APPROPRIATIONS FOR GRANTS-IN-AID BY THE NATIONAL RESEARCH COUNCIL

AT its meeting in February the National Research Council's Committee on Grants-in-Aid made grants for the support of research as follows:

To Dr. R. G. Aitken, associate director, Lick Observatory, determination of the value of the solar parallax; Margaret Harwood, director, Maria Mitchell Observatory, the size and distance of the Scutum Star Cloud; C. E. Mendenhall, professor of physics, University of Wisconsin, photoelectric characteristics of metals; Linus Pauling, associate professor of theoretical chemistry, California Institute of Technology, the determination of electron distribution in various crystals.

John C. Aston, instructor in physical chemistry, Pennsylvania State College, the heat capacities of simple organic nitrogen compounds; H. L. Johnston, assistant professor of chemistry, Ohio State University, determination of the heat capacity curves of simple gases; A. L. Robinson, assistant professor of chemistry, University of Pittsburgh, thermo-chemical properties of electrolyte solutions.

E. M. Kindle, chief of the division of paleontology, Geological Survey of Canada, a bibliographic index of North American Devonian fossils, and an illustrated catalogue of types of North American Devonian fossils; Edward L. Troxell, professor of geology, Trinity College, vertebrate fossils from the Wasatch or Wind River formations in Wyoming.

C. Sidney Burwell, professor of medicine, and Glenn E. Cullen, professor of biochemistry, Vanderbilt University School of Medicine, the abnormal physiology and chemistry of congestive heart failure; David M. Greenberg, assistant professor of biochemistry, University of California, the factors involved in the delayed blood coagulation of jaundice, and the ultrafiltration of diffusible ions from systems containing electrically charged colloids; Robert Hegner, director, department of protozoology, Johns Hopkins University, the occurrence of amoebiasis in Panama.

R. A. Brink, associate professor of genetics, University of Wisconsin, partial sterility in maize; Henry Federighi, assistant professor of biology, Antioch College, the effect of temperature on the heart rhythm of the caddice fly larva; Hope Hibbard, professor of zoology, Oberlin College, cytological studies on the silk gland and the developing gonads of *Bombyx mori;* Alfred C. Kinsey, professor of zoology, Indiana University, the gall wasps (Cynipidae) of Mexico; Wallace J. Robbins, professor of botany and dean of the graduate school, University of Missouri, the cultivation of the isolated primary meristem of higher plants in sterile media.

Edward F. Castetter, professor and head of department of biology, University of New Mexico, the ethno-biology of the Indians of the southwestern United States; Fay-Cooper Cole, chairman, department of anthropology, University of Chicago, archeological investigations in Chihuahua, Mexico; Karl M. Dallenbach, assistant professor of psychology, Cornell University, nerve regeneration; Laurence Foster, instructor, Stowe Teachers College, racial mixture between Negro, Indian and white stock in Maryland and Delaware; William R. Morse, dean of the College of Medicine and Dentistry, West China Union University, the physical anthropology of the Western Chinese and neighboring peoples; Edward C. Tolman, professor of psychology, University of California, the inheritance of maze-learning ability in rats.

VERNON KELLOGG,
Permanent Secretary, National Research Council

SCIENTIFIC NOTES AND NEWS

DR. ALBERT EINSTEIN sailed for Germany on March 5, after two months' residence at the California Institute of Technology. Before leaving he expressed his intention to return in November. At a dinner in honor of Dr. Einstein, given in New York the evening before he sailed by American Zionists in the interest of the Palestine Foundation Fund, the following message from President Hoover was read: "I am glad of this opportunity to express my admiration of your distinguished service to mankind through your scientific researches and my hope that your visit to the United States has been as satisfying to you as it has been gratifying to the American people."

MADAME CURIE has been awarded the Cameron Prize of the University of Edinburgh for 1931, in recognition of the important therapeutic advances that have been made in recent years as a result of her discovery of radium.

A PORTRAIT of Dr. Samuel W. Stratton, chairman of the corporation of the Massachusetts Institute of Technology, was presented to the Bureau of Standards on March 7, on the occasion of the thirtieth anniversary of its founding. Dr. Stratton was the founder and first director of the bureau. The ceremonies were conducted by Dr. George K. Burgess, the present director of the bureau, and the portrait, which was painted by Margaret Fitzhugh Browne, was presented by Mr. Henry A. Wise Wood, of New York City, in appreciation of the invaluable services rendered American industry by Dr. Stratton and the bureau.

