

SCIENTIFIC NOTES AND NEWS.

At the last meeting of the Rumford Committee of the American Academy of Arts and Sciences it was voted to appropriate the sum of \$300 to Professor E. F. Nichols, of Dartmouth College, for the purchase of a spectrometer in furtherance of his research on resonance in connection with heat radiations.

DR. FRANZ BOAS, professor of anthropology in Columbia University and curator of anthropology in the American Museum of Natural History, has been elected an honorary member of the Anthropological Institute of Great Britain and Ireland.

PROFESSOR W. O. ATWATER, of Wesleyan University, has gone to Havana for a conference on the dietary standards for the public institutions.

PROFESSOR EMILE BOUTROUX, of the Sorbonne, has been elected Gifford lecturer in the University of Glasgow, in succession to the Master of Balliol, whose term has expired.

PRINCIPAL E. H. GRIFFITHS, of Cardiff University College, has been given the degree of Doctor of Science by Cambridge University.

DR. M. E. WADSWORTH, head of the department of mines and mining in Pennsylvania State College, has been elected geologist for the Pennsylvania State Board of Agriculture.

MR. HENRY L. WARD, one of the managers and vice-president of Ward's Natural Science Establishment, Rochester, N. Y., has been elected to the position of custodian and secretary of the Public Museum of Milwaukee, which position he will assume the latter part of March.

PROFESSOR E. MILLOSEVICH has been appointed director of the Astronomical Observatory at Rome as successor to Professor Tacchini, who retired recently.

THE trustees of the Ohio State Academy of Science have made the following grants from the Emerson McMillin research fund: Professor Lynds Jones, Oberlin, Ohio, to enable him to complete his 'Catalogue of the Birds of Ohio,' \$75; Professor J. S. Hine, Columbus, Ohio, to enable him to complete his work on the Tabanidæ, \$50; Professor J. H. Schaffner and Fred. Tyler, to study and report

on the ecology of Brush Lake, Champaign County, \$50. No. 5 of the Special Papers of the Academy will soon be printed. It contains the results of investigations made with the aid of this fund.

DR. CHARLES H. GILBERT, head of the department of zoology of Stanford University, will sail soon on the U. S. steamer *Albatross* on a six-months' scientific expedition to Hawaii, to continue the work conducted last year by Dr. David Starr Jordan and Dr. Oliver P. Jenkins. Dr. Gilbert will be accompanied by Professor C. C. Nutting, of the University of Iowa; Dr. John C. Snyder, instructor in zoology at Stanford, and Mr. Walter F. Fisher, a Stanford graduate from the same department.

THE British Government appointed some time since a committee of experts, consisting of Lord Rayleigh, Sir J. Wolfe Barry and Professor Ewing, to ascertain how, if possible, the vibration of the Central London 'tube,' which is causing serious injury to property overhead, can be prevented. The committee recommends substituting carriages with motors underneath for the locomotives now used.

DR. ADOLF MEYER, director of the pathological Institute for the New York State Hospitals, gave an address entitled 'Conditions for Psychiatric Research,' before the Philadelphia Neurological Society on February 25. After the address a reception was tendered Dr. Meyer at the University Club.

DR. L. O. HOWARD, entomologist of the U. S. Department of Agriculture, gave the annual public lecture before the Brown Chapter of the Society of the Sigma Xi on Wednesday evening, February 26, his subject being 'The Practical Applications of Entomological Science, with special reference to Shade Tree Insects.'

THE death is announced of Mr. William Martindale, a prominent British pharmacist at the age of sixty-one years. He had been president of the Pharmaceutical Society and was for many years one of its board of examiners.

THE death is also announced of Dr. Charles Stuart, a well-known English naturalist.

CIVIL service examinations will be held in New York City on March 15, for the following positions in the reorganized Pathological Institute: Associate in chemistry (\$1,800); associate in clinical psychiatry (\$1,200); associate in neuropathology (\$1,800).

THE Prussian *Budget* for 1902 appropriates 20,000 Marks for further study of means of prevention and early diagnosis of typhoid fever; 10,000 Marks to the Committee for Cancer Research, and 53,000 Marks to be applied to the erection and maintenance of a cancer ward and laboratory in connection with the Charité Hospital at Berlin.

THE newly-organized American Electro-Chemical Society, which now numbers 294 members, will hold its first meeting at Philadelphia on April 3, 4 and 5.

