The Mountain Lake gathering will be a joint meeting with the American Society of Plant Taxonomists, the Sullivant Moss Society, the American Fern Society, the Southern Appalachian Botanical Club and the Committee on Virginia Flora. The University of Virginia and the Virginia Polytechnic Institute will be joint hosts for this meeting. Field trips will be made into the surrounding mountain region during the day-time, and evening meetings will be held on the grounds of the Biological Station, and on the campus of the Virginia Polytechnic Institute. Accommodations with meals will be available in Blacksburg at $3 a day. At the Mountain Lake Biological Station, meals and lodging will be $2.00. Reservations may be made at either place by addressing Professor A. B. Massey, Blacksburg, Va.

The University of Wisconsin will be the host for the second meeting. This will be a joint meeting with the American Phytopathological Society, the American Society of Plant Physiologists, the American Society of Plant Taxonomists and the Mycological Society of America. Both field and formal meetings will be held. Accommodations will be available at various hotels at minimum rates of from $2.50 to $4. The University Club will have a few rooms available. Reservations may be made directly with the hotels or with the University Club.

Dr. Ira L. Wiggins, secretary of the Pacific Section, announces that the Stanford University gathering will be a joint meeting with the Pacific Division of the American Association for the Advancement of Science. It will include joint symposia and other meetings with the Western Sections of the American Society of Plant Physiologists, the Ecological Society of America and the American Society of Plant Taxonomists. A field trip is arranged for Ano Nuevo Point, an area about forty miles from Stanford where coastal sand dunes, a partially submerged deposit of peat, vegetation along a brackish lagoon, etc., can be examined. Housing accommodations will be available in the dormitories at the rate of $2.00 per day for the first three days, and $1.75 thereafter. Reservation requests should be addressed to Miss Anastasia Doyle, Box 1772, Stanford University. Three hotels in Palo Alto, a mile from the university, offer accommodations for approximately forty-five transient guests at rates varying from $1.25 to $4. Early reservations are urged because of the demand for rooms during the Golden Gate Exposition. Meals may be obtained at the Stanford Union. Full information will be mailed to members at an early date.

MEDALS OF THE FRANKLIN INSTITUTE

THE complete list of recipients in 1938 of the various medals awarded annually by the Franklin Institute, Philadelphia, Pa., as recommended by its Committee on Science and the Arts, has been announced by Dr. Henry Butler Allen, secretary of the institute, as follows:

The Franklin Medal, awarded annually from the Franklin Medal Fund, founded January 1, 1914, by Samuel Insull, Esq., "to those workers in physical science or technology, without regard to country, whose efforts, in the opinion of the Institute, acting through its Committee on Science and the Arts, have done most to advance a knowledge of physical science or its applications." To Edwin Hubble, Ph.D., D.Sc., LL.D., Mount Wilson Observatory, Carnegie Institution of Washington, Pasadena, "In recognition of his extensive study of the nebulae, particularly those outside our galaxy, as a result of which the dimensions of observed space have been greatly increased."

The Franklin Medal posthumously to Albert Sauveur, Sc.D., D.Eng., professor emeritus of metallurgy and metallography, Harvard University, "In recognition of his outstanding work in the science of metallography and of his many contributions to this branch of metallurgy which have been in a large measure responsible for changing the heat treatment of steel from an art to a science."

The Edward Longstreth Medal, founded in 1890 by Edward Longstreth, of Philadelphia, retired member of the Baldwin Locomotive Works, for the encouragement of invention. To Arthur C. Hardy, Sc.D., professor of optics and photography, Massachusetts Institute of Technology, "In consideration of the development of an accurate and reliable instrument which has greatly expedited research in the field of color, both in theory and in its commercial applications." To Jesse E. Stareck, Ph.D., Waterbury, Conn., "In consideration of the development of a new technique for the study of electrode phenomena encountered in the electrolysis of water solutions and the discovery of a new method applicable to the art of coloring metals." To John Strong, Ph.D., assistant professor of physics in astrophysics, California Institute of Technology, and to Robley Cook Williams, Ph.D., department of astronomy, University of Michigan, "In consideration of their independent development and improvement of a process for coating astronomical mirrors with a layer of metallic aluminum deposited thereon by evaporation in vacuo."

The John Price Wetherill Medal, founded in 1925 by the family of John Price Wetherill, to be awarded for discovery or invention in the physical sciences, or for new and important combinations of principles or methods already known, to William Albert Hyde, director of research, Leon J. Barrett Company, Worcester, Mass., "In consideration of his discovery and development of a process for the centrifugal impregnation of objects which has materially reduced the time necessary for impregnation as compared with the prior art."

The George R. Henderson Medal, founded in 1924 by Mrs. Virginia P. C. Henderson, in memory of her husband, George R. Henderson, consulting mechanical engineer connected with Baldwin Locomotive Works. He was also a long-time member of the Franklin Institute and served as chairman of its Committee on Science and the Arts and

as a member of its Board of Managers. The medal is awarded for distinguished contributions in the field of railway engineering. This year it will be presented to Ralph Budd, president, Chicago, Burlington and Quincy Railroad Company, Chicago, Illinois, "In consideration of his engineering ability, vision and courage in carrying out railroad construction in difficult mountainous terrain in the Northwestern part of our country, and of his other contributions in the field of railway engineering."