AT a recent meeting of the New York State Horti-

cultural Society a resolution was adopted requesting the state legislature to name the new laboratory building now being erected on the grounds of the State Experiment Station at Geneva "Hedrick Hall" in honor of Dr. U. P. Hedrick, director of the station.

PROFESSOR A. H. JOY, of the Mount Wilson Observatory, was elected president of the Astronomical Society of the Pacific, at the annual meeting on January 31.

PROFESSOR DOUGLAS JOHNSON, of Columbia University, has been elected an honorary member of the Geographical Society of Belgrade in recognition of his work on the morphology of coasts.

DR. HERBERT S. JACKSON, head of the department of botany in the Purdue Agricultural Experiment Station, resigned on January 1, in order to accept the position of professor of mycology and cryptogamic botany in the University of Toronto. During his time at Purdue University he has been connected with the Bureau of Plant Industry at Washington in connection with cooperative investigations on leaf rusts of cereals.

THE University Court of St. Andrews University has appointed Dr. Daniel Fowler Cappell, at present lecturer in pathological histology in the University of Glasgow, to be professor of pathology in the University of St. Andrews, in succession to Professor Sutherland, who retired at the end of the last academical year.

DR. SVEIN ROSSELAND, who has recently returned to Norway after a year's work at Harvard University, will organize an institute in Oslo for theoretical astronomy. The Storthing has granted special facilities to Dr. Rosseland, with funds for a building and endowment.

DR. HOLGER THIELE, of the astronomical department of the University of California, has been appointed by Northwestern University research associate at Dearborn Observatory for a number of months. He is assisting the other members of the staff in various phases of the study of Eros.

DR. C. O. EDDY, associate entomologist of the South Carolina Experiment Station, has been appointed to the research staff of the Experiment Station of the University of Kentucky. He will be associated with Professor W. A. Price, state entomologist and head of the department of entomology and botany of the Experiment Station and College of Agriculture. For the next few months he will study the oriental fruit moth and codling moth in orchards in western Kentucky.

DR. JOHN E. GRAF, assistant chief of the Bureau of Entomology, U. S. Department of Agriculture, resigned on March 5, to become assistant director of the National Museum. Dr. Graf has been connected with the Department of Agriculture for twenty years. The position in the museum has been newly created under Dr. Alexander Wetmore, assistant secretary of the Smithsonian Institution.

DR. EVERETT P. PARTRIDGE, of Ann Arbor, Michigan, has been appointed supervising engineer of the Non-Metallic Minerals Experiment Station of the U. S. Bureau of Mines at New Brunswick, New Jersey, and Harold W. Robbins, of Chicago, has been appointed editor for the bureau. Dr. Partridge, who is associate editor of *Industrial and Engineering Chemistry,* succeeds Dr. H. H. Storch, who will take charge of the section of physical chemistry at the Pittsburgh Experiment Station of the bureau. The chief project now in progress at the Non-Metallic Minerals Experiment Station is a study of methods for producing potash salts from such minerals as polyhalite found in New Mexico and Texas, leucite in Wyoming, and greensand in New Jersey. Work has been done on this project by Dr. Storch and his associates during the past two years, and will be continued and carried into a small-scale chemical engineering stage under the direction of Dr. Partridge. Mr. Robbins's work as editor involves editorial supervision of the publications of the Bureau of Mines, which publishes annually several hundred reports. He succeeds Mr. Frederick W. Horton, transferred to the bureau's mining division for the conduct of research in the mining of non-metallic minerals.

DR. H. J. K. AHLMANN, docent in geography at Upsala, has chartered the polar ship *Quest* for seventy-five days in the coming summer to enable a Swedish-Norwegian expedition to map White Island and inspect the site of Andrée's camp. The expedition is planned to leave Tromsö on June 25.

DR. LECOMTE DU NOÜY, head of the department of biophysics at the Pasteur Institute, Paris, will pay a visit to the United States during the month of April. He will be accompanied by Mrs. Lecomte du Noüy, who is in charge of the Tissue Culture Laboratory in his department. Dr. du Noüy, who was an associate member of the Rockefeller Institute for many years, will stay in New York and study the organization of the tissue culture department of Dr. Carrel at the institute.

