was the recipient of the sixth Holweck Medal of the Société Française de Physique and the Holweck Prize of the Physical Society; the presentation took place on May 15 at the Salons de l'Université à la Sorbonne, Paris, when Sir Thomas delivered the Holweck Discourse on the subject of new methods of making diffraction gratings. Sir George Simpson received the sixth Charles Chree Medal and for his address gave reminiscences of fifty years work in geomagnetism and geophysics. The twenty-eighth Duddell Medal was presented to Dr. A. B. Wood, who gave an account of his work on underwater acoustics, and the seventh Charles Vernon Boys Prize to Dr. J. H. E. Griffiths, who discussed ferro-magnetic resonance.

Details of the activities of the four Groups of the Society, the Colour, Optical, Low Temperature and Acoustics Groups, together with a list of the numerous bodies on which the Society is represented, are given in the annual report. In addition to science meetings, the Low Temperature Group held two major conferences—the Oxford Conference on Low Temperatures, and the Eighth International Congress of Refrigeration, in London. The Acoustics Group took an active part in the establishment of Acustica, and also in the general arrangements of the Acoustics Division of the Building Research Congress held in London during September.

The honorary treasurer again directs attention to the dependence of the financial structure of the Society on the success of the annual exhibition, which, although it had a record attendance and was of high standard, nevertheless resulted in a much smaller financial benefit to the Society than in the previous year. Thus the Society only just paid its way during 1951, and the future outlook depends very largely on the extent to which costs continue to rise. However, with the continued support of its members and with the suggested modifications in the form of subscriptions, it is hoped that the financial position of the Society may be made secure without curtailment of publications or activities.

## MARINE BIOLOGY IN SCOTLAND REPORT FOR 1950-51

THE annual report and collected reprints (Nos. 1 57-87) of the Scottish Marine Biological Association for the year 1950-51\* have recently been published. A study of this volume leaves no doubt that the Association's Millport Laboratory is working most successfully and at very high pressure. The scientific staff now numbers nine (excluding the Director), and their researches cover many fields, including plankton investigations, a re-survey of the fauna of the Clyde Sea Area, the life-history of barnacles, the factors governing barnacle settlement and their relationship with those governing other settling organisms, the operation of fishing trawls, oyster culture and marine algology. Of special interest and importance is the initiation of experiments in underwater television. for which a special grant has been obtained from the development fund of the Association. A new device for measuring the depth at which gear is working in the sea is also being developed. Already this apparatus can be used to a depth of 200 m. with an accuracy of ± 2 per cent in continuous readings on deck.

\* Scottish Marine Biological Association. Collected Reprints, 1951: Nos. 57-87. (Millport: Marine Station, 1952.)

To improve facilities at the Station, a new two-story building with a reinforced concrete seawater storage tank on its roof is being built. The masonry of some extra research rooms, and a new workshop and store are mainly completed. Reconstruction of the aquarium is about to be put in hand. Certain administrative changes have also been made by which the Director of the Station acts also as Secretary to the Council—an arrangement that should bring about increased efficiency and smoother running of the whole establishment.

The Oceanographical Laboratory at Leith now comes under the administration of the Association, a special sub-committee of which has been nominated to advise on matters of scientific policy. The programme of research follows two main lines—plankton recorder surveys and investigations into the relationship between the herring and its environment during the Scottish summer fishery at Fraserburgh. During the year some thirty thousand miles of recorder sampling was carried out, the analysis of which must alone be a huge undertaking.

Until lately the Leith laboratory was administered by Hull University College and its reports published as Hull Bulletins of Marine Ecology. It is intended to continue their publication in the same format but under a suitably modified title such as Bulletins of Marine Ecology.

The Laboratory's present accommodation at Leith and Edinburgh is unsatisfactory and inadequate; but negotiations are now proceeding for the purchase of a property in Edinburgh which, when converted and equipped, will be more suitable.

## COLONIAL DEVELOPMENT AND WELFARE

## DETAILS OF SCHEMES FOR THE YEAR 1951-52

THE schemes detailed in the latest return made under the Colonial Development and Welfare Acts, covering the period April 1, 1951–March 31, 1952\*, bring the total commitments for development and welfare schemes under the Acts to £83,983,947, of which £16,038,184 is for the year in question, and for research schemes to £10,745,100, of which £868,851 is for the year ended March 31,1952. Of this, £373,826 is for agriculture, £136,803 for medicine, £109,804 for social science, £70,575 for tsetse and trypanosomiasis research, £42,778 for insecticides research, £42,045 for fisheries research, £38,050 for locust control and £9,100 for products research. There are no grants for research fellowships, and only £1,420 for economic research.

Of the actual research schemes, the largest are £97,220 for the establishment of the West African Institute of Social and Economic Research, covering capital and recurrent expenditure during July I, 1951-March 31, 1956, £70,600 as supplementary provision for four and a half years for the establishment of a West African Rice Research Station at Rokupr, Sierra Leone, and £95,000 for the establishment of a Veterinary Research Laboratory and ancillary facilities in the Federation of Malaya. Pilot

\*Colonial Development and Welfare Acts. Return of Schemes made under the Colonial Development and Welfare Acts by the Secretary of State for the Colonies with the Concurrence of the Treasury in the period from 1st April, 1951, to 31st March, 1952. (Cmd. 211.) Pp. 44. (London: H.M.S.O., 1952.) 1s. 6d. net.