THE general meeting of the American Philosophical Society, to which we have already called attention, will be held in the hall of the Society in Independent Square on April 3, 4 and 5. The morning sessions begin at 10:30 A. M. and the afternoon sessions at 2 P. M. Members intending to be present who have not yet notified the Committee on Arrangements to that effect are particularly requested to do so without delay. Luncheon will be served in the rooms of the Society. A reception will be given to the members by the president and managers of the department of archeology of the University of Pennsylvania at the Free Museum of Science and Art, Thirty-fourth and Spruce Streets, on Thursday evening, April 3, at 9 o'clock. The visiting members will be the guests of the resident members of the Society at dinner on Friday evening, April 4. A considerable number of important papers have been promised, a list of which will be published later in this journal.

UNDER the auspices of the department of zoology of Columbia University Dr. Jacques Loeb, professor of physiology and experimental biology at the University of Chicago, will give in March a course of lectures on 'The Dynamics of Living Matter.' The subjects are:

March 18, 'The General Chemical Character of Life Phenomena'; March 19, 'The General Phys-

ical Constitution of Living Matter'; March 20, 'Protoplasmic Motion, Muscular Contraction and Cell Division'; March 21, 'The Effects of the Galvanic Current upon Life Phenomena'; March 24, 'The Effects of Ions upon Various Life Phenomena'; March 25, 'The Effects of Light and Heliotropism'; March 26, 'Artificial Parthenogenesis and the Problem of Fertilization'; March 27, 'Regeneration and the Reversibility of the Process of Development.'

DR. ALEXANDER MACFARLANE will give at Lehigh University during March a course of lectures on British mathematicians of the nineteenth century, the dates and subjects being as follows:

March 14, 5 P.M., 'James Clerk Maxwell'; March 15, 11:30 A.M., 'Henry John Stephen Smith'; March 18, 5 P.M., 'William John Macquorn Rankin'; March 21, 5 P.M., 'James Joseph Sylvester'; March 22, 11:30 A.M., 'Peter Guthrie Tait'; March 25, 5 P.M., 'William Thomson, first Lord Kelvin.'

A COURSE of nine lectures upon 'Science and Travel' has been arranged by the Field Columbian Museum, Chicago, for Saturday afternoons in March and April at 3 o'clock. The lectures will be illustrated by stereopticon views. The subjects, dates and lectures are:

March 1.—'Texas Petroleum': Dr. WILLIAM B. PHILLIPS, professor of field and economic geology, University of Texas, and director of the university mineral survey.

March 8.—'The Sun Dance of the Cheyenne and the Arapaho': Dr. GEORGE A. DORSEY, curator of anthropology, Field Columbian Museum.

March 15.—'The Northern Rocky Mountains': Dr. STUART WELLER, assistant professor of paleontologic geology, University of Chicago.

March 22.—'Geological Field Work in the Iron and Copper Districts of the Lake Superior Region': Professor U. S. GRANT, Northwestern University, Evanston, Illinois.

March 29.—'Birds and their Nests': Dr. JAMES ROLLIN SLONAKER, University of Chicago.

April 5.—'Insects of Southern Peru and Bolivia': Mr. WILLIAM J. GERHARD, assistant curator, Division of Entomology, Field Columbian Museum.

April 12.—'Interpretation of Some Features of Landscape': Professor CONWAY MACMILLAN, University of Minnesota, Minneapolis.

April 19.—'Recent Explorations in Prehistoric Hopi Ruins, Arizona' (Stanley McCormick Expedition): Mr. C. L. OWEN, assistant curator,

Division of Archeology, Field Columbian Museum.

April 26.—‘The Crow Indians of Montana, A Western Plains Tribe’: Mr. S. C. SIMS, assistant curator, Division of Ethnology, Field Columbian Museum.

WE learn from the London *Times* that the Government of India, which some time since selected an officer of the Forest Department to study the insects injurious to forests, more recently appointed an inspector-general of agriculture. It is reported now to be considering a further important step in the same direction, in the shape of the establishment of a scientific board to cooperate with the inspector-general. Probably it would consist of an economic botanist, entomologist, geologist and chemist. Agriculture is by far the greatest of Indian industries. The institution of a staff of trained inquirers to bring the light of Western science to battle with the legion of its chief enemies—drought, insect pests, and obstinate human ignorance—would be in entire accordance with the enlightened spirit of Lord Curzon’s administration.

