

before. The funds consisted of a deed of trust for \$700,000, left in 1847 by James Lick.

GRANTS FOR RESEARCH OF THE VIRGINIA ACADEMY OF SCIENCE

At the recent meeting of the Research Committee of the Virginia Academy of Science, the following grants were made in aid of scientific research in Virginia:

To Dr. J. W. Beams, of the University of Virginia, \$150.00 for the study of the initiation of lightning discharges. He plans to photograph lightning discharges with a special camera which will make a million or more exposures each second.

To W. B. Bell, of the Virginia Polytechnic Institute, \$28.50 to enable him to purchase a LaMotte blood pH outfit with which to study the reaction of the blood of normal and leukotic fowls. This work will be done in connection with Dr. E. P. Johnson, who won the academy prize last year for his work on the leukosis of fowls.

To Dr. Walter S. Flory, of Bridgewater College, \$70.00 with which to purchase an oil-immersion objective and other accessories for the microscope needed in his study of the genetic cytology of the genus *Gilia* of the phlox family. This is part of an extensive study of the character and significance of the chromosomes of various plants which is in progress at the Blandy Experimental Farm of the University of Virginia under the direction of Dr. O. E. White.

To Dr. H. B. Haag, of the Medical College of Virginia, \$50.00 with which to purchase pigeons needed in the development of his new method of assaying preparations of digitalis.

To Dr. Carl C. Speidel, of the University of Virginia, \$50.00 with which to purchase supplies for photomicrographic work in his study of living cells.

To Dr. Edward Steidtmann, of the Virginia Military Institute, \$100.00 with which to purchase an electric hydrogen-ion apparatus for use in his study of the relation of hydrogen-ion concentration of the water to the formation of travertine deposits in the streams near Lexington, Va.

The money thus appropriated is the income from a trust fund which was raised for the academy a few years ago by Dr. J. Shelton Horsley when he was president. The purpose of the trust fund is to encourage and develop scientific research in Virginia.

Besides these grants made directly to research workers, the Research Committee, which administers the fund, also awards a prize of \$50 each year at the annual meeting of the academy for an especially meritorious paper presented at that meeting.

These grants are made only to members of the Virginia Academy of Science, but the Research Committee is greatly interested also in the development and encouragement of scientific research in Virginia outside of its own membership and invites persons

who have problems on which they need advice or assistance of any kind to communicate with any member of the committee or with the secretary of the academy.

The members of the Research Committee and their fields of interest are: Dr. William G. Guy, of the College of William and Mary, chemistry; Dr. J. Shelton Horsley, of St. Elizabeth's Hospital, Richmond (chairman), medicine; Dean Earle B. Norris, of the Virginia Polytechnic Institute, engineering; Dr. T. McN. Simpson, Jr., of Randolph-Macon College, mathematics, and Dr. O. E. White, of the University of Virginia, biology.

E. C. L. MILLER,
Secretary

GRANTS FOR RESEARCH OF THE GEOLOGICAL SOCIETY OF AMERICA

The council of the Geological Society of America, meeting in New York in October, approved the following grants in aid of geologic research:

A grant of \$3,000 to L. B. Slichter, for assistance and field expenses in connection with an investigation of the elastic properties of the upper crust of the earth.

A grant of \$800 to John P. Buwalda, to cover field expenses in connection with geophysical investigation by seismic methods of the depth of fill in the Yosemite Valley.

A grant of \$150 to Adolph E. Sandberg, to cover field expenses in study of the Keweenaw lavas of the north shore of Lake Superior.

A grant of \$800 to Margaret Fuller Boos, to cover transportation, field and laboratory expenses in study of the youngest pre-Cambrian batholiths in the Front Range, Colorado.

A grant of \$230 to P. S. Warren, for field expenses in connection with study of the Mississippian rocks of the Rocky Mountains of Canada, particularly near Crow's Nest Pass, Nordegg and Jasper.

A grant of \$450 to F. Fitz Osborne, for field and laboratory expenses covering investigation of sills intruding the Lower Grenville near Shawinigan Falls, Quebec.

A grant of \$250 to C. E. Resser, to cover field expenses in study of the Cambrian in the southern Appalachians.

A grant of \$350 to Adolph Knopf, to cover the cost of chemical analyses of rocks from the Spanish Peaks, Colorado, in connection with study of the igneous geology of the region.

