

The Trustees greatly regretted to be obliged to decline forty-five applications, many of which were highly deserving of aid.

It was voted to make the following new Grants:

96. \$150, to Professor H. E. Crampton, Columbia University, New York, for experiments on variation and selection in Lepidoptera.

97. \$100, to Dr. F. W. Bancroft, University of California, Berkeley, Cal., for experiments on the inheritance of acquired characters.

98. \$125, to Dr. J. Weinzirl, University of New Mexico, Albuquerque, N. Mex., for investigation of the relation of climate to the cure of tuberculosis, it being agreed that if the work justifies it the same amount will be granted next year.

99. \$300, to Professor H. S. Grindley, University of Illinois, Urbana, Ill., for investigation of the proteids of flesh.

100. \$300, to Dr. H. H. Field, Zürich, Switzerland, to aid the work of the concilium bibliographicum.

101. \$250, to Professor T. A. Jaggar, Harvard University, Cambridge, Mass., for experiments in dynamical geology, provided the Secretary receives the necessary assurance that the work can be undertaken with reasonable promptitude.

102. \$50, to Dr. E. O. Jordan, University of Chicago, Chicago, Ill., for the study of the biometrics of *Anopheles*.

103. \$300, to Dr. E. Anding, München, Bavaria, to assist the publication of his work 'Ueber die Bewegung der Sonne durch den Weltraum,' but the grant is conditional upon other means being also secured by the author sufficient to accomplish the publication.

104. \$300, to Professor W. P. Bradley, Wesleyan University, Middletown, Conn., for investigations on matter in the critical state.

105. \$300, to Professor Hugo Kronecker, Bern, Switzerland, for assistance in preparing his physiological researches for publication.

106. \$300, to Professor W. Valentiner, Grossh. Sternwarte, Heidelberg, Germany, to continue the work of Grant No. 93 (Observations on variable stars).

Signed,

CHARLES S. MINOT,
Secretary.

THE PITTSBURGH MEETING OF THE
AMERICAN ASSOCIATION FOR THE
ADVANCEMENT OF SCIENCE.

THE fifty-first annual meeting of the American Association, held this week at Pittsburgh,

opened auspiciously, three hundred and fifteen members being registered on Monday morning. A full report of the meeting will be given in the issue of SCIENCE for next week; here it can only be said that at the beginning of the week it was evident that both the scientific programs and the social arrangements were excellent in all respects. This may be illustrated by the statement that sixty-nine papers were entered to be read before the American Chemical Society and the Section of Chemistry, and that the local committee provided forty-two excursions. The retiring president, Dr. Minot, gave the admirable address that is printed above. The vice-presidential addresses of Professor Jacobi and Dr. Galloway are also printed in this issue of SCIENCE, and those by Professor MacMahon, Professor Brace, Professor Van Hise, President Jordan, Dr. Fewkes and Mr. Hyde will follow. Full reports of the meetings of the sections and of the affiliated societies will be given in early issues of this journal.

SCIENTIFIC NOTES AND NEWS.

THE Paris Academy of Sciences has elected M. Amagat a member of the section of physics in succession to M. Cornu.

THE Academy of Sciences of Vienna has elected Lord Rayleigh a corresponding member.

THE list of coronation honors in great Britain closes with the announcement that King Edward has instituted a new Order of Merit to be bestowed for well-earned distinction in any profession, foreigners to be included as honorary members. The original members of the order include Lord Kelvin, Lord Lister, Lord Rayleigh and Sir William Huggins. Lord Lister and Lord Kelvin have also been made privy councillors; knighthood has been conferred on Dr. Oliver Lodge, and Professor William Ramsay has been made Knight Companion of the Order of the Bath.

THE honorary Doctorate of Laws was conferred upon Director W. W. Campbell, of the Lick Observatory, by the University of Wisconsin on July 19.

YALE UNIVERSITY has conferred its Doctorate of Laws on President Nicholas Murray But-

ler, of Columbia University, and on Dr. Roswell Park, director of the New York State Pathological Laboratory at Buffalo.

MIDDLEBURY COLLEGE has given its LL.D. to Professor Brainard Kellogg, of the Brooklyn Polytechnic Institute.

DR. JOHN M. CLARKE, New York state paleontologist, has been given the degree of LL.D. by Amherst College.

THE Alabama Polytechnic Institute has recently conferred the degree of M.A. on Professor F. S. Earle, assistant curator in the New York Botanical Garden, in recognition of his extensive researches in the fungi and in plant pathology.

THE Accademia dei Lincei has awarded Mr. Marconi a prize of the value of about \$2,000 for his work in wireless telegraphy.

THE degree committee of the special board for medicine of Cambridge University are of opinion that the works, submitted by Thomas Henry Jones, Trinity-hall, advanced student, on (1) the experimental bacterial treatment of Cambridge sewage; (2) the bacteriological test for sewage-pollution in drinking water; (3) notes on the oxidizing bacteria of sewage, are of distinction as records of original research.

