Sir Joseph Barcroft, Cambridge, England. Emmanuel Fauré-Frémiet, Paris. Leopold Ruzicka, Zurich. Nevil Vincent Sidgwick, Oxford. Georges Urbain, Paris.

The following officers were elected for the coming year:

President, Dugald Caleb Jackson.

Vice-president for Class I, James Flack Norris.

Vice-president for Class II, Walter Bradford Cannon.

Vice-president for Class III, George Grafton Wilson.
Vice-president for Class IV, Arthur Stanley Pease.
Corresponding Secretary, Leigh Hoadley.
Recording Secretary, Hudson Hoagland.
Treasurer, Horace Sayford Ford.
Librarian, Hervey Woodburn Shimer.
Editor, Charles Henry Blake.

Professor George D. Birkhoff spoke on "Mathematical Advances Since 1900 and Their Influence on Scientific Thought."

## SCIENTIFIC NOTES AND NEWS

The Priestley Medal of the American Chemical Society, awarded for distinguished service to chemistry, will be conferred upon Dr. Marston Taylor Bogert, professor of organic chemistry at Columbia University, at the Milwaukee meeting of the society.

DR. CHARLES FRANCIS BÖDECKER, professor of histology and embryology in the College of Dentistry, Columbia University, was presented with the William Jarvie fellowship medal at a dinner of the New York State Dental Society on May 11. The medal is presented annually to the dentist who "has contributed results of original research or whose high attainments and high standing have been of such character as to have aided and advanced materially the science and art of dentistry."

The Manson Medal of the Royal Society of Tropical Medicine and Hygiene has been awarded to Major-General Sir Leonard Rogers, retired, and will be presented at the annual general meeting of the society on June 16. The medal is awarded triennially "to the living author of such work in any branch of tropical medicine or tropical hygiene as the council may consider to be deserving of the honor."

On the occasion of the eleventh Congress of the German Society for Investigation of the Circulation, recently held at Bad Nauheim, Professor Hess of Zürich was awarded the Carl Ludwig Medal, and Professors Spalteholz of Zürich, Jaksch of Prague, Geheimrat Aschoff of Freiburg and Hering of Kiel were named honorary members of the society.

THE second volume of the Collected Works of Professor G. A. Miller, published by the University of Illinois, is in press and is expected to appear during the coming summer. It contains publications issued from 1900 to 1908 in addition to two articles written specially for this volume and relating, respectively, to the history of group theory during the period covered by this volume and the general history of mathematics.

THE honorary degree of doctor of science will be conferred on June 9 by the University of Cambridge

on Dr. Francis Peyton Rous, of the Rockefeller Institute for Medical Research, New York.

Dr. Elmer V. McCollum, professor of biochemistry and head of the department at the School of Hygiene and Public Health of the Johns Hopkins University, recently delivered the Gordon Bell Memorial Lecture, at a special convocation at the University of Manitoba, Winnipeg. The university conferred on Dr. McCollum the degree of doctor of laws.

Among honorary degrees to be conferred by the University of St. Andrews will be the doctorate of laws on Dr. E. D. Adrian, Foulerton research professor of physiology and fellow of Trinity College, Cambridge; on Professor R. G. Collingwood, Waynflete professor of metaphysical philosophy and fellow of Magdalen College, Oxford, and on Sir Gilbert Morgan, head of the Chemical Research Laboratory, Teddington. The university had indicated its intention to confer the degree on Dr. R. Tait McKenzie, emeritus professor of physical education in the University of Pennsylvania, who died on April 28.

Dr. A. H. Gordon, professor of medicine at McGill University and senior physician of the Montreal General Hospital, was elected president of the American Clinical and Climatological Society at the recent meeting of the society in Atlantic City.

The South Dakota Academy of Science held its annual meeting at Yankton College on April 29 and 30. The guest speaker was Dr. David D. Whitney, professor of zoology at the University of Nebraska, who spoke on "Heredity in Man." The officers elected for 1938-39 are: President, Dr. Ward L. Miller, State College, Brookings; First Vice-president, Dr. Walter V. Searight, University, Vermillion; Second Vice-president, Dr. A. L. Moxon, State College, and Secretary-Treasurer, Professor A. L. Haines, University, Vermillion.

