the late Mr. Frank McClean, F.R.S., offered a large sum of money to the University of Cambridge for the foundation of three studentships, to be named after Sir Isaac Newton, for the promotion of the study of astronomy amongst our younger graduates. By the regulations adopted on the acceptance of this large benefaction by the university, the candidates must be under 25 years of age, and the student chosen at each annual election holds his studentship for three years. The income of the fund now amounts to close on £750, so that the stipend payable to each student suffi-Since the object of the ces for his support. endowment was the promotion of scientific research, the students are prohibited from taking any other paid employment; and a succession of young men have thus been enabled to devote three of the best years of their lives to the untrammelled pursuit of science.

The recent death of Mr. McClean has naturally led us at Cambridge to review the effects which have resulted from his generous gift. The records of the electors to the Isaac Newton studentships, of whom I am the secretary, have fully confirmed the prevision of the founder as to the value of such an endowment of research; for we find on the list of past students the names of Professor Sampson, the editor of Adams's papers and director of Durham Observatory, of Mr. Dyson and Mr. Cowell, chief assistants at Greenwich Observatory, and of Mr. Hough, the chief assistant of the observatory at Cape Town. There are besides other past students who have already made their mark in those branches of physics and astronomy which fall within the scope of the endowment.

Mr. McClean was himself fully competent to estimate the effect of his own foundation, for he had attained to the high distinction of the award of the gold medal of the Royal Astronomical Society, which is open to the astronomers of all nations.

The large benefaction of which I have spoken is, however, by no means all that Mr. McClean has done for Cambridge and for other places. Only last year an anonymous donor, whom we now know to have been Mr.

McClean, gave a considerable sum for the augmentation, during a period of five years of the stipends of two of the most distinguished of our mathematical lecturers. The foundation of the Stokes and Cayley lectureships, by means of this gift, practically makes a substantial, although temporary, augmentation of the mathematical professoriate of the University. I know from the men who have been nominated to these posts how great is the boon conferred on them, since they now have that leisure for which they had previously longed to devote themselves to science. We hope that the example thus afforded may induce other donors to make this endowment a permanent one.

Mr. McClean had, as the guest of Sir David Gill at the Cape of Good Hope, devoted himself to making a spectroscopic catalogue of southern stars, and he marked his visit to the Cape by presenting a fine telescope to that observatory.

Finally, since his death we learn that he has left a large bequest to the University of Cambridge for the adequate equipment of our observatory with spectroscopic appliances, and further that he has bequeathed to the Fitzwilliam Museum his valuable illuminated manuscripts and printed books, the collection of which formed the amusement of his leisure hours.

We residents at the university think we owe it to the memory of our benefactor to acknowledge the great value which we attach to all that this loyal son of Cambridge has done for us, and, at the same time, to record our sense of the great loss suffered by science and the university by his death.

Such magnificent and wise generosity has unfortunately been but too rare in this country. Is it too much to hope that this example may be followed by others whose wealth enables them to do inestimable service to science and letters by enlightened benefactions?

THE ROYAL SOCIETY.

THE Royal Society held its annual meeting on November 30.

The report of the council as summarized in the London Times stated that one of the chief

events of the year had been the second general assembly of the International Association of Academies, which was held at Whitsuntide in the rooms of the Royal Society, directing academy of the association for the past three years. The general assembly was attended by seventy delegates, representative of all the constituent academies of the association. The proceedings were reported at the time in these columns, and it will be remembered that Vienna was chosen by a unanimous vote as the place of meeting of the next general assembly. The next subject was the geodetic survey now in progress in South Africa under the control of Sir David Gill. The subject of the extension of the arc beyond the Zambesi was brought up, at the instance of the Royal Society, at the recent meeting of the association in London, and it was hoped to secure the cooperation of the Egyptian government and that the Imperial German government might consent to become responsible for the portion of the arc which would traverse German East Africa. The Russian representative at the International Association expressed the hope that the arc would be ultimately connected through Syria with the Russian network, and thus extend continuously to Lapland; and, in consequence, it was resolved that diplomatic action be taken with a view to the extension of Struve's arc to Egypt. Dr. W. N. Shaw, F.R.S., attended the congress of the International Scientific Commission of Aerostation. The president and council had accepted the permanent duty of nomination to two posts in the supplementary laboratory and hostel which had been established at Col d'Olen, through the agency of Professor Mosso, as an adjunct to the existing International Laboratory of Physiology near the summit of Monte Rosa, and Dr. Ludwig Mond, F.R.S., had given £400 towards the expense of establishing the laboratory. The Royal Society Catalogue of Scientific Papers was in progress, and the last instalment extended from 1884 to 1900. The whole of the second annual issue of the International Catalogue of Scientific Literature had been published, with the exception of the volumes of Botany and Zoology, which were now being printed. The financial sup-

