

regarded as being in rapid motion or vibration. Joule's work settled the controversy in favour of the second alternative, and thereby laid the foundation for the modern theory of heat. With a water-friction apparatus Joule obtained the experimental result that to heat a pound of water through one degree F. requires 772 ft. lb. of mechanical energy. This original apparatus is preserved at the Science Museum, South Kensington, London, S.W.7, and is on special exhibition there until the end of July.

### 1851 Exhibition Senior Studentship Awards

THE Royal Commission for the Exhibition of 1851 has announced the award of senior studentships for 1949 to the following for research work to be carried out at the places stated: Dr. J. W. Craggs (applied mathematics, at the University of Cambridge); Dr. A. J. B. Robertson (physical chemistry, at the Royal Institution of London); Dr. N. Sheppard (physical chemistry, at the University of Cambridge); Miss Janet Watson (geology, at the Imperial College of Science and Technology, London). The awards are of the value of £600-650 a year and are ordinarily tenable for two years.

### Colonial Service: Recent Appointments

THE following appointments in the Colonial Service have been announced: J. J. Lowes, agricultural officer (soil conservation), Nyasaland; E. F. Bradford, geologist, Federation of Malaya; Miss M. N. Massie, veterinary officer, Tanganyika; D. A. Davies, director of East African Meteorological Service, East Africa High Commission; R. N. Champion Jones, agricultural development officer, Nigeria; J. B. Phillips, development officer, Veterinary Department, Nigeria; G. D. Scott, pasture research officer, Tanganyika; C. H. B. Williams (deputy director of agriculture, British Guiana), deputy director of agriculture, Trinidad; J. Wright (senior agricultural officer, Jamaica), deputy director of agriculture, Jamaica; A. Foggie (senior assistant conservator of forests, Gold Coast), conservator of forests, Gold Coast; H. Fraser (senior assistant conservator of forests, Tanganyika), working plans officer, Tanganyika; Dr. J. W. Field (senior medical research officer, Institute of Medical Research, Federation of Malaya), director of the Institute of Medical Research, Federation of Malaya; R. B. Heisch (parasitologist, Kenya), senior pathologist, Kenya; R. W. Crowther (veterinary officer, Cyprus), veterinary research officer, Cyprus; H. T. B. Hall (Government veterinary officer, Fiji), deputy director of agriculture (veterinary services), Jamaica; L. R. Hutson (veterinary officer, Barbados), chief veterinary officer, Leeward Islands; C. W. Wells (veterinary officer, Federation of Malaya), chief veterinary officer, Singapore; D. G. White (senior veterinary officer, Tanganyika), assistant director of veterinary services, Tanganyika; G. F. Cole (senior marine officer, Tanganyika), chief fisheries officer, Lake Victoria Fisheries Service; H. T. Lloyd (assistant agricultural officer, Kenya), agricultural officer, Kenya; E. G. Young (agricultural development officer, Nigeria), agricultural superintendent, Nigeria.

### University of London: Appointments

PROF. ILLIAN M. PENSON has been re-elected vice-chancellor of the University of London for the year 1949-50, and Prof. H. Gordon Jackson, master of Birkbeck College, has been appointed deputy vice-

chancellor. Dr. M. G. Kendall has been appointed to the University chair of statistics tenable at the London School of Economics and Political Science as from October 1; Dr. Christoph von Fürer-Haimendorf to the University readership in anthropology with reference to India tenable at the School of Oriental and African Studies as from October 1.

The title of emeritus professor in the University has been conferred on the following: Prof. W. T. Gordon, professor of geology at King's College since 1920; Prof. F. L. Hopwood, professor of physics at St. Bartholomew's Hospital Medical College since 1924; and Prof. Doris L. Mackinnon, professor of zoology at King's College since 1927.

The degree of D.Sc. has been conferred on C. J. Eliezer (an external student).

### International Meeting for Optics

AN international meeting for optical science is being organised to be held in London during July 17-26, 1950, in connexion with the official sessions of the International Optical Commission. The programme will include papers and lectures on optical subjects, an exhibition of optical apparatus and instruments, and visits to various laboratories and industrial firms. The organising committee (appointed by the optical sub-committee of the National Committee for Physics with the approval of the Council of the Royal Society) is acting under the chairmanship of Prof. R. W. Ditchburn, with Prof. L. C. Martin, of the Imperial College of Science and Technology, as honorary secretary, and Mr. A. J. Philpot, director of the British Scientific Instrument Research Association, as treasurer. Further particulars will be announced in due course.

### Announcements

PROF. H. U. SVERDRUP and Prof. Hans Pettersson have been elected honorary members of the Marine Biological Association of the United Kingdom.

SIR ALFRED EGERTON, head of the Department of Chemical Engineering and Applied Chemistry at the Imperial College of Science and Technology, London, has been appointed director of the Salters' Institute of Industrial Chemistry, in succession to the late Sir Robert Robertson.

THE British Rheologists' Club is holding, jointly with the Midland Chemists, a conference on "The Rheology of Thickened Liquids" in the University of Birmingham during July 15-16. The chairman for the first day will be Prof. F. H. Garner, and for the second day, Dr. A. H. Nissan. Applications for attendance should be addressed to Mr. R. B. Shearn, Chemical Engineering Department, University, Edgbaston, Birmingham 15.

At a special meeting of the Council of the Association of University Teachers of Scotland, held in Edinburgh on June 18, final arrangements were made for the affiliation of this Association with the Association of University Teachers of England, Wales and Northern Ireland. The Scottish group retains its own constitution within the wider framework.

A NOTICE appeared in *Nature* of June 11, p. 895, of "The Failure of Metals by Fatigue", published by the Melbourne University Press; we are informed that this book is available in Great Britain from the Cambridge University Press, which acts as agent for all publications of the Melbourne University Press.