## NEW FELLOWS OF THE ROYAL SOCIETY

- A T a meeting of the Royal Society on March 21, the following were elected to fellowship of the Society:
- Dr. J. B. Adams, director of the Culham Laboratory of the U.K. Atomic Energy Authority, Abingdon, distinguished for his contributions to the design and construction of the 25-GeV proton-synchrotron at the European Centre for Nuclear Research, Geneva.
- SIR ERIC ASHBY, Master of Clare College, Cambridge, distinguished for his outstanding services to the advancement of science and for his contributions to botany.
- Prof. H. N. Barber, professor of botany in the University of Tasmania, Hobart, distinguished for his work in experimental cytology, population genetics and the genetics of flowering.
- Prof. E. H. S. Burhop, professor of physics in University College, London, and at present at the Accelerator Division, CERN, Geneva, distinguished for his contributions to experimental and theoretical atomic and nuclear physics, particularly to the Auger effect and atomic collision processes.
- PROF. H. G. CALLAN, professor of natural history in the University of St. Andrews, distinguished for his researches in the field of cytogenetics and for his analysis of the synthetic functions of chromosomes.
- Dr. J. W. S. Cassels, Caley lecturer in mathematics in the University of Cambridge, distinguished for his contributions to the theory of numbers and in particular to Diophantine approximation and the arithmetic of curves of genus one.
- Prof. T. N. George, professor of geology in the University of Glasgow, distinguished for his researches on the stratigraphy and palæontology of the Lower Carboniferous and the application of palæontology to the theory of evolution.
- PROF. J. L. GOWANS, Henry Dale research professor of the Royal Society, Sir William Dunn School of Pathology, Oxford, distinguished for his elucidation of the life-history and physiological function of the lymphocyte.
- Dr. P. B. Hirsch, lecturer in physics in the University of Cambridge, distinguished for his researches with the electron microscope on imperfections in the crystalline structure of metals and on the relation between structure defects and mechanical properties.
- Dr. J. H. HUMPHREY, head of the Division of Immunology in the National Institute for Medical Research, London, and deputy director of the Institute, distinguished for his immunological researches, in particular on the synthesis of antibody and the mechanisms of hypersensitivity.
- PROF. P. L. Krohn, professor of endocrinology in the University of Birmingham, Department of Anatomy, distinguished for his researches on the transplantation of endocrine glands, particularly in its bearing on the ageing process.
- Dr. D. Küchemann, deputy chief scientific officer, Royal Aircraft Establishment, Farnborough, distinguished for his theoretical and experimental work in aerodynamics, particularly in studies of wing-forms for supersonic flight.
- Dr. M. S. Longuet-Higgins, senior principal scientific officer, National Institute of Oceanography, Wormley,

- Surrey, distinguished for his contributions to physical oceanography and especially for his investigations into ocean waves.
- Dr. J. F. Louter, director, Radiobiological Research Unit, Medical Research Council, Harwell, distinguished for his work in radiobiology, and particularly for his interpretation of recovery from radiation injury.
- Dr. J. W. G. Lund, senior principal scientific officer, Freshwater Biological Association, Ambleside, Westmorland, distinguished for his work on freshwater biology, particularly on the taxonomy and ecology of algae.
- DR. SHEINA MACALISTER MARSHALL, principal scientific officer, Scottish Marine Biological Association, Marine Station, Millport, Isle of Cumbrae, distinguished for her researches on the productivity of the sea and on the bionomics of marine planktonic organisms.
- PROF. P. T. MATTHEWS, professor of theoretical physics in the Imperial College of Science and Technology, London, distinguished for his contributions to quantum field theory and the theory of elementary particles.
- Dr. B. Y. MILLS, senior principal research officer, Division of Radiophysics, Commonwealth Scientific and Industrial Research Organization, Sydney, Australia, distinguished for his contributions to radio astronomy and especially for the development of a novel form of high-resolution radio telescope.
- Dr. C. G. Phillips, Fellow of Trinity College and reader in neurophysiology in the University of Oxford, distinguished for his work on the physiology of the central nervous system, in particular on the control of muscular movement.
- Dr. J. A. F. Roberts, director, Clinical Genetics Research Unit, Medical Research Council, Hospital for Sick Children, London, W.C.1, distinguished for his researches into human heredity, particularly in relation to mental ability.
- Dr. L. Rotherham, Board member for Research and Development, Central Electricity Generating Board, London, distinguished for his work on the manufacture of new metals and for his contributions to research associated with the development of the generation of nuclear power.
- Dr. T. S. Stevens, reader in organic chemistry in the University of Sheffield, distinguished for his original researches in organic chemistry, particularly for his work on the mechanism of molecular rearrangements.
- Dr. T. M. Sugden, reader in physical chemistry in the University of Cambridge, distinguished for his work on the detection and identification of transient species, radicals, ions and electrons, in flames and on the reaction mechanisms involved.
- Dr. D. Tabor, lecturer in physics in the University of Cambridge and deputy director of the Research Laboratory for the Physics and Chemistry of Solids, Cavendish Laboratory. Distinguished for his original work on the physical and mechanical properties of solids.
- Prof. A. J. C. Wilson, professor of physics in the University College of South Wales and Monmouthshire, Cardiff, distinguished for his contributions to X-ray analysis in the elucidation of the atomic structure of crystals.