

Oliver P. Terry, instructor in physiology, Purdue University.

Horatio H. Newman, instructor in zoology, University of Michigan.

Changes in the staff for 1908 will be announced later. The course will include study of the physico-chemical constitution of protoplasm, physics of cell-division and contractility, phenomena of inheritance from a physico-chemical standpoint, the physical basis of conduct, comparative physiology of the heart and circulation and comparative physiology of the central nervous system. Lectures will be given by members of the staff and others.

IV. The following courses will be offered in botany:

1. Morphology and Taxonomy of the Algæ, conducted by Dr. George T. Moore, assisted by George R. Lyman, assistant professor of botany, Dartmouth College, and R. R. Gates, fellow in botany, University of Chicago.

A general course upon the algæ, designed to give a detailed knowledge of the habits, structures and life histories of this group.

2. Morphology and Taxonomy of the Fungi, conducted by Dr. Lyman and Mr. Gates. A general course upon the fungi similar to that outlined for the algæ.

3. General Morphology of Plants.

No prerequisites are stated for this course, which will be conducted either by Professor John M. Coulter or Professor C. J. Chamberlain, of the University of Chicago, with assistants: an outline of the plant kingdom, based upon the study of selected types. Emphasis will be placed upon the facts connected with the evolution of plants, such as the origin of sex, alternation of generations, heterospory, origin of the flower, origin of the seed, etc. The general relationships and classification of the flower groups will also be discussed, including the history of the groups as developed by paleobotany.

It is expected that Mr. W. R. Maxon, of the United States National Museum, will act as collector in botany. The usual lectures and seminars will be offered.

FRANK R. LILLIE

UNIVERSITY OF CHICAGO

CHARLES P. MATTHEWS

CHARLES P. MATTHEWS, professor of electrical engineering at Purdue University, died at Phoenix, Arizona, on Saturday, November 23, 1907. Professor Matthews was of Vermont stock, his family going from that state to New York in 1852, where, at Fort Covington, he was born September 18, 1867. At the time of his death he was, therefore, a little more than forty years of age.

He attended the St. Johnsbury Academy at St. Johnsbury, Vermont, graduating there in 1887. He then entered Cornell University, graduating from Sibley College with the degree of mechanical engineer in 1892. In 1901 he received the degree of doctor of philosophy from his alma mater.

Immediately after graduation he became instructor in physics and applied electricity at Cornell, serving in that capacity four years, until 1896. At that time he was called to Purdue and was appointed associate professor of electrical engineering. In 1905 he succeeded Professor Goldsborough as head of the School of Electrical Engineering and from this time until his death he was continuously a member of the Purdue faculty.

During Professor Matthews's connection with the School of Electrical Engineering, it has grown to be the largest in the country in point of numbers. In this development he has had a large share. His instruction was of the highest order not only on account of his professional ability and training, but quite as much on account of his exceptional personality and gifts.

He made valuable contributions to his science, his chief work being an investigation of photometric standards for arc lamps. This was done in connection with the National Electric Light Association. In this, he directed all the experimental work, designed the apparatus and prepared four reports aggregating about two hundred pages. In this connection he devised and patented an integrating photometer. This instrument received a gold medal at the Louisiana Purchase Exposition. He was also collaborator in the production of text-books in physics and elec-

tricity with Professors Nichols and Shearer, of Cornell, and with Professor Esterline, of Purdue, and he had published a number of papers on electrical subjects. He was a member of the honor fraternity, Sigma Xi.

THE SMITHSONIAN INSTITUTION

A REGULAR meeting of the board of regents of the Smithsonian Institution was held on December 3, 1907, at ten o'clock, at the institution, the chancellor, Chief Justice Fuller, presiding, and the following regents being present: Vice-president Charles W. Fairbanks, Senator Shelby M. Cullom, Senator Henry Cabot Lodge, Senator Augustus O. Bacon, Representative John Dalzell, Representative James R. Mann, Representative William M. Howard, Dr. Andrew D. White, the Hon. John B. Henderson, and the secretary of the institution, Dr. Charles D. Walcott.

The secretary presented his report for the year ending June 30, 1907, to the board, which was accepted. Statements were received from the executive and permanent committees. The secretary presented a statement of the affairs of the institution since the close of the fiscal year. Considerable attention was given to the National Gallery of Art, and a resolution was adopted urging congress to make an appropriation for adapting the large hall of the Smithsonian building to the purposes of a gallery of art. A resolution was also adopted tendering the thanks of the regents to William T. Evans for the gift of his valuable collections of paintings by American artists, and to the trustees of the Corcoran Gallery of Art for their courtesy in providing temporarily for the exhibition of this collection.

THE AMERICAN FEDERATION OF TEACHERS OF THE MATHEMATICAL AND THE NATURAL SCIENCES

THE second annual meeting of the American Federation of Teachers of the Mathematical and the Natural Sciences will be held in Chicago on January 1, 1908, at 2 P.M., in room 20 of the Kent Chemical Laboratory, University of Chicago. The purpose of the federation is a more unified and concentrated

effort on the part of its members to better the teaching of mathematics and of the natural sciences. The membership of the federation consists entirely of associations, each member being represented by delegates at the meetings. At the last meeting, a tentative organization was formed by the following associations: The Association of Teachers of Mathematics of the Middle States and Maryland; The New York State Science Teachers Association; The Central Association of Science and Mathematics Teachers; The Association of Teachers of Mathematics of New England; The Physics Teachers Association of Washington City; The Missouri Society of Teachers of Mathematics and Science; The New Jersey State Science Teachers Association.

Since the last meeting, the following associations have signified their intention of being represented at the coming meeting in Chicago: The Michigan Schoolmasters Club; The New England Association of Chemistry Teachers; The New York Physics Club; The Indiana Association of Science and Mathematics Teachers; The Association of Ohio Teachers of Mathematics and Science. At this meeting on January 1, the final form of the organization will be decided. All organizations whose leading purpose is the betterment of the teaching either of mathematics or of the natural sciences are invited to send delegates to this meeting and thus to take part in the organization of the federation. By joining this body, an association will lose in no way its individuality or its right to work in its own field in its own way; but it will gain an official means of keeping in touch with the work of the other associations, and will receive from the federation suggestions as to the ways in which all the associations may work together on their common problems.

C. R. MANN,

Secretary

UNIVERSITY OF CHICAGO

THE CONVOCATION WEEK MEETINGS OF SCIENTIFIC SOCIETIES

THE American Association for the Advancement of Science and the national scientific societies named below will meet at the Uni-