PROFESSOR M. FOSTER, secretary of the Royal Society, has addressed a letter to the London *Times* explaining the relation of the Royal Society to the proposed British Academy. He says: A committee of the Society was appointed to consider various suggestions which had been made to the Society as to the representation of philosophico-historical studies in an ‘academy,’ and to state ‘the various reasons which may be urged for and against’ the several suggestions. It is quite incorrect to speak of the eminent persons in question as ‘applicants’ for membership, or of the committee as appointed to consider whether the Society could recognize their claims, or should extend their charters in order so to do, though the committee did incidentally inquire into the powers given to the Society by the charters, and came to the conclusion that the above-mentioned studies could be included in the work of the Society. The suggestions were four in number—one proposing the creation of an independent organization and three proposing the promotion of these studies within the Royal Society itself in three different ways. The committee in its

report made no recommendations; it simply ‘stated the reasons for and against.’ The council consulted the whole body of fellows at a special meeting, and subsequently passed a resolution, the meaning of which was that it approved of the first suggestion.

THE British Meteorological Council has presented a report to the Royal Society which has been issued as a government blue book. The work of the office is summarized under the following heads: (1) Ocean Meteorology—the collection, tabulation and discussion of meteorological *data* for all parts of the ocean traversed by British ships. The preparation and issue of charts or other publications exhibiting the results obtained from the discussion of the observations. The issue of meteorological instruments for use on board the ships of the Royal Navy, and for observers belonging to the merchant service, with which is associated the supply of instruments to the telegraphic reporting stations, etc. (2) Weather Telegraphy—the collection of observations transmitted by telegraph three times in each day from selected stations in the British Isles (chiefly on the coasts) and on the continent of Europe, the preparation of a daily report embodying the observations and of forecasts of weather based upon them, and the issue of warnings to ports on the coasts of the United Kingdom whenever there are indications of the approach of severe storms. (3) Climatology—the collection of information of various kinds from observatories and other land stations in the British Isles and from a few stations in British possessions or in foreign countries with the view of extending the accurate knowledge of the meteorological conditions obtaining in the various districts in which the observations are made, and of the changes to which they are subject. (4) Library—for the collection and preservation of weather maps and other publications issued by the colonies and dependencies of the British Empire and by foreign countries, so that they may be available for consultation by those requiring information as to the weather in various parts of the globe. (5) Miscellaneous investigations. (6) Publications. (7) Finance.

Nature states that an astronomical observatory has been erected and equipped by the Bengal Government at the Presidency College, Calcutta, and was recently opened. The idea of providing means for the instruction of Indian youths in practical astronomy was conceived about five years ago, when the Maharaja of Tipperah presented to the Presidency College an equatorial telescope by Grubb, 4½-inch aperture. On Dr. J. C. Bose's representation, the Government of Bengal agreed to provide a building suitable for observations. But it was not done until after the eclipse of January, 1898, when the professional and amateur astronomers who visited India caused active interest to be taken in building the observatory. From an article in the *Pioneer Mail* it appears that the chief instrument of the observatory is a 7-inch equatorial by Sir Howard Grubb, with an electrically controlled driving clock and with electric lights for all the graduated circles. The telescope will generally be used for eye observations, but the object-glass may be adapted to photography, and the mounting of the telescope is of a strength that will admit of its being used for spectroscopic examination of the sun or the brighter stars.

At a meeting of the members of the Royal Institution on February 3 thanks were returned to Sir Frederick Bramwell, for his donation of £100, and to Mr. Frank McClean, for his donation of £50 to the fund for the promotion of experimental research at low temperatures. It was announced that the following valuable relics of Michael Faraday, bequeathed to the institution by the late Mr. Thomas J. F. Deacon, had been received: Medals of silver and bronze (numbering 20 in all), and including the Fuller medal of 1828, two Copley medals of 1832 and 1838, two Newton medals of the Royal Society, 1833 and 1838, and the Rumford medal of 1846; and two foreign Orders, contained in a small mahogany box; a book of portraits and autographs, including original letters from the Prince of Wales and Prince Alfred, Louis Napoleon, Humphry Davy, Thomas Young, Humboldt, John Dalton, Whewell, Mary Somerville and many others; a daguerrotype of a consultation of

Faraday with Professor Daniell; a drawing in colors of the laboratory of the Royal Institution, and a manuscript book entitled 'A Class Book for the Reception of Mental Exercises instituted July, 1818,' containing contributions by Faraday.

THE following sets of scientific books were recently sold at auction in London: *The Alpine Journal*, from the commencement in 1863 to November, 1901, £29 10s.; M. C. Cooke, 'Illustrations of British Fungi,' and supplement, 1881-91, with upwards of 700 colored plates, £23; the *Quarterly Journal of the Geological Society of London*, from the commencement in 1845 to August, 1901, £16; Sowerby's 'British Botany,' 1863, etc., £33; the publications of the Palæontographical Society, 1848-97, £17 15s.; H. G. L. Reichenbach, 'Icones Floræ Germanicæ et Helveticæ,' etc., 1850-99, 23 volumes with upwards of 2,000 colored plates, £63 10s.

