other preliminary arrangements preparatory to actual inauguration of the work.

The twenty-eight mural paintings will show the world as it appeared during past geological ages. Each picture will represent typical life and scenery of a geological period. Dinosaurs, three-toed horses, American camels, flying lizards, coral reefs and mammoths and mastodons, all are to be represented, and with them the surroundings amid which they lived.

Supplementing these paintings will be great modeled groups of animals and plants of the past in life size. While these groups will relate chiefly to the earlier geological periods, some later representations will be included.

Dr. B. E. Dahlgren, acting curator of botany of the museum, who has made notable reproductions of plant life in the Stanley Field plant reproduction laboratories, will have charge of this phase of the work. Work has already started on one geological group, which will show part of a forest of the coal period. The strange cryptogamic plants of that day, which formed forests that later became coal, will be shown in life size, and inhabited by life-sized restorations of insects and reptiles of that time.

The entire program is under the supervision of Dr. O. C. Farrington, curator of the department of geology of the museum.

PROPOSED NATIONAL RESEARCH INSTITUTE FOR CHEMICAL EDUCATION

ESTABLISHMENT of a National Research Institute for Chemical Education with an initial endowment of $2,000,000 is planned by the Senate of Chemical Education of the American Chemical Society, according to an announcement by the chairman of the senate, Professor Neil E. Gordon, of the University of Maryland, at the society's national headquarters, Washington, D. C.

The institute would be located at some university which is doing work of a high order in both chemistry and education, but would be organized separately from either of these divisions.

Its sponsors contemplate that it shall be the great meeting place for the chemistry teachers of the world and that it shall enable chemical education to be of greater service to industry. The idea of the institute arose from the needs of this ever-changing science.

Details of the plan have been definitely worked out and will be publicly discussed by the senate at sessions to be held in connection with the society's spring meeting at Richmond, Va., to be held from April 11 to 16. The senate is composed of representatives of education and industry from every state.

The charter, it is planned, will provide for a board of seven trustees, a board of seven scientific advisers, a general director, associate directors to head the departments and research assistants. Five departments, including graduate, undergraduate, industrial, high school and historical, are proposed.

The tentative budget to be presented to the senate calls for the employment of a general director and of five departmental directors at salaries of $10,000 each. Five fellowships of $1,000 each are proposed, and provision is made for extra summer faculty lecturers at an expenditure of $5,000. The estimated cost of the building to be occupied by the institute is $500,000.

PUBLIC LECTURES ON SCIENTIFIC TOPICS

A SERIES of illustrated lectures on important developments and discoveries in various fields of engineering will be given by members of the staff of the Harvard Engineering School during the second half-year. These lectures will be open to the public, and will be given in 110 Pierce Hall on Thursday afternoons, at 4:30 o'clock, as follows:

February 17, *The story of the incandescent lamp,* PROFESSOR H. E. CLIFFORD.

February 24, *Engines for airplanes,* PROFESSOR L. S. MARKS.

March 3, *Explosives and fertilizers from the air,* PROFESSOR GRINNELL JONES.

March 10, *Electric oscillations and radio communication* (with demonstrations), PROFESSOR G. W. PIERCE.

March 17, *The development of steel structures,* PROFESSOR G. F. SWAIN.

March 24, *The world search for metallic ores,* PROFESSOR D. H. MCLAUGHLIN.

March 31, *Supplying half a billion gallons a day of drinking water,* PROFESSOR G. M. FAIR.

April 7, *Floating metals from their ores,* PROFESSOR A. E. WELLS.

April 14, *Utilization of water power,* H. M. TURNER, consulting engineer.

The Chicago Academy of Sciences announces a course of free public lectures during the winter of 1927, at the Assembly Hall on Sundays at 3:30 P. M., in accordance with the following program:

February 6, *Exploration in the Peruvian Andes,* DR. ISAIAH BOWMAN, director of the American Geographical Society.

February 13, *New explorations in Kentucky caves,* RUSSELL T. NEVILLE, Kewanee, Illinois.

February 20, *What mushroom is that?* VERNE O. GRAHAM, principal of Burroughs School.

February 27, *Vegetation and native races of E. Africa,* DR. HOMER L. SHANTZ, head of the department of botany at the University of Illinois.

March 6, *From the Mackenzie to the Yukon,* MRS. LAURIE FRAZEUR, Senn High School.

April 3, *Life secrets of wild flowers,* A. C. PILLSBURY, University of California.