PROFESSOR A. W. EVANS, of Yale University, and Mr. Percy Wilson, of the New York Botanical Garden, have gone to Porto Rico to make some further investigations and collection of the flora of the island for the New York Botanical Garden. Special attention will be given to the small area of primitive forest yet remaining on the island.

MR. GEORGE V. NASH, of the New York Botanical Garden, has recently returned from an extensive trip to England, France, Germany and Holland made for the purpose of completing some botanical studies and securing material for the collections of the New York Botanical Garden.

THE *Botanical Gazette* states that Dr. B. E. Livingston and Mr. H. N. Whitford, assistants in botany, and Mr. C. D. Howe, fellow in botany, of the University of Chicago, have been

appointed collaborators in the Bureau of Forestry, Department of Agriculture, for the year beginning July 1, 1902. Dr. Livingston will work on some forestry problems in the northern part of the southern peninsula of Michigan; Mr. Whitford will continue some investigations already begun in the forests of the Rocky mountains in the northwestern part of Montana, and Mr. Howe will do similar work in the vicinity of Burlington, Vermont.

THE work in irrigation provided for by Congress will be under the direction of the Director of the Geological Survey, Dr. Charles D. Walcott, and of Mr. F. H. Newell, chief of the Hydrographic Bureau.

DR. HEBER D. CURTIS has been appointed assistant in the Lick Observatory for three years, dating from the departure of the Mills Expedition to Chili, with principal duties in spectroscopy. Dr. Curtis is a graduate of Michigan University, A.B., '92, and A.M., '93; was professor of mathematics and astronomy in the University of the Pacific 1896-1900; was an eclipse observer in Georgia, 1900, and Sumatra, 1901; and has this year taken his Ph.D. degree at the University of Virginia.

THE election of two American members of the Executive Council of the Association Internationale des Botanists by votes of the American members of the Association took place on June 1. Professors C. E. Bessey and W. F. Ganong were elected.

MR. GEORGE GRANT MACCURDY has been chosen to represent the Paris Society of Anthropology at the coming International Congress of Americanists to be held in New York, October 20-25, 1902.

AT the meeting of the American Climatologic Association at Los Angeles the following officers were elected for the ensuing year: *President*, Dr. Norman Bridge, Los Angeles; *Vice-Presidents*, Drs. J. C. Wilson, Philadelphia, and H. S. Orme, Los Angeles.

AT the recent commencement exercises of the Stevens Institute of Technology, an address commemorative of the late President Henry S. Morton was made by the Rev. Edward Wall.

THE treasurer of the Hyatt memorial fund, to which we called attention last week, acknowledges the receipt of subscriptions amounting to \$662. Further subscriptions may be sent to Mr. Stephen H. Williams, 10 Tremont Street, room 80, Boston.

A MEMORIAL tablet to commemorate the late Professor Hughes has been erected in the chapel at King's College, London, and a prize has been established to be called the Hughes Memorial Prize in Anatomy.

WE regret to record the death, through an accident, of Professor J. B. Johnson, dean of the College of Engineering of the University of Wisconsin. Born at Marlboro, Ohio, in 1850, Professor Johnson graduated from the University of Michigan in 1878, and later served as civil engineer on the United States Lake and Missouri River Surveys. He was called to the chair of civil engineering at Washington University, St. Louis, in 1883. While in St. Louis he conducted a large testing laboratory, at which the U. S. timber tests were made. In 1899 he accepted the position he filled at the time of his death. He was the author of 'The Theory and Practice of Surveying,' 'Modern Frame Structures,' 'Engineering Contracts and Specifications,' 'Materials of Construction,' etc. He was a member of the London Institution of Civil Engineers, the American Society of Civil Engineers, the American Society of Mechanical Engineers and a fellow of the American Association for the Advancement of Science.

MR. CHARLES T. CHILD, the electrical engineer and one of the editors of the New York *Electrical World*, died on June 23, at the age of thirty-five years.

DR. CARLO RIVA, docent in petrography at the University of Pavia, was killed on June 3 by an avalanche while engaged in scientific investigations on Monte Grigna.

MRS. PHOEBE A. HEARST, regent of the University of California, has presented to the Lick Observatory the sum of twenty-five hundred dollars, available in the year 1902, for the purpose of increasing its equipment. Previous gifts to the Observatory by Mrs.

Hearst in the early nineties provided for the Eclipse Expedition to Chili in 1893, for a temporary fellowship, and for various other purposes.

MR. PIERPONT MORGAN has presented to the museum of the Jardin des Plantes a collection of precious stones valued at \$10,000.

