Four of the tours will be given before, and will be repeated after the conference. Tour V, which goes to the West Coast, will be given afterwards only. Two special trips are planned in addition, one going to Canada and one to visit the developments on the Susquehanna River.

As the tours move from city to city, data will be collected and at the end of each tour a carefully planned round-table discussion will be held in which leading experts of this country and others will participate. American and foreign methods and theories will be compared.

Tours have been arranged that bear on five general subjects: Tour I, Mineral Sources of Energy, including parties on coal, oil, gas and internal combustion engines; Tour II, Hydraulic Sources of Energy, including parties on dams, hydro plants and hydraulic research, TVA and the larger implications of hydroelectric development; Tour III, Metropolitan areas, utilities and research, including parties on steam power plants, electrical equipment, engineering education and research and business management of utilities; Tour IV, Railroad Transport; Tour V, Major Construction Projects.

The following points are included on the itineraries:

Tour I: Pre-Conference, New York, Detroit, Cleveland and Pittsburgh; Post-Conference, New York, Pittsburgh, Cleveland, Niagara Falls and Philadelphia.

Tour II: Pre-Conference, New York, Boston, Niagara Falls, Pittsburgh, Zanesville, Knoxville and other points in the Tennessee Valley; Post-Conference, New York, Montreal, Ottawa, Niagara Falls, Pittsburgh, Zanesville and the Tennessee Valley.

Tour III: Pre-Conference, New York, Schenectady, Chicago and Pittsburgh; Post-Conference, New York, Schenectady, Niagara Falls, Chicago, Pittsburgh and Philadelphia.

Tour IV: Pre-Conference, New York, Schenectady, Chicago and Pittsburgh; Post-Conference, New York, Schenectady, Niagara Falls, Chicago, Pittsburgh, Philadelphia.

Tour V: New York, Montreal, Ottawa, Niagara Falls, Chicago, Ft. Peck Dam, Grand Coulee, Seattle, Portland, San Francisco, Los Angeles, Boulder Dam, Knoxville and the Tennessee Valley.

MULTIPLE FELLOWSHIP OF THE PITTSBURGH PLATE GLASS COMPANY AT THE MELLON INSTITUTE

DR. EDWARD R. WEIDLEIN, director of the Mellon Institute of Industrial Research, Pittsburgh, Pa., has announced that the Pittsburgh Plate Glass Company has founded at the institute a multiple industrial fellowship.

The fellowship will study fundamental problems in various fields covered by the activities of the company. These activities include the production of plate glass, window glass, safety glass, special glasses, heavy chemicals, paints, varnishes and lacquers. These products, which have a close economic interrelationship, are also technically closely allied, so that investigation into the technology of one can become of value in its application to another. The Pittsburgh Plate Glass Company has been active in research in its various plants, and the establishment of this fellowship marks their recognition of the interdependence of technological advances and the value of centralized fundamental research.

Dr. Frederick W. Adams, who has been selected as senior incumbent of the fellowship, is from the Massachusetts Institute of Technology, where for the past fourteen years he has been a member of the department of chemical engineering, devoting most of his time to work in the School of Chemical Engineering Practice. His staff on the fellowship includes specialists in various lines of research. Dr. John D. Jenkins, who took his undergraduate work at the University of Oregon and received his Ph.D. from the University of Wisconsin, majoring in organic chemistry, leaves the Ditzler Color Company, a subsidiary of Pittsburgh Plate Glass Company in Detroit, where he has been engaged in the development and production of lacquers and industrial finishes. Dr. Harold E. Simpson, after receiving his Ph.D. at Ohio State University and spending a year in teaching at Rutgers University, has been research engineer in ceramics for the last six years at Battelle Memorial Institute. Dr. Lee Devol graduated from Marietta College and after several years of industrial experience with the Westinghouse Electric and Manufacturing Company and the Union Switch and Signal Company, completed graduate studies at the University of Pittsburgh, where he received his Ph.D. in physics. Dr. Kenneth B. McAlpine matriculated at the University of Buffalo, received his Ph.D. at Princeton University, majoring in physical chemistry, and spent several years with the Republic Steel Company at Youngstown before joining the staff of this fellowship. Phillip W. Crist graduated this year in physics from the Carnegie Institute of Technology.

Work on the various projects which are being started includes basic studies in the technology of glass, heavy chemicals, paints, varnishes and lacquers.