DR. ARTHUR J. TIEJE, chairman of the department of geology at the University of Southern California and now on sabbatical leave at the University of Oklahoma to study methods of correlation in the mid-continent oil fields, will again have charge of the summer session courses in geology at Columbia University.

PROFESSOR AND MRS. CLAUDE E. O'NEAL, of Ohio Wesleyan University, are taking a trip into the southern states during which Dr. O'Neal will make a study of the vegetation of that section of the country and gather a collection of southern plants, particularly mosses, which he desires to add to the herbarium of the department of botany at the university. Dr. O'Neal, who has been a member of the department of botany for the past eighteen years, has been granted a leave of absence to engage in this research. The Great Smoky Mountains will be the first object of his explorations and he will later visit Georgia and Florida.

DR. H. J. CONN, chief in research in soil bacteriology at the State Experiment Station at Geneva, New York, has been granted six months' leave, beginning on April 1.

DR. ARTHUR H. COMPTON, professor of physics at the University of Chicago, will give a series of lectures at the College of the City of New York on March 23, 24, 25, 26 and 27, at 8:45 in the evenings. The title of the series is "The Nature of Things."

THE Bacon Lectures of the College of Medicine, University of Illinois, will be given on March 31 and April 1 by Professor Herbert A. Evans, of the University of California. The subjects will be: "The Hormones of the Hypophysis" and "The Relation of the Hypophysis to the Reproductive System."

PROFESSOR W. D. SMITH, of the University of Oregon, gave the annual Sigma Xi lecture before the joint societies of the University of Oregon and the Oregon State College on February 24 at Corvallis. The title of the lecture was "High Lights of the Geography and Geology of South America."

DR. ROBERT W. HEGNER, professor of protozoology and head of the department of medical zoology at the Johns Hopkins University, gave the following lectures at the University of Michigan on February 19 and 20, under the auspices of the department of zoology: "The Invisible Fauna of the Human Body," "Host Parasite Relations among Protozoa," and "Transmission and Host Parasite Specificity among Protozoa."

DR. S. A. MITCHELL, director of the Leander McCormick Observatory of the University of Virginia, will give the second Stuart McGuire Lecture at the Medical College of Virginia, Richmond, on March 25. His subject will be "Eclipse Hunting in the South Seas." The Stuart McGuire Lecture was established a year ago in recognition of the services of Dr. Stuart McGuire to the college, to medical education and to surgery.

PROFESSOR ERNEST E. JUST, head of the department of zoology of Howard University, delivered two lectures under the auspices of the department of zoology at Oberlin College on February 26 and 27, with titles as follows: "Attempts at a Physico-Chemical Explanation of Fertilization" and "The Biology of Fertilization as a Basis for a Theory."

DR. JAMES B. HERRICK, of the University of Chicago, will deliver the sixth Harvey Society Lecture at the New York Academy of Medicine, on Thursday, March 19. His subject will be "The Coronary Artery in Health and Disease."

THE rôle of the biological sciences in modern life was the subject of four lectures given during the winter quarter at the University of Minnesota, under the auspices of Sigma Xi. Dr. Ross A. Gortner, professor and head of the department of agricultural biochemistry, gave the first lecture on "Biochemistry and the World To-day"; Dr. W. P. Larson, professor and head of the department of bacteriology, spoke on "Micro-organisms and Daily Life"; Dr. W. A. Riley, professor and head of the department of entomology, on "Warfare between Man and the Insect Kingdom," and Dr. Florence L. Goodenough, professor of child welfare, on "Child Development and the Coming Generation."

DR. EGON S. PEARSON, of the biometric laboratory of the University of London, will lecture on mathematical statistics during the coming summer session from June 8 to July 16 at the University of Iowa.

DR. WILHELM BLASCHKE, director of the mathematical seminar of the University of Hamburg, is James Speyer visiting professor of mathematics at the Johns Hopkins University from March 2 to May 8. He lectures four hours weekly on "Topological Questions in Differential Geometry" and is also available for consultation by students.

AT a meeting in London of the Royal Microscopical Society on February 18, Dr. Robert Chambers, research professor of biology and chemistry and chairman of the department at the Washington Square College of New York University, spoke on "The Nature of the Living Cell," with demonstrations by micro-dissection, micro-injection and cinematograph.

THE twenty-third Dutch Congress of Natural Science and Medicine will be held at Delft from April 7 to 9.