The Louis E. Levy Medal, founded in 1923 by the family of Louis E. Levy, Philadelphia, a member of the Committee on Science and the Arts of the Franklin Institute at the time of his death, who had previously served the institute as a member of the Board of Managers for twelve years and a vice-president for three years, is awarded "to the author of a paper of especial merit, published in the *Journal* of the Franklin Institute, preference being given to one describing the author's experimental and theoretical researches in a subject of fundamental importance." It will be given to Kalman John DeJuhasz, associate professor of engineering research, Pennsylvania State College, "For his article entitled 'Graphical Analysis of Surges in Mechanical Springs,' which appeared in the October and November, 1938, issues of the *Journal* of the Franklin Institute."

The Howard N. Potts Medal, founded, by will, in 1906, by Howard N. Potts, a life member of the institute and a member of the Bar in Philadelphia, is awarded for "distinguished work in science or the arts; important development of previous basic discoveries; inventions or products of superior excellence or utilizing important principles." It will be awarded to Newcomb K. Chaney, Ph.D., director of research, United Gas Improvement Company, Philadelphia, Pa., "In consideration of his original and successful work in the hitherto uncharted field of carbon activation," and to H. Jermain Creighton, Sc.D., professor of chemistry, Swarthmore College, Swarthmore, Pa., "In consideration of his distinguished work in developing a process for the electrolytic reduction of simple sugars on a large scale."

The Elliott Cresson Medal, founded in 1848 by Elliott Cresson, of Philadelphia, Pa., a philanthropist and successful merchant who lived from 1796–1854, is awarded for recognition of distinguished contributions in the realm of physical science. It will be awarded to George Ashley Campbell, Ph.D., Upper Montclair, N. J., retired research engineer, American Telephone and Telegraph Company, "In consideration of his lifelong study of the theory of electric circuits, resulting in notable contributions to the science that underlies telephony and to inventions of fundamental importance in the art." To John R. Carson, Sc.D., research mathematician, Bell Telephone Laboratories, Inc., New York, New York, "In consideration of outstanding contributions to the art of electrical communication," and to Charles Vernon Boys, F.R.S., LL.D., London, England, "In recognition of the scientific achievements of Sir Charles Vernon Boys, which have furnished scientists with new and remarkably precise methods for making measurements in gravitation, in sound, in heat, in radiation, in current and static electricity so refined as to render possible the weighing of the earth, the determination of the radiant energy coming to us from the stars, the photography of the speeding bullet and the immobilization, even, of the lightning flash itself."

Certificate of Merit, presented jointly to Percy Russell, D.D.S., Wilmington, Delaware, and E. Burke Wilford, president, Pennsylvania Aircraft Syndicate, Philadelphia, Pa., "In consideration of the development and application of a simple means of regulating and controlling the speed of small electric motors."

The presentation of the medals and certificates will be made at 3:30 P.M., on the afternoon of Wednesday, May 17, in Franklin Hall, at formal exercises presided over by Philip C. Staples, president of the Franklin Institute. At this session Dr. Hubble will read an original paper on "The Motion of the Stellar System Among the Nebulae." Mrs. Albert Sauveur will be present to accept the award of the Franklin Medal to Dr. Sauveur.

At 7:30 P.M., on the evening of the same day, a subscription dinner in honor of the medalists will be held in Franklin Hall.

MEDALS OF THE NATIONAL ACADEMY OF SCIENCES

PRESENTATION of the medals of the National Academy of Sciences was made at the annual dinner of the academy on April 25. These were as follows:

Agassiz Medal for Oceanography, awarded to Harald Ulrik Sverdrup, of the Scripps Institution of Oceanography of the University of California, La Jolla, for his personal oceanographic explorations in Arctic regions and his numerous contributions to physical oceanography and the interrelations between the sea and the atmosphere. The presentation address was made by Dr. T. Wayland Vaughan, emeritus professor of oceanography of the University of California and emeritus director of the Scripps Institution, who was chairman of the committee at the time the award was recommended to the academy.

Daniel Giraud Elliot Medal for 1933 and Accompanying Honorarium of $200, awarded to Richard Swann Lull, of the Peabody Museum of Natural History, Yale University, in recognition of his work entitled: "A Revision of the Ceratopsia or Horned Dinosaurs," published in the *Memoirs* of the Peabody Museum of Natural History. The presentation address was made by Dr. William Berryman Scott, emeritus professor of paleontology of Princeton University.

Daniel Giraud Elliot Medal for 1934 and Accompanying Honorarium of $200, awarded to Theophilus Shickel Painter, of the University of Texas, in recognition of his work on the chromosomes of the salivary glands in Drosophila in relation to the problems of mutation and genetics, published in *Genetics* and the *Journal of Heredity* in 1934. The presentation address was made by Dr. Ross G. Harrison, of Yale University, chairman of the committee on the Daniel Giraud Elliot Fund.

The John J. Carty Medal and Award for the Advance-