WORK IN THE NATURAL SCIENCES SUPPORTED BY THE ROCKEFELLER FOUNDATION

ACCORDING to the annual report the ,725,-439 was expended in 1935 by th nda-tion.

Appropriations to the amount of $2,426,125 were made in the field of the natural sciences, chiefly in connection with projects in experimental biology.

With regard to research involving the application of the techniques of the exact sciences to biological problems, the following grants were made in 1935: Columbia University, research in the biological effects of heavy hydrogen; Emma Pendleton Bradley Home, East Providence, Rhode Island, special research in electroencephalography; George Washington University, Washington, D. C., research in biochemistry; McGill University, research in the application of spectroscopic methods to biological and medical problems; Massachusetts General Hospital, research on the parathyroid hormone and calcium and phosphorus metabolism; National Research Council, Washington, D. C., work of the Committee on Effects of Radiation on Living Organisms; Technical Institute, Graz, Austria, biophysical chemistry; University of Chicago, research in the application of spectroscopic methods to biological problems; University of Copenhagen, special research in the application of methods and techniques of physics, chemistry and mathematics to biological problems; University of Leeds, research in the x-ray analysis of biological tissues; University of Michigan, research in the application of spectroscopic methods to biological and medical problems; University of Oxford, application of mathematical analyses to biological problems; University of Rochester, New York, research on the biological effects of heat; University of Stockholm, cooperative research in biophysics, chemical biology and cell physiology; University of Uppsala, research on the physical-chemical properties of proteins and other heavy molecules; and the University of Utrecht, Netherlands, research in spectroscopic biology.

In the field of physiology and genetics undertakings receiving aid from the foundation were the California Institute of Technology, research in general physiology; Clark University, Worcester, Massachusetts, research in neuro-physiology; Columbia University, research on the electrical characteristics of cells; Connecticut College for Women, building a research greenhouse and dark constant temperature and humidity rooms for research in plant hormones; National Research Council, Committee for Research in Problems of Sex; New York University, research in cell physiology; Roscoe B. Jackson Memorial Laboratory, Bar Harbor, Maine, research in mammalian genetics; State University of Iowa, special research on the physiology of the normal cell; University of California, Berkeley, research in plant genetics; University of Cambridge, Molteno Institute of Biology and Parasitology, research in cellular physiology; University of Michigan, research on the physiology of respiration; University of Rochester, research on the physiology of reproduction; and Washington University, St. Louis, Missouri, special research in nerve physiology.

Endocrinology research was aided at Ohio State University, Columbus, where work is being done on the chemical, physiological and clinical aspects of the hormone of the adrenal cortex; at the University of California, San Francisco, in a study of the chemical aspects of vitamins and hormones; at the University of Paris Laboratory of Histology, researches in endocrinology and vitamins; and at the University of Virginia, research in endocrinology.

The support of groups working on several phases of the natural science program includes aid to Leland Stanford, Jr., University, for researches in chemophysical biology; the Long Island Biological Association, Cold Spring Harbor, New York, for support of symposia; and to the University of Chicago, for biological research.

Fifty-one fellowships in the natural sciences were administered in 1935 by the foundation.

SCIENTIFIC NOTES AND NEWS

AMONG the honorary degrees conferred at the ninety-second commencement of the University of Michigan was the doctorate of laws on Dr. Lyman James Briggs, director of the National Bureau of Standards, and on Dr. Frederick George Novy, dean emeritus of the Medical School of the University of Michigan. The degree of doctor of science was conferred on Dr. George Wilcox Peavy, president of the Oregon State Agricultural College; Dr. Earle Raymond Hedrick, professor of mathematics at the University of California at Los Angeles, and Dr. Jacob Ellsworth Reighard, professor emeritus of zoology at the University of Michigan. Walter Percy Chrysler, chairman of the board of the Chrysler Corporation, received the degree of doctor of engineering, and Gabriel Kron, research engineer of the General Electric Company, the degree of master of engineering.

GRINNELL COLLEGE at commencement conferred the doctorate of science on Dr. Oliver E. Buckley, director of research for the Bell Telephone Laboratories, New York City.

DR. HAROLD HIBBERT, E. B. Eddy professor of industrial and cellulose chemistry at McGill University, was recently awarded the honorary degree of LL.D. by the University of British Columbia.

ON the occasion of his sixtieth birthday on June 11, Dr. Alfred L. Kroeber, professor of anthropology and