A. R. Cahn, Ecological Society; Dr. Henry B. Ward, National Parks Association; Mr. Paul L. Errington, Game Survey, conducted for the Sporting Arms and Ammunition Manufacturers Institute; Dr. B. C. Tharp, Ecological Society; Dr. W. S. Cooper, Ecological Society, and Dr. V. E. Shelford, National Research Council.

The representatives at the conference stated the general plans and procedure followed in the reservation by federal agencies of the few existing nature sanctuaries, called "natural areas," "research reserves," etc. They also outlined the ideal plans for nature sanctuaries, conceived in the various organizations representing different biological interests.

After the conference the following report was adopted by the representatives through the mail:

The participants were agreed that it is desirable and important to set aside, as nature sanctuaries or nature reserves, areas of natural vegetation containing as nearly as possible all the animal species known to have occurred in the areas within historical times.

Nature sanctuaries should be surrounded by very slightly modified areas devoted to experiments, recreation or game culture, etc.

It was the consensus of opinion of those in attendance that these areas should be left alone without management and that only in the case of an emergency that might arise should control measures be undertaken and then only after most careful consideration and determination as to their practical necessity.

V. E. Shelford, Chairman Committee for the Study of Plant and Animal Communities, Ecological Society of America

COMMITTEE ON UNEMPLOYMENT AND RELIEF FOR CHEMISTS AND CHEM-ICAL ENGINEERS

DR. FRANK G. BREYER, executive chairman of the Committee on Unemployment and Relief for Chemists and Chemical Engineers, has addressed to members of the twelve sponsoring societies the following letter:

More than one hundred members of our profession in the Metropolitan District are in want. Their families are approaching despair. Fifteen hundred more are out of employment. Some have been unemployed for over a year.

Professional fellowship and human sympathy demand that the more fortunate of us contribute to the immediate relief of the destitute in our profession. Public relief funds administered by the Gibson and Bliss Committees are running low. They are inadequate to meet the general situation and can no longer be counted upon to take care even of the most desperate cases.

This committee has been organized by the local sections of all the important national chemical and chemical engineering societies. Administrative costs will be paid from funds given specially for this purpose. Your contribution will be applied directly, immediately and sensibly to the relief of chemists and chemical engineers.

We feel the best temporary solution is to finance the work of the Committee on Unemployment and Relief for the period April 25 to July 1. \$15,000 is required. An average of \$5.00 per month for two months from 1,250 men will give \$12,500. We can get \$2,500 from other sources. Won't you send by return mail a contribution? Less than \$5.00 if you can't afford it. More than \$5.00 if you are able. To be followed by an equal sum one month later.

The need is immediate and urgent! Unless we who are more fortunate respond generously many members of our profession face real want, demoralization and tragedy.

Checks should be made payable to R. T. Baldwin, treasurer, and be sent to 300 Madison Avenue, Room 1004, New York City.

AWARD OF THE WILLARD GIBBS MEDAL

Dr. Edward Curtis Franklin, professor emeritus of organic chemistry at Stanford University, has been awarded the Willard Gibbs Medal for 1932 by the