Dr. James Franck, of the Johns Hopkins University, has been appointed professor of physical chemistry at the University of Chicago. Dr. Franck's ap-

pointment was made possible through a grant of \$20,000 a year for a period of ten years from the Samuel S. Fels Fund, founded by Mr. Samuel S. Fels, of Philadelphia. The fund provided for the salaries of Dr. Franck, two assistants, technicians and \$12,000 for special equipment. Dr. Franck, who was appointed professor of physics at Göttingen in 1920, remained there until the day Hitler assumed power, when he resigned. After six months without a position he moved with his family to Copenhagen, where he was given an appointment at the university. He remained there for a year, after which he accepted his present position of professor of physics at the Johns Hopkins University.

Dr. George Eugene Uhlenbeck, for the last four years professor of theoretical physics of the University of Utrecht, previously associate professor of physics in the University of Michigan, has been appointed visiting professor of theoretical physics at Columbia University.

In the department of botany of the University of Oklahoma, Dr. George L. Cross, associate professor and acting head of the department, has been promoted to a professorship and has become head of the department; Dr. Orie J. Eigsti, professor of biology at Greenville College, Illinois, has been appointed assistant professor of botany, and Dr. H. L. Chance has been promoted from an assistant professorship to an associate professorship.

Dr. Oskar Baudisch, director of the research division of the Saratoga Springs Commission, State of New York, has been appointed associate in biochemistry at the Albany Medical College. He will continue his connection with the Saratoga Springs Commission.

PROFESSOR B. MOUAT JONES, of the University of Manchester, has been appointed vice-chancellor of the University of Leeds in succession to Sir James Baillie, who has reached the age of retirement. Professor Jones has been for seventeen years principal of the Manchester College of Technology and dean of the faculty of technology of the University of Manchester.

Dr. ROBERT C. MILLER, professor of zoology in the University of Washington, has been elected director of the museum and of the Steinhart Aquarium of the California Academy of Sciences, the appointment to take effect on September 1.

SIR GEOFFREY EVANS, who has been principal of the Imperial College of Tropical Agriculture, Trinidad, since 1927, has resigned in order to accept a post as economist and botanist at Kew Gardens.

Dr. Julian H. Steward, ethnologist of the Smithsonian Institution, is on his way to South America, where he will spend approximately eighteen months in

a study of three Indian tribes. The first stop will be among the Otavalo Indians of northern Ecuador. These people are of the general Quechua stock to which the Incas of Peru belonged. A few months will be spent among the Campas Indians of eastern Peru. The primary objective of the expedition, however, will be a study of the ethnology of the Araucanian Indians of Chile, never actually conquered either by the Incas or the Spaniards.

Dr. Harold St. John, professor of botany at the University of Hawaii and botanist of the Bishop Museum, Honolulu, has received a grant from the Carnegie Corporation which makes possible a botanical expedition to Rotuma. Rotuma lies about 400 miles north-northwest of Suva and is a volcanic island with hills 800 feet high. It comes within the museum's sphere of botanical interest, and the expedition will make it possible to close a gap in the botanical record of the Pacific islands. Dr. St. John will leave Honolulu for Suva on May 30.

C. G. Paulsen returned to Washington at the end of April, after spending several weeks visiting district offices of the Geological Survey in the West. While in California, he made arrangements for rehabilitating many of the survey river measurement stations destroyed or damaged by the recent floods and also made preliminary arrangements for the preparation of a comprehensive report on these floods.

Dr. Forest Ray Moulton, permanent secretary of the American Association for the Advancement of Science, gave an illustrated address entitled "Cataclysms" on May 13 before the Rittenhouse Astronomical Society of Philadelphia.

THE fifth and final meeting of the American Institute Symposium on "The Social Implications of Science" was held recently at the Aldine Club, New York, under the chairmanship of Dr. John C. Merriam, president of the Carnegie Institution of Washington. Other speakers were Dr. Benjamin C. Gruenberg and John J. O'Neill, science editor of The New York Herald-Tribune.

Dr. Frederick L. Hisaw, professor of zoology at Harvard University, will give the commencement address at the University of Missouri, of which he is a graduate, on June 7.

Dr. VILHJALMUR STEFANSSON, the Arctic explorer, will deliver the commencement address at the University of Pittsburgh on June 8.

The Academy of Medicine of Washington, D. C., held its spring meeting on May 14. Following the usual dinner, Dr. Winfred Overholser, professor of psychiatry in the George Washington University School of Medicine and superintendent of St. Eliza-

beth's Hospital, gave an address entitled "The Psychiatrist in Court."

The Croonian Lectures of the Royal College of Physicians of London will be given by Professor F. R. Fraser on May 24, 26 and 31. His subject will be "The Clinical Aspects of the Transmission of the Effects of Nervous Impulses by Acetylcholine."