WE learn from the London *Times* that under the presidency of Dr. Morris, the Imperial Commissioner of Agriculture, the fourth West Indian Agricultural Conference was held at Barbados on January 4 and 6 last, there being a large gathering of the representatives of the botanical, chemical, and educational departments, and of the chief agricultural societies in the West Indies. The proceedings were opened by Sir Frederic Hodgson, the governor of Barbados, in an address of welcome. In his presidential address Dr. Morris passed in review the various industries of the islands, from sugar to bee-keeping and onion-growing. With regard to the question of central factories he expressed the hope that in some of the smaller sugar islands it had approached a stage when the details may be submitted to the consideration of the planting community. In Barbados the opinion is not unanimous that central factories would materially improve the condition of all classes of the community. It is only proposed to introduce factories gradually, but so long as nothing is done it is difficult to look forward with any degree of comfort to the future of the sugar industry of the island. Papers on various subjects were read and discussed, sugar, naturally, taking the

foremost place. There were communications on sugar-cane experiments in Barbados, Antigua, St. Kitts, Trinidad and British Guiana. In Guiana an important feature has been the trials of canes on an estate scale, in addition to the necessary small plots. It is fully realized by the officials of the Imperial Agricultural Department that a strenuous attempt must be made to raise the general standard of intelligence amongst all classes; and it is in contemplation shortly to commence the publication of a fortnightly paper, the *Agricultural News*, containing hints and advice in regard to all points of interest in the islands.

UNIVERSITY AND EDUCATIONAL NEWS.

It is announced that Mr. James Stillman, of New York, has given \$100,000 for the establishment of a chair of anatomy in the Harvard Medical School.

THE University of Wooster, Wooster, O., successfully completed on February 21 a campaign to raise \$140,000 in order to secure two large conditional gifts, \$100,000 by Mr. Andrew Carnegie and \$50,000 by Mr. L. H. Severance, of Cleveland. In place of the building which was destroyed by fire on December 11, there will be erected a main building containing lecture rooms, a building for chemistry and physics, a building for biology and geology, an academy building and a heating plant.

It is proposed to establish in New York City a branch of the Catholic University of America, to be known as the Department of Pedagogy.

MR. JOHN D. ROCKEFELLER has given \$5,000 to Washington and Lee University, thus completing the fund of \$100,000 for a memorial to the late President William L. Wilson, in the form of an endowment for the chair of economics and political science.

THE trustees of the University of Pennsylvania have awarded the contract for the construction of the new Medical Laboratories. In the extent of the plan and in the cost of this addition to the facilities of the University, it is the most important agreement ever entered into by the corporation. Since the study of the subject was first begun, the scope of the

purposes to be attained has so widened that from the original projected cost of two hundred thousand dollars, three years ago, the cost of the completed undertaking now entered upon will be about six hundred thousand dollars. The study of the plans has covered all the scientific medical laboratories both in Europe and in this country; and the faculty of medicine feel, and the members of the medical committee of the trustees feel, that the result as submitted by the architects, Messrs. Cope & Stewardson, will repay all the attention and study and pains which have been taken. The building will be wholly fire-proof, and its extent may be understood when it is known that its front on Hamilton Walk is three hundred and forty feet, and the depth of its western wing, one hundred and ninety feet. Provision in respect of north light and of quiet and of freedom from dust has been made for original work in all three of the laboratories included in the building.

PROFESSOR JOSIAH ROYCE, professor of philosophy at Harvard University, and Professor J. Mark Baldwin, professor of psychology at Princeton University, will lecture before the summer school of the University of California during July.

AT Cambridge University Professor Tilden, F.R.S., has been appointed an elector to the chair of chemistry; Lord Rayleigh, F.R.S., an elector to the chairs of chemistry and of mechanism; Dr. Hill, to the anatomy chair; Mr. F. Darwin, F.R.S., to the botany chair; Dr. Hinde, F.R.S., to the geology chair (Woodwardian); Sir G. G. Stokes, F.R.S., to the Jacksonian and Cavendish chairs; Dr. D. MacAlister, to the Downing chair of medicine; Dr. Hugo Müller, F.R.S., to the chair of mineralogy; Professor E. Ray Lankester, F.R.S., to the chair of zoology and comparative anatomy; Professor McKendrick, F.R.S., to the chair of physiology; Lord Lister, F.R.S., to the chair of pathology; and Professor Marshall Ward, F.R.S., to the chair of agriculture.

DR. FRANZ WILHELM NEGER, curator in the Botanical Museum at Munich, has been called to a professorship in the School of Forestry at Eisenach.