The council also made the following additional allowances in connection with researches which had received prior support from the society:

An additional grant of \$500 to Paul MacClintock and Horace G. Richards, for completion of study of correlation of the marine deposits of Pleistocene age with those of known glacial origin, along the Central Atlantic Seaboard.

An additional grant of \$300 to Philip B. King, to cover cost of fossil collecting in connection with studies on the Permian rocks of the Trans-Pecos, Texas.

This recent action brings the total number of grants made by the Geological Society to 100, and the total sum to \$103,078.35. These grants are made possible

through the bequest of the late Dr. R. A. F. Penrose, Jr., who left approximately four million dollars to the society as an endowment. Full information concerning grants has been distributed to members of the society in Information Circular No. 12, copies of which may be had by others on request.

SCIENTIFIC NOTES AND NEWS

THE Penrose Medal of the Geological Society of America has been awarded to Dr. Charles Schuchert, emeritus professor of invertebrate paleontology at Yale University. The medal, which was established in 1926 by the late Dr. R. A. F. Penrose, Jr., is given for distinguished service and fundamental contribution to the advancement of geologic science. It will be presented to Dr. Schuchert at Rochester, N. Y., on the occasion of the annual dinner of the society on December 28.

A PORTRAIT of Dr. Hugh D. Reed, since 1906 professor of vertebrate zoology at Cornell University, was presented to the university on November 17 by his graduate students and colleagues in the department. It was formally presented by Dr. Julian D. Corrington, of Rochester, who was one of Dr. Reed's students, and officially accepted for the university by President Farrand. Professor Simon H. Gage described the early history and development of the department of zoology and the methods of teaching that were used before 1900, when Dr. Reed joined it as assistant. Professor Benjamin F. Kingsbury told of their acquaintance and of Dr. Reed's work as a student, graduate and member of the faculty of the university. The presentation was followed by an informal reception.

DR. HARRY M. SELDIN, who recently won the International Anesthesia Research Society's silver trophy shield, was the guest of honor on November 7 at a dinner given in New York City by friends and colleagues. The speakers were: Dr. A. T. Newman, dean of the New York University Dental School; Dr. F. R. Brophy, president of the First District Dental Society; Dr. C. Raymond Wells, president of the Second District Dental Society; Dr. Alfred Walker, chairman of the judicial council of the American Dental Association, and Dr. John T. Hanks, FERA dental adviser.

THE *Journal* of the American Medical Association reports that Dr. Elizabeth A. Woodworth, bacteriologist of the Minneapolis health department since 1913, was honorably retired on her seventieth birthday. She had been connected with the department since 1901. Associates presented her with a wrist

watch. The Hennepin County Medical Society also honored Dr. Woodworth with a gift of a silver bowl bearing the following inscription: "Dr. Elizabeth A. Woodworth, for thirty-three years of unusual service to humanity." Dr. Woodworth is a graduate of the Minneapolis College of Physicians and Surgeons.

DR. FRANK A. WAUGH, head of the department of landscape architecture at the Massachusetts State College, has been elected an honorary member of the New England Park Association in recognition of his accomplishments in furthering the aims of the association.

THEIR eightieth birthday has been celebrated by the following scientific men: Dr. William Temple Hornaday, director of the New York Zoological Park from 1896 until his retirement as emeritus in 1926; Dr. Edward B. Gleason, professor of otology at the Graduate School of Medicine of the University of Pennsylvania, and Dr. Edward Bausch, president of the Bausch and Lomb Optical Company, responsible for the invention and construction of optical apparatus.

PROFESSOR IRA EUGENE CUTLER, chairman of the division of biological sciences and professor of zoology at the University of Denver, has been made professor emeritus. Professor Cutler has been connected with the university for thirty-six years, first as professor of both botany and zoology, and later of zoology. He is succeeded as chairman of the division by Humphrey Gray Owen, associate professor of zoology.

ACCORDING to the *London Times*, a chair of national health was inaugurated on November 1 at Munich by Dr. Gerhart Wagner, the head of the German Medical Association, who stated that the new chair would form the model for others. The first professor of the new faculty is Dr. Schultze, the Bavarian State Commissar for Health.

DR. THOMAS J. COLLIER, of Atlanta, Ga., was elected president of the Associated Anesthetists of the United States and Canada at its recent Boston meeting.

SIR JOHN CADMAN has been elected president of the British Institution of Petroleum Technologists for the session 1935-36.

SIR HARRY MCGOWAN was installed as president of the British Institute of Fuel at a meeting on Novem-