AT the Dallas meeting of the American Chemical Society it was reported that as yet there had been very little retardation in its work on account of the present recession. On April 1 the society had 21,689 members, an increase of 1,730 over the same date in 1937. Subscriptions to the journals have likewise increased. On the basis of April 1, 1937, to April 1, 1938, the Journal of the American Chemical Society has increased by 427 subscribers; Chemical Abstracts, by 482; the Industrial Edition of Industrial and Engineering Chemistry, by 1,386, and the News Edition, by 2,202. The actual paid membership of the society was 1,426 greater on April 1, 1938, than on April 1, 1937, which, in view of the increased total membership, indicates that payments are falling off slightly in percentage as a result of the depression. The new procedure adopted in 1937 establishing groups of student affiliates throughout the country has proved a success. There are now 16 chapters of student affiliates, with, as of April 11, 499 members.

The annual spring meeting of the Oklahoma Academy of Science was held at Craterville Park in the Wichita Mountain range on April 22 and 23. Approximately three hundred members were present. Two evening meetings were held in which lectures were given by scientific men in the state. Field trips of interest to botanists, zoologists, geologists, ecologists and limnologists were conducted during the two days of the meeting. A resolution that a large portion of the Wichita Mountain Wild Life Refuge in Oklahoma be permanently closed to domestic live-stock, public thoroughfares and other interferences and disturbances was passed. The meeting was in charge of Dr. F. A. Fenton, Stillwater, vice-president of Section A of the American Association for the Advancement of Science.

The Western Reserve University chapter of Sigma Xi held its annual meeting with the initiation of new members on May 11. After the dinner for members there was a lecture by Dr. O. L. Inman, director of the C. F. Kettering Foundation of Antioch College, which was open to the public. Dr. Inman spoke on "Chlorophyll and Photosynthesis." Dr. Webster G. Simon, dean of liberal arts and sciences at the university, presided at the dinner. The following officers were installed for next year: President, Dr. Torald Sollmann, dean of the School of Medicine; Vice-president, Dr. Frank Hovorka, associate professor of

chemistry; Secretary, Dr. James Clarke Gray, assistant professor of biology, and Treasurer, Dr. Leroy D. Edwards, assistant professor of pharmacognosy and pharmacology.

THE following resolution, drawn by a committee consisting of Drs. McKeen Cattell, E. M. K. Geiling, O. S. Gibbs, George B. Roth and C. W. Muchlberger. chairman, was passed by the American Society for Pharmacology and Experimental Therapeutics at its meeting in Baltimore on April 2: "The American Society for Pharmacology and Experimental Therapeutics views with alarm the lack of statutory regulation of the sale and use of dangerous therapeutic preparations, which result in such tragedies as the recent series of deaths from 'Elixir of Sulphanilamide' and from contaminated serum. Furthermore, the present and increasing promiscuous use by the public and especially by the youth of this country, of drugs which have either a pronounced stimulating effect or a profound depressing effect upon the nervous system is an alarming situation calling for immediate remedial measures in the interest of public health and safety. Therefore, the American Society for Pharmacology and Experimental Therapeutics in annual meeting assembled, respectfully but firmly urges that the governmental authorities, through Congress, be given the necessary power to regulate the use by or sale to the general public of such preparations as are dangerous or inimical to the public health and safety. Be it further resolved, that new or untried drugs should not be allowed to come into use by the general public before authoritative sanction has been obtained. Be it further resolved, that copies of this resolution be sent to all appropriate governmental and medical organizations."

An international postgraduate course in malariology will be held in Rome from July 18 to September 17; the language used will be French, and interpreters will be available for those taking part in it. Excursions in connection with the course will be made to various sanitary stations near Rome, Ostia, Venice and Sardinia. Further details may be obtained from Professor G. Bastianelli, Istituto di Malariologia, Ettore Marchiafava, Policlinico Umberto I, Rome. The annual malaria control course for laymen engineers (engineers, planters, etc.), will open at the Ross Institute of Tropical Hygiene, London, on June 27. It will be under the direction of Sir Malcolm Watson, director of the institute, and will last five days. The course is free.

THE National Research Council has recently subscribed to a table in the Stazione Zoologica di Napoli. Biologists desiring to avail themselves of the use of this table in the near future should write immediately

to the Division of Biology and Agriculture, National Research Council, Washington, D. C. The award of the table will be in the hands of a committee of the division, consisting of the representative to the division from the American Society of Zoologists, Chairman, the president of the American Society of Zoologists, the president of the Botanical Society of America and the chairman of the Division of Biology and Agriculture of the National Research Council, ex officio.