WE learn from the *Bulletin* of the American Mathematical Society that the Scientific Society of Harlem has proposed, as the subject for its prize in 1903, the investigation of the Japanese mathematics of the middle of the seventeenth century, and that the subject of the prize competition for the present year of the Société Scientifique of Brussels is 'to make a critical study of the works of Simon Stevin on mechanics, comparing them with those of Galileo, Pascal and other men of science of the same period.'

THE optical works of John A. Brashear Co., Ltd., have completed the 37½ inch mirror for the reflecting telescope to be used by the D. O. Mills Expedition sent from the Lick Observatory to Chili, in determining the velocities of the southern stars in the line of sight. It is expected that the expedition will be able to sail from San Francisco within the next six weeks.

THE French Association for the Advancement of Science will meet at Montauban on August 7.

Nature states that the eighty-third meeting of the Société Helvétique des Sciences Naturelles will be held at Geneva on September 7-10. M. E. Sarasin is the president of the society, M. Marc Micheli and Professor R. Chodat vice-presidents, M. Maurice Gauthier and M. A. de Candolle secretaries, and M. A. Picotet treasurer. Correspondence referring to the forthcoming meeting should be addressed to M. de Candolle, Cour de St. Pierre, 3, Geneva.

THE department of state has received from the French embassy notice of the Sixth International Congress of Hydrology, Climatology and Geology to be held in Grenoble, commencing September 28, 1902. Papers will be read on the following subjects: *Hydrology*.

—(1) Action of mineral waters on the tissues; (2) practical methods of microbiological analysis applicable to mineral waters; (3) importance of complete chemical analysis of mineral waters with reference to mineral and organic matters to enlighten thermal medicine; (4) legal measures for protecting the exploitation of thermal and mineral waters; (5) hydromineral treatment of pulmonary consumption, (6) of skin diseases, and (7) of stomach complaints; (8) preventive action with children with constitutional tendencies. *Climatology*.—(9) Variation of respiratory exchanges as influenced by altitude, heat and cold; (10) meteorological conditions necessary to the installation of a sanatorium; (11) open or closed sanatoriums. *Geology*.—(12) Whether mineral waters intercepted by artificial means suffer variations of temperature according to the seasons; what variations; (13) relations of the principal thermal springs of Dauphiny with the geological nature of the soil; origin; (14) statistics regarding the mineral springs of Savoy and Dauphiny; (15) geological conditions and origin of the mineral waters of Oriol and La Motte (Isère).

THE Secretary of State will invite foreign governments to send delegates to the International Mining Congress, which convenes in Butte, September 1. The trunk lines of the United States will join with the Western Passenger Association in offering a rate of one fare plus two dollars for round trip to the congress.

THE president and council of the British Institution of Electrical Engineers gave a *conversazione* at the Natural History Museum, Cromwell-road, on July 1, to meet the members of the Incorporated Municipal Electrical Association and the foreign delegates to the International Tramways and Light Railways Congress.

A DEPUTATION from the British Institution of Electrical Engineers waited upon Mr. Gerald Balfour at the Board of Trade on June 19 to urge that something should be done to remove the impediments in the way of electrical industrial development. Amongst those present were Lord Kelvin, the Earl of Rosse,

Lord Greenock, Sir Michael Foster, M.P., Sir Thomas Wrightson, M.P., Professor Perry, Professor Thompson, Lieutenant-Colonel Crompton, C.B., Major-General Webber, C.B., Dr. Spence Watson, and Mr. James Swinburne (president of the Electrical Engineers). Lord Kelvin introduced the deputation, and Mr. James Swinburne stated the case of the Institution. He was of the opinion that the staff of the Board of Trade which dealt with the regulations for the supply of electricity ought to be strengthened, and nothing less than a royal commission was required to deal with the whole question of electrical legislation. In his reply Mr. Gerald Balfour said that he fully recognized the importance of the subject and to a large extent sympathized with the deputation. He was afraid that it was undeniable that the electrical industry in England was behind America and Germany, and perhaps some other of the continental countries. It appeared that the really important question was not so much that of any impediments thrown directly by the legislature in the way of the development of the electrical industry, as the power which the legislature had given to the local authorities to veto schemes. He then reviewed the attempts that had been, and were being made, to remedy the condition of affairs and stated that the board was as anxious as the deputation to secure that the public interests should be properly served by the development of the electrical industry. With regard to the appointment of a royal commission he could not pledge himself, but he must consult his colleagues in the cabinet.

UNIVERSITY AND EDUCATIONAL NEWS.

THE corner stone for the new educational institution for which Mr. James Milliken gave \$200,000 and an endowment of \$20,000 a year has been laid at Decatur, Ill. Citizens of Decatur and the Cumberland Presbyterian Church added \$300,000 to the endowment. It is to be known as Milliken University.

PRESIDENT HARRIS, of Amherst College, has announced a gift to the library of \$25,000 by