LECTURES AT THE AMERICAN MUSEUM OF NATURAL HISTORY, NEW YORK.

THE following are the courses of lectures to be delivered at the Museum, during the present season:

A Saturday afternoon course by officers of the Museum to members, illustrated.

January 6th.—The Philippine Islands: Professor Albert S. Bickmore.

January 13th.—A Naturalist in Florida: Mr. Frank M. Chapman.

January 20th.—Results of the Third Season's Explorations for Dinosaurs in Wyoming: Professor H. F. Osborn.

January 27th.—A Hunt for Fossil Horses and Elephants in Texas: Dr. W. D. Matthew.

February 3d.—The Geology and Mineralogy of Greater New York: Dr. L. P. Gratacap.

February 10th.—The Yellowstone National Park: Dr. E. O. Hovey.

February 17th.—The Eskimo of Hudson Bay: Professor Franz Boas.

February 24th.—The Thompson Indians of British Columbia: Mr. Harlan I. Smith. (The Jesup North Pacific expedition.)

March 3d.—The Madu Indians of California: Dr. Roland B. Dixon. (The C. P. Huntington expedition.)

March 10th.—The Pre-historic Sculptures of Mexico and Central America, exhibited in the Anthropological Department of the Museum: Mr. M. H. Saville. (The Loubat collection.)

March 17th,—Pre-historic Ruins in New Mexico: Professor F. W. Putnam. (The Hyde expedition.)

A lecture on 'A Naturalist in Cuba,' by Mr. Frank M. Chapman, will be delivered under the auspices of the Linnæan Society, January 11th.

Two lectures will be given on January 18th and 25th under the auspices of the New York Mineralogical Club.

A course of four lectures, by Professor A. S. Bickmore, will be delivered on March 8th, 15th, 22d and 29th.

Two lectures will be given on April 5th and 12th, under the auspices of the New York Botanical Garden.

The Thursday evening course to members (illustrated) by Professor Bickmore is as follows:

Dec. 7th.—The Philippines, Manila and the Cagals.

Dec. 14th.—The Visayans and Sulus.

Dec. 21st.—The Hawaiian Islands, Honolulu.

Dec. 28th.—Kilenea and Haleakala.

The Columbia University lectures given in cooperation with the Museum, by G. W. James, are:

Dec. 2d.—Down the Canyons of the Colorado with Major Powell.

Dec. 9th.—Dynamic Geology of the Grand Canyon.

Dec. 16th.—The Pamtes Desert.

Dec. 23d.—The Mesas of Acoma, Zuni and Moki.

Dec. 30th.—The Canyons of the Cliff Dwellers. This course is continued by other lecturers every Saturday evening from January 6th until March 31st.

SCIENTIFIC NOTES AND NEWS.

Professor Simon Newcomb has been elected a correspondent of the 'Bureau des Longitudes,' Paris, and a foreign member of the Royal Society of Lombardy.

THE Council of the Royal Society has awarded the Copley Medal to Lord Rayleigh, F.R.S., for his contributions to physical science, and the Davy Medal to Mr. Edward Schunck, F.R.S., for his investigations on madder, indigo and chlorophyll.

Dr. A. H. Doty, health officer of New York City, has returned from Europe, after several weeks spent in studying sanitary systems employed abroad.

WE learn from the Botanical Gazette that the international scientific medal of the Academie Internationale de Geographie Botanique has been conferred upon Dr. N. M. Glatfelter, of St. Louis, for his work upon Salix, and upon Dr. Roscoe Pound, of Lincoln, Nebr., for his phytogeographical researches. Fifteen investigators in Europe have been similarly honored.

MR. SHELFORD BIDWELL, M.A., LL.B., Gonville and Caius College, Cambridge, has been approved by the General Board of Studies for the degree of doctor in science.

HERR F. K. GINZEL, of the Bureau of Com-

putation of the Berlin Observatory, has been appointed to a professorship.

THE death is announced of Mr. Augustus Doerflinger, a well-known engineer, at Brooklyn, on November 24th, in his fifty-fifth year. He was a graduate of Cornell University, and in the service of the government had charge of the removal of Hell Gate in the Harbor of New York City, and other important engineering works.

DR. WILHELM ZENKER, the physicist, died in Berlin, on October 21st, aged seventy years.

The botanist and philologist, Stephan Ladislaus Endlicher, who died in 1849, was buried along with his wife Cecilia in the Matzlemsdorfer Cemetery in Vienna. Natural Science quotes from a Vienna journal the statement that on the 21st of June, the bodies were removed to a worthier resting place near the main entrance to the central Friedhof. The Rector of the University, Professor J. Wiesner, and the Director of the Botanical Gardens, delivered short orations in praise of Endlicher's genius and the services which he rendered to botany, philology, and science in general.

A MEMORIAL of Professor Heinrich van Bamberger, formerly professor of medicine in the University of Vienna, was unveiled in the quadrangle of the University on October 29th. An address was delivered by Professor Neusser.

Dr. Berthold Laufer has returned to Yokohoma from his expedition to the Amoor river and Saghalin, undertaken for the Jesup North Pacific expedition of the American Museum of Natural History, after an absence of nearly two years.