NINE Charles A. Coffin fellowships, amounting in all to \$5,000, for advanced scientific research, have been awarded by the General Electric Company. The students will carry on their work at the Massachusetts Institute of Technology, the University of Chicago, Yale University, the University of Cincinnati, the University of Rochester and the University of Virginia. Five of the recipients of the fellowships are engaged in physics as their field of research, three in electricity and one in physical chemistry. The fellowships are awarded each year to graduates of colleges in the United States who have shown by the character of their work that they could with advantage undertake or continue research work in educational institutions either in this country or abroad.

RESEARCH fellows have been selected for work at the Westinghouse Research Laboratories in East Pittsburgh as follows: Robert O. Haxby, research assistant in physics at the University of Minnesota, W. E. Shoupp, of the University of Illinois, and W. E. Stephens, of the California Institute of Technology, will continue researches on nuclear physics; John A. Hipple, graduate student at Princeton University, plans to design and construct a large mass spectrograph of high resolving power for studies in molecular structure; Sidney Siegel, of Columbia University, will study the elastic properties of alloys. The five appointments are the first to be made under a plan announced last December, whereby the Westinghouse Electric and Manufacturing Company plans to support the work of ten young physicists on fundamental studies broadly related to the electrical industry. fellows are appointed for one year and are eligible for one reappointment. The men will work under the general supervision of Dr. E. U. Condon, associate director of the laboratories.

ACCORDING to statements made in the daily press, by the will of Henry W. Putnam, New York wire and glass manufacturer, who died on March 30, the sum of \$3,000,000 is left to the Henry W. Putnam Memorial Hospital, Bennington, Vt. In addition to the specific bequests a residuary trust of an undetermined amount is established, in which Harvard University, Yale University and Princeton University will share equally after the death of four cousins who will draw interest from it for life.

It is reported that Bucknell University has received gifts amounting in all to \$125,000 toward a new engineering building. These gifts are in addition to a gift of \$50,000 contributed in the autumn.

THE New York Academy of Medicine has announced that a sum of approximately \$1,000 is available under the Edward N. Gibbs Memorial Prize toward original research in diseases of the kidney during 1938. Candidates, who must be physicians who have been graduated at least three years and be residents of the United States, shall submit "evidence of research already performed and of facilities to prosecute research upon the causation, pathology and new methods of treatment of diseases of the kidney." The award may be continued through not more than three years to any one individual. Applications with the required evidence should be addressed to the New York Academy of Medicine prior to June 1.

SIGMA PI SIGMA, physics honor society, installed its thirty-fourth chapter at the University of Pittsburgh on April 8. Present at the installation were: Dr. R. C. Colwell, West Virginia University, national president; Dr. Marsh W. White, Pennsylvania State College, executive secretary, and Dr. F. C. Blake, of the Ohio State University, member of the executive council. Dr. Edward U. Condon, associate director of research at the Westinghouse laboratories, was received into the society as an honorary member. Following the installation banquet at Webster Hall, Dr. Condon addressed an open meeting of the chapter at the Mellon Institute on "Recent Developments in Quantum Mechanics."

THE fifth biennial convention of the Alpha Epsilon Delta Honorary Premedical Fraternity was held at the University of North Carolina from March 24 to The North Carolina Beta Chapter acted as host to eighty-five visiting members and delegates from twenty-one chapters in fourteen states. One of the most important reports made was on the success of the social hygiene programs among the college students reported by the various chapters. An illustrated lecture was given by Dr. Addison G. Brenizer, of Charlotte, N. C., on "Surgical Anatomy of the Thyroid Gland and Thyroidectomy," and at the banquet on Saturday evening, Dean Wm. deB. MacNider, of the Medical School, spoke on "The Biologically-Minded Physician." Officers elected to the grand staff were as follows: Grand President, Dr. Charles F. Poe, professor of chemistry, University of Colorado; Grand Vice-President, Dr. K. P. Stevens, professor of biology, Central College; Grand Secretary-Historian, Dr. Maurice L. Moore, Drexel Hill, Pa.; Grand Treasurer, Dr. Warren H. Steinbach, professor of chemistry, University of Arkansas. Members elected to the executive council were: Dr. Emmett B. Carmichael, professor of physiological chemistry, University of Alabama; Dr.

H. R. Henze, professor of chemistry, University of Texas. and Dr. R. W. Bost, professor of chemistry, University of North Carolina.

