

succession to Sir William Hardy, who died on January 23.

The presidents of the sections, with the titles of their addresses, are as follows:

Section A (Mathematical and Physical Sciences): Professor H. M. MacDonald, "Theories of Light."

Section B (Chemistry): Professor T. M. Lowry, "Physical Methods in Chemistry."

Section C (Geology): Professor W. T. Gordon, "Plant Life and the Philosophy of Geology."

Section D (Zoology): Dr. E. S. Russell, "The Study of Behavior."

Section E (Geography): Professor A. G. Ogilvie, "Cooperative Research in Geography and an African Example."

Section F (Economic Science and Statistics): Professor H. M. Hallsworth, "The Future of Rail Transport."

Section G (Engineering): Professor F. G. Baily, "Sources of Cheap Electric Power."

Section H (Anthropology): Captain T. A. Joyce, "The Origin and Use of Yerba Maté."

Section I (Physiology): Professor H. E. Roaf, "Normal and Abnormal Color Vision."

Section J (Psychology): Dr. Shepherd Dawson, "Psychology and Social Problems."

Section K (Botany): Professor A. W. Borthwick.

Section L (Educational Science): Mr. H. T. Tizard.

Section M (Agriculture): Professor J. A. S. Watson, "Scientific Progress and Economic Planning in Relation to Rural Industry and Country Life."

An evening discourse, being a Memorial Lecture for the late president, Sir William Hardy, will deal with the preservation of meat, fish and fruit, and will be delivered on September 7. A second evening discourse will be delivered by Professor W. L. Bragg, on September 10, on "The Exploration of the Mineral World by X-rays." It is hoped that it will be possible to arrange an evening symposium on the general relation between Science and the Community on September 11. The title and speakers will be announced later.

A civic reception will be held by the Corporation of Aberdeen in the Art Gallery Buildings on the evening of September 6.

An extensive program of excursions and visits has been arranged for September 8.

It is anticipated that a garden party will be given by the University of Aberdeen on the afternoon of Tuesday, September 11.

Preceding the meetings an excursion of a fortnight's duration is planned. This is being organized as a "Reunion Internationale pour l'étude du Précambrien et des vieilles chaînes." Membership is by invitation and particulars can be obtained from the Local Secretary, Dr. W. J. McCallien, University of Glasgow.

This excursion starts at Glasgow on August 18 and terminates at Edinburgh on September 2. On September 3 and 4 the Geological Society of Edinburgh are celebrating their centenary, under the presidency of Sir J. S. Flett. Details of the meeting may be obtained from the secretary, J. A. Watson, Edinburgh Geological Society, Synod Hall, Edinburgh.

At the close of the meeting, a series of excursions from Huntly as center is being arranged to last from September 12 to 16. The Huntly complex will be studied and visits paid to Elgin, the Portsoy-Banff district and Gamrie. Those interested should communicate with Dr. A. Bremner, 13 Belgrave Terrace, Aberdeen.

THE NATIONAL FISHERIES PLANNING COUNCIL

The Fisheries Survey Bulletin reports that at a meeting called by Commissioner Frank T. Bell, of the U. S. Bureau of Fisheries, on April 23 at St. Louis, at which representatives of the fish and game departments from every section of the country were present, "The National Planning Council of Commercial and Game Fish Commissioners" was formed. The council will coordinate the work in fisheries administration of the various states and the Federal Bureau of Fisheries, thus avoiding much of the duplication of effort which has been prevalent in the past.

In considering plans to perfect a workable program for the country as a whole the states were grouped into five zones as follows: Western Zone—Washington, Oregon, California, Nevada, Montana, Utah, Arizona, Idaho, Wyoming, Colorado and New Mexico; Midwest Zone—North Dakota, Minnesota, Iowa, South Dakota, Nebraska, Kansas, Missouri and Oklahoma; Southern Zone—Texas, Louisiana, Arkansas, Mississippi, Tennessee, Alabama, Georgia, Florida, South Carolina, North Carolina, Virginia and Maryland; North Central Zone—Wisconsin, Illinois, Indiana, Kentucky, Michigan, Ohio and West Virginia, and North Atlantic Zone—Delaware, Pennsylvania, New Jersey, New York, Connecticut, Rhode Island, Massachusetts, New Hampshire, Vermont and Maine.

A chairman was selected for each zone and representatives of the various states in each zone are to meet to discuss their problems at least once in three months with their chairman, or more often if the occasion arises. The Commissioner of the Federal Bureau will then meet with the various zone chairmen at least twice a year.