Professor John Milne, of Newport, Isle of Wight, has reported as follows to the trustees of the Elizabeth Thompson Science Fund: On February 19, 1898, the trustees of the Elizabeth Thompson Science Fund assigned me a grant of \$250 in aid of a seismic survey of the world. This was expended in purchasing a horizontal pendulum, which was shipped to the care of H. M.'s Consul-General, W. J. Kenny, in Hawaii. When Mr. Kenny left Honolulu in March, 1899, the instrument was handed to Professor Maxwell, who will work in conjunction with Professor Alexander and Professor

Hosmer (principal of the government high school), and the latter, I understand, will kindly make arrangements for its installation. Professor George Davidson, chairman of a committee appointed by the council of the University of California to undertake seismic investigations, writes me that Mr. Bishop, of Honolulu, has promised a site for the instrument, and that Professor Alexander will see that it is placed in working order. It is hoped that by next year a series of records will have been obtained from this exceedingly important station. Copies of the report based upon these records should be sent to the secretary of the board of trustees of the Elizabeth Thompson Science Fund, Harvard Medical School, Boston, Mass., through the liberality of which body the Hawaiian station has been established.

THE Botanical Gazette states that by the cooperation of a local mountain club, Dr. R. von Wettstein, the director of the Vienna Botanical Garden, has been enabled to establish a Biological Experiment Station in the Tyrolese Central Alps, near the 'Bremer Hütte' in the Geschnitzthal, at an elevation of 2,300 m. A room in the college has been fitted up for a laboratory. Research will be directed first to the production of species by direct adaptation.

It is reported in *Natural Science* that an Association has been formed of collectors for the purpose of exploring the local lepidopterous fauna of Hildesheim and vicinity, under the title of *Verein für Schmetterlingsfreunde*. Professor A. Radcliffe Grote of the Roemer Museum presides.

The first meeting of the 81st session of the Institution of Civil Engineers was held at its house, Great George-street, Westminster, London, on November 7th, when the new president, Sir Douglas Fox, took the chair and delivered his inaugural address. The speaker called attention to the fact that Great Britain is not holding its own in mechanical science, compared with the nations of the continent and with the United States, especially in the introduction of electricity for lighting, traction and transmission of power.

THE first scientific meeting of the Zoological Society of London for the session 1899-1900 took place at its house, 3 Hanover Square, on Tuesday, November 14th.

A MEETING of the Fellows of the Royal Botanic Society was held in the museum at the Royal Botanic Gardens, Regent's Park, London, on November 11th, Major Cotton presiding. He stated that the number of Fellows elected this year had been greater than in any previous year since the foundation of the Society. He added that the club, which was founded at the beginning of the year, had been very successful, and the members, limited as they were to Fellows of the Society, now numbered over 600. The series of dinners that had taken place in the summer were so largely attended that many had had to be turned away, and steps were consequently being taken to increase the accommodation. In connection with the club dinners, entertainments were now being given every Wednesday evening and the Fellows were cordially invited.

Dr. Tiessen's scientific notices state that a bacteriological institute has been established by the Russian government in Wladiwostok, East Asia, and that one is planned for Merw in Central Asia.

It is reported that the Russian Astronomical Society has finally given up its attempt to revise the Julian calendar. The reason assigned for its failure by the Society is "the impossibility of establishing an agreement between the dates of the religious festivals appearing in both calendars."

ACTING SUPERINTENDENT WILCOX, of the Yosemite National Park, in his annual report, recommends that the government buy out the owners of patented lands within the park limits. Other recommendations are the fixing of penalties for violation of the park regulations; obtaining authority from the state of California to establish a camp for troops within the Yosemite valley for patrol purposes, a permanent camp to be constructed at Wawona; a systematic burning of fallen and dead timber, to prevent forest fires; and some decisive action to prevent diverting the waters flowing into the park. The report says the deer are fairly plentiful and tame, bear, quail, squirrels and trout are numerous, and mountain lions and lynx are to be found.

A PRESS despatch from Washington states that the War Department is at work on the problem of wireless telegraphy for the signal The Signal Corps has been handiservice. capped recently both by lack of funds and officers to experiment on an extensive scale, but Capt. Reiber, at Governor's Island, New York, is carrying on a series of experiments between that point and Tompkinsville, with a view to adapting the army apparatus for communication between fortified points and in any other locations where the wireless system might prove superior in practice to the older form of teleg-The army is not dependent on Marconi for instruments, having developed a system of its own, and the work will be pushed with vigor when Congress furnishes the necessary means.

COMMENTING on the failure of the British Government to use wireless telegraphy in South Africa Nature says: Science, and especially the latest developments of science, are the last things to interest our government and the government departments; they do not believe in science, they care to know very little about it, and the scientific spirit is absent from too many of their plans and doings. Hence we have now to be thankful that they have reached the level of the pigeon post, which has been the only official means, and that on the part of one or two birds, to keep us in touch with our beleaguered forces. It is stated that even the Commanderin-Chief, Lord Wolseley, has expressed some surprise that the so-called 'Intelligence Department' of the army allowed the Ladysmith force to go to the front with mountain guns against a Boer force which they should have known might be armed with Schneider-Canet cannons of large calibre; and it would seem that probably a terrible disaster has been prevented, not by our Intelligence Department, not by the outfit of our army, but by the apparently accidental arrival of naval guns and personnel at the last moment. Why is there not a Scientific Committee to do what it can in advising the military authorities? If they could do nothing, nobody would be the worse, but they might be able to do much to the nation's advantage.