port given by the different countries was shown in detail, the total amounting to £6,755. With respect to the government grant for scientific investigations, the treasury had approved the addition of the following clause to the regulations for administering the government grant: "The president and council of the Royal Society may in each year set aside out of the reserve fund such sum as they may consider desirable to provide for any expenditure which may be incurred by the Royal Society (including expenditure on printing, clerks' salaries and office expenses) in undertaking, controlling, supervising or advising upon matters which the president and council may, at the request of the government, undertake, control, supervise or advise upon." Under the regulations the council had, on the recommendation of the Government Grant Committee, made grants this year amounting to £3,194 10s. This amount includes a preliminary grant of £500 to the joint permanent eclipse committee to cover the expense of instruments and preparations for observations of the total solar eclipse of 1905. A sum of £500 had been placed at the disposal of the president and council to meet any pressing demands upon the funds which might be made before the next annual meeting of the government grant committee. The investigation of sleeping sickness in Uganda was continued, after Colonel Bruce's return to England, by Dr. Nabarro and Captain Greig, of the Indian Medical Service. The efforts of the observers were now being directed to the attempt to discover a means of eliminating the trypanosomes from the blood and tissues of the infected in the early stages. In the meantime the Royal Society committee had advised the government to adopt such preventive measures as were found practicable for protecting a non-infected area where the carrier fly was found from the incursion of emigrants from the infected areas. There was next given in the report an account of the Discovery Antarctic Expedition, of which the scientific results were now being dealt with in accordance with the scheme agreed upon between the Royal and the Royal Geographical Societies. The two special expert committees were workauthorities engaged in the reduction of the observations of the German and Scottish Antarctic Expeditions, which in part covered the same period of time. It was proposed that the special scientific results of the expedition should be published in a uniform series of volumes similar to the published records of the Challenger Expedition. The subject of Mediterranean fever was referred to the tropical disease committee of the society. At the request of the Colonial Office an advisory board was constituted as a sub-committee of the tropical diseases committee, with Colonel Bruce, F.R.S., as chairman. The president and council had received from the Court of the Goldsmiths' Company a grant of £1,000 'for the purpose of aiding the prosecution of original research work in connection with the character and properties of radium,' accepting the responsibility of the proper application of the grant. In December, 1902, the Lords of the Treasury appointed a committee, under the chairmanship of Sir Herbert Maxwell, F.R.S., M.P., to inquire into and report upon the administration of the parliamentary grant by the Meteorological Council, and to make such recommendations as might seem to them to increase the utility of the grant. The committee reported last May and commented forcibly on the insufficiency of the funds remaining over for progressive meteorological research. They advised that the service should be attached to one of the great government departments, in which case the present council would not be required. They pointed out how savings to the amount of £2,500 a year might be effected. The National Physical Laboratory had continued its work with success during the year, the last of the five for which the original annual grant of £4,000 was made by the Treasury. A memorandum had been sent to the Treasury which recommended (1) that a sum of nearly £30,000 was required for capital expenditure, and (2) that the annual grant should be raised in the course of four years to £10,000; while, with a view to supporting these proposals, a request was made for an official inquiry into the work and organization of the laboratory. The question was

ing as far as possible in concert with the

still under consideration. The donations and subscriptions promised to the laboratory, in most cases for five years, had increased and now reached about £2.000. Work had been begun on the new magnetic observatory at Eskdale Muir, for which a sum of £3,000 was provided in the Treasury estimates for the Other matters dealt with in the report vear. were publications, the government publication grant of £1,000, and the library. The report also contained the Royal Society's statement on scientific education in schools, made last January, which was forwarded to all the universities in the United Kingdom, and to which many sympathetic replies had been received.

SCIENTIFIC NOTES AND NEWS.

PROFESSOR JAMES F. KEMP, head of the Department of Geology of Columbia University, has been elected president of the New York Academy of Sciences.

PROFESSOR C. P. NEILL, who holds the chair of political economy in the Catholic University of America, has been appointed U. S. commissioner of labor to succeed the Hon. Carroll D. Wright, who will hereafter devote his whole time to the presidency of Clark College. Dr. Wright was given a farewell banquet by the Unitarian Club, at Washington, on the evening of December 14.

PROFESSOR WILLET M. HAYS, who holds the chair of agriculture in the University of Minnesota, has been appointed assistant secretary of agriculture.

At the twelfth annual meeting of the Geological Society of Washington, after listening to a paper by Mr. G. K. Gilbert on 'Crescentic gouges on glaciated surfaces,' the following officers were elected for the ensuing year:

President-G. P. Merrill.

Vice-presidents-Waldemar Lindgren, A. H. Brooks.

Secretaries-G. O. Smith, H. Foster Bain.

Treasurer-M. L. Fuller.

Members of the Council—T. W. Vaughan, David White, F. L. Ransome, M. R. Campbell, T. W. Stanton.

Mr. G. K. Gilbert was selected to represent the society as vice-president of the Washington Academy of Sciences.