The *Bulletin* points out that under this system, it is possible for the states having like problems in the fisheries field to coordinate closely their plans and at the same time maintain a harmonious, cooperative program with the Federal Bureau of Fisheries. It

will be possible then to budget the fish stocking program of the zone as well as the country as a whole. The overlapping of fish planting in some sections and the complete lack of stocking in others can thus be avoided, and the regulation of the commercial fisheries can be coordinated.

The council elected the following men as their officers for the ensuing year: *Chairman*, I. T. Quinn, fish and game commissioner of Alabama; *Vice-chairman*, James G. Hammond, fish and game commissioner of Connecticut; *Secretary-Treasurer*, Ted Little, of the U. S. Bureau of Fisheries. Commissioner Frank T. Bell was named honorary chairman. The zone chairmen for the various zones are: Western Zone, M. F. Corrigan, president, Board of Game Commissioners of Oregon; Midwest Zone, W. C. Buford, fish and game commissioner of Missouri; Southern Zone, W. E. McIntyre, chairman of the Board of Fish and Game Commissioners of Alabama; North Central Zone, Fred A. Westerman, in charge fish and fisheries, Department of Conservation, Michigan, and North Atlantic Zone, Major James Brown, commissioner of fish and game, Vermont.

THE RECENT DESTRUCTIVE DUST CLOUD

THE dust cloud which recently swept over nearly half the United States originated largely on overgrazed semi-arid lands and on former cattle range land plowed for wheat near the eastern side of the Rocky Mountains, according to the Forest Service. Drought conditions extending eastward across the Mississippi permitted soil from midwestern states to blow as far as the Atlantic Ocean, darkening the skies over the National Capital and other cities.

Permanent damage to land as well as current damage to crops will result from such dust clouds, says the Forest Service, pointing out that although the dust storm is a new phenomenon to the people in the East, it is becoming increasingly common over wide areas of the Great Plains. For several years reports of wheat crops being blown out of the ground and highway and street traffic becoming snarled in clouds of dust have been coming from those regions, despite the fact that the velocities of winds do not seem to have increased. A statement recently issued by E. A. Sherman, associate forester of the Forest Service, said:

That is the way deserts start. Excessive grazing, which destroys the protective vegetative cover and permits the ground to be trampled into dust, and the plowing up of naturally well sodded grazing lands for grain crops make it easy for the wind to whip away the dry soil and develop into a destructive dust storm. Wind erosion on the plains is like water erosion in states farther east in its power to destroy rich land in a few years

and to transform broad stretches of country into devastated badlands.

Unless more conservative grazing is practised on semi-arid land and unless greater care is exercised in plowing up extensive areas for wheat production in regions subject to drought, desert conditions will begin, and once established, these lands can never be reclaimed.

It is a mistake to cut down or burn up forests or to plow up sods in regions where the elements tend to cause accelerated erosion. Badly managed grazing may be equally destructive of land fertility, and carries with it menace of floods as well as dust storms. Within the last year or two, the country has also had examples of mudflows from overgrazed ranges and from burned-off areas, which cost human lives and heavy property losses. The nation should take warning from the present disastrous dust storm, and adopt measures to avoid future damage.

The Forest Service recommends that serious consideration be given to the preservation of the areas thus threatened. Large areas of range and plowed lands should be revegetated, put back to growing grass. Good management requires that grazing and use of these lands should be regulated to prevent further destruction. In some regions more shelterbelts of trees are practical and desirable. Much more is at stake than the lands already devastated, say the foresters. If steps to revegetate these lands and protect other lands are not taken promptly, vast areas will in a few years be under constant threat of dust storms and distressing droughts.

GOVERNMENT APPOINTMENTS FOR CIVIL ENGINEERING GRADUATES FROM SYRACUSE UNIVERSITY

IN 1929 the Guggenheim Fund for the Promotion of Aeronautics gave a grant of \$60,000 to Syracuse University for the development of work in aerial mapping and surveying in the College of Applied Science.

In addition to a number of publications which have been issued in connection with this work, there has been an increased demand for students who are trained in this branch of engineering.

The department of aerial photographic surveying in the College of Applied Science has recently been asked to furnish several engineers for the extensive aerial survey work now being undertaken by the U. S. Forest Service in Washington. Professor Earl Church has received notification from the director of surveys of the Eastern Department of the Forest Service that sixteen of the civil engineering graduates of the College of Applied Science, who have taken the work in aerial photographic surveying under his direction, have been selected to receive appointments. These include eleven of the men who have been graduated previously to this year and the five members of the present senior class who are now taking this work.