WE learn from the *Journal* of the American Association that the fifteenth annual clinical session of the American College of Physicians will be held in Baltimore from March 23 to 27, with an additional day in Washington, D. C., on March 28. Symposiums on gastro-intestinal disease, heart disease, endocrine dis-

orders, anemia and questions of public health, medical practice and medical economics are on the program in addition to general sessions devoted to varied topics. Special clinics and demonstrations at the Johns Hopkins University School of Medicine, the University of Maryland School of Medicine, and various Baltimore hospitals are to be given each afternoon of the meeting, from Tuesday to Friday, inclusive. Features of the Washington program are lectures at the U. S. Naval Medical School and at St. Elizabeth's Hospital; clinics and demonstrations at George Washington University School of Medicine, Georgetown University School of Medicine, Mt. Alto Hospital and Children's Hospital; demonstrations of arthritis and syphilis from the anthropological collections of the Smithsonian Institution, and visits to Walter Reed General Hospital, the Army Medical Library and the Army Medical Museum. Among speakers who will present papers are Drs. William S. Thayer, Warfield T. Longcope and Lewellys F. Barker, Baltimore; Henry A. Christian, George R. Minot and Frank H. Lahey, Boston; Ray M. Balyeat, Oklahoma City; Cyrus C. Sturgis, Ann Arbor, Mich.; Gabriel Tucker, Philadelphia; George E. Follansbee, Cleveland, and David P. Barr, St. Louis.

DEEDS conveying over 840 acres in the northern section of Durham County to North Carolina State College were filed January 28 by George Watts Hill, '22, of Durham. The property will be used by the Forestry School, and is considered one of the most important gifts ever made to the forestry division.

THE Polytechnic Institute of Brooklyn has received the sum of $250,000 in payment of the legacy left to the Institute by the late Dr. William H. Nichols, chairman of the Board of the Allied Chemical and Dye Corporation. Dr. Nichols, who was one of the founders of the American Chemical Society, was a graduate of the Polytechnic Institute in the class of 1868 and was for forty years a trustee of the corporation, serving as its chairman for eighteen years.

DISCUSSION

MORE EVIDENCE OF MAMMOTHS IN THE HIGH MOUNTAINS OF COLORADO

IN SCIENCE of July 18, 1930, the writer called attention to evidence of mammoths and giant bison in the high mountains of southern Colorado. Since writing this note, more evidence of a similar character has come to light in other localities, and extending this range nearly to the northern end of Colorado, along the high front ranges.

A ranchman living near Canon City, Colorado, showed the writer a fairly complete upper molar of a mammoth, which agreed closely with the typical *Parelephas columbi* in having 19 plates, and similar structure. The tooth had originally been well preserved when found; but exposure and lack of proper care had so softened it that it was crumbling, and nearly ready to fall to pieces when examined. The owner, who did not care to part with it, stated that while working in a road cut, "a few miles out of Cripple Creek" on the little used road leading down Phantom Canon to Canon City, and "near the top of the divide," in an old gravel bed far above present wash, he had dug out this tooth. The spot he described is stated to be at an elevation of "above 8,000 feet." He said that he also found at the same spot some big broken bones, some inches in diameter; but that these had soon gone to pieces after he took them out. He did not know that the specimen I examined was a tooth, but had thought that it was a "queer rock formation"; and as it was found near a famous gold locality, he had saved it, not knowing what it might "indicate"!

A second, broken tooth, apparently the same species, which had been found by a local workman in South Park, Colorado, was carefully examined. It was stated that this tooth was dug out of a gravel bed, near the lower end of South Park; and that the gravel lay at this spot on "a sort of shale" in which had been found "fossils that looked like fish." From other sources I have heard from time to time of large fossil bones occasionally found in South Park, of such a size as to suggest mammoth. This tooth which I saw in South Park, near where it was said to have been found, would seem to confirm the occurrence definitely.

A third specimen, also in the hands of a workman, consisting of four plates from a freshly broken mammoth molar, which was, as nearly as could be told from such a fragment, of the same type as the foregoing, was shown to me by its finder, who reported obtaining it from gravels in a cut. This cut is one made during the construction of the new highway up the Cache la Poudre valley over the high mountains into North Park, Colorado. The writer was informed that this tooth was found in a gravel cut less than half a mile from the crest of Cameron Pass. In this event, this record would be from an altitude of nearly or quite 10,000 feet. The writer has noted deposits of coarse rock and gravel, probably mostly of glacial origin, in this vicinity, but has done no work upon them there.