THE annual dinner of trustees, faculty and staffs of the New York Medical College and Flower Hospital and the New York Ophthalmic Hospital was held at the Waldorf-Astoria Hotel on March 18. The speakers were: Dr. Arvid Lindau, professor of pathology and bacteriology at the University of Lund, Sweden, and Dr. Fordyce Barker St. John, professor of clinical surgery at the College of Physicians and Surgeons of Columbia University. Dr. Lindau's topic was "The Pathogenesis of Gastric Ulcer." Dr. St. John gave an illustrated lecture on "The Surgical Treatment of Gastric Ulcer." Dr. Harold D. Harvey, associate in surgery at the College of Physicians and Surgeons, assisted Dr. St. John. In connection with the Swedish Tercentenary of the settling of New Sweden on the Delaware River, a second lecture was given on May 2 in the Heckscher Foundation Theater by Dr. Einar Hammarsten, professor of chemistry at the Carolingian Medical University at Stockholm. His subject was "The Duodenum and Its Associates, the Important Hormonal Centrum." A recent bequest of \$100,000 has been granted to the Fifth Avenue Hospital through the will of the late Adolph L. Gondran. Legacies of \$10,000 each also have been received recently by the Flower Hospital and the New York Medical College and Flower Hospital through the will of Mrs. Sophie M. Gondran.

Following the falling of possibly a ton of plaster and timber in an unoccupied classroom in University Hall at the University of Illinois in January, inspection determined that other parts of the building were unsafe and it was closed until a complete examination could be made. Later the trustees closed the building permanently. Governor Henry Horner, after a personal inspection trip, agreed with the trustees' action and indicated that he would include in his call for a contemplated special session of the State Legislature a request for funds to build a building, or buildings, to duplicate the floor area of the vacated building. The trustees are conducting a study to determine whether one large new building will meet the needs of the university, or whether it would be more expedient to build two smaller structures.

## DISCUSSION

## A COLONY OF ALBINO RATS EXISTING UNDER FERAL CONDITIONS

OTHER than brief references1,2 of uncertain significance, the only observation of albino rats existing in a feral state appears to be that of Svihla.3 Donaldson's attempts to establish wild colonies of white rats met with little success. 4,5,6 So it seemed of unusual interest to find a large colony of albino rats which had been well established for a number of years in a dumpground near Missoula, Montana. These rats were considered a health menace, so measures were taken to exterminate them.

The albino rats inhabited an area of about an acre and a half which was built up as a shelf of debris filling in a back-water slough along a river bank. Earth and gravel were dumped on the debris making a thoroughly honeycombed fill some twenty feet in depth. The south side of the shelf sloped to the river, and over this bank the daily city refuse was dumped. Thus food, water and shelter were provided for the rats.

<sup>1</sup> S. Moss, *Mag. Nat. Hist., London*, 9: 182–185, 1836. <sup>2</sup> J. Rodwell, "The Rat," G. Routledge and Co., Lon-

don, 1858.

- <sup>3</sup> A. Svihla, Am. Nat., 70: 403-404, 1936. <sup>4</sup> H. H. Donaldson, Jour. Acad. Nat. Sci. Phila., 15: 365-369, 1912.
- 5 H. H. Donaldson, Year Book, Carnegie Institution, Washington, 15: 200-201, 1916.

6 H. H. Donaldson, "The Rat," 2nd Ed., Wistar Institute, Philadelphia, 1924.

The animals were first noted in large numbers at the dumpground in the summer of 1935. Their source is obscure, but it is presumed that some student from the University of Montana in Missoula released white rats at the dump as a means of disposal. By the summer of 1936 the rats had proliferated so remarkably that a poisoning campaign was instituted, which served to cut down their numbers. The program was not extensive enough to destroy the colony, so, by the following spring (1937) they were very numerous. We have estimated that 2,000 rats were feeding at one time.

The winter habits of these rats have not been observed. Since the river freezes over each winter, it is assumed that the rats' water supply was from that welling up from beneath the fill. The depth of the bank was ample to permit them to remain below frost line yet far enough above water to be dry. There was food enough for winter storage and new refuse was added daily. It is possible that the newly dumped refuse afforded a source of heat for the colony. In any event, the colony was observed to survive two winters, during which time the outside temperature was as low as 25 degrees below zero (Fahrenheit), and several protracted sub-zero spells were recorded.

During the summer the rats fed early in the morning and in the evening, remaining in their burrows through the heat of the day. They had established