prepared to help others whenever possible. His inventive skill applied to the improvement of laboratory techniques and apparatus was invaluable and possibly irreplaceable. A safety pipetting device he designed to eliminate the hazard of aerosol production during pipetting operations has been in use throughout the Microbiological Research Establishment for the past ten years and no doubt has contributed to the excellent safety record of the Establishment. Mr. Bacon's main interests outside his work were in his family, his new home and large garden and in the theatre. The Salisbury Theatre Club and the Porton Musical and Dramatic Society have lost an ardent supporter, and the social life of the village of Whiteparish and of the Microbiological Research Establishment are the poorer by the death of Geoff. Bacon. Our sympathy is extended to Mrs. Mary Bacon and to his daughters Elizabeth and Susan. T. W. BURROWS

NEWS and VIEWS

U.S. National Academy of Sciences:

Foreign Associates

THE following have been elected foreign associates of the U.S. National Academy of Sciences: Prof. E. Amaldi, professor of experimental physics, University of Rome; Dr. F. Lynen, director of the Max-Planck-Institut für Zellchemic, Munich; Sir William Penney, deputy chairman, U.K. Atomic Energy Authority; Prof. R. N. Robertson, professor of botany, University of Adelaide.

The Second Swinburne Award in Plastics:

Dr. J. C. Swallow

DR. JOHN CUTHBERT SWALLOW has been awarded the second Swinburne Medal by the Council of the Plastics Institute for his contribution to the discovery and development of polythene. Dr. Swallow was educated at the Universities of London and Leyden. He joined Brunner Mond as a research chemist in 1924 and was in charge of polythene development work from the discovery to the building of the plant. He became research manager of Alkali Division of Imperial Chemical Industries Ltd. in 1941 and was appointed research director of the Plastics Division in 1942. Dr. Swallow became managing director of the Plastics Division in 1951 and he has been chairman since 1952. Dr. Swallow will deliver the Swinburne Award Address at the Royal Institution, 21 Albemarle Street, London, W.1, on November 12, when he will also be presented with the gold medal and the sum of money which accompanies the award. The award, which has been endowed by Bakelite Ltd., was instituted in 1959 to commemorate Sir James Swinburne, who died at the age of 100 in the previous year. The trust deed specifies the following terms of reference for the award: ". . . to promote the advancement and diffusion of (a) the science and technology of plastics and of plastics engineering, and (b) science and technology in any field relating to plastics or to plastics engineering . . . by making the award . . . to persons who shall have made an outstanding contri-bution to such science or technology". The first award was made to Prof. G. Gee in July 1960.

Harry Govier Seeley

MANY interesting papers have appeared in the Bulletin of the British Museum (Natural History) and not least is one on "Harry Govier Seeley and the Karroo Reptiles" by Dr. W. E. Swinton (3, No. 1. Pp. 1-39. London: British Museum (Natural History), 1962. 13s.) The account of the life and activities of Seeley is an indication of the enormous energy and output of this remarkable man. But Dr. Swinton was especially fortunate in obtaining permission to

publish a series of characteristic letters that Seeley wrote when he was in Africa. They constitute a record of great historical and geological interest and throw much light on some of the fundamental fossils in the story of reptilian and mammalian evolution. In addition there are interesting glimpses of life in South Africa in the latter part of the past century. The paper also contains reproductions of some of the anatomical sketches by Seeley. Dr. Swinton was the obvious author for such a historical skotch and it was fortunate that he was able to complete the work before he went to Canada.

The Panchromatograph

A NEW instrument for use in research and chemical analysis, the panchromatograph made by W. G. Pve and Co., Ltd., Cambridge, separates a mixture of liquids or gases into their component parts and gives a measure of the concentration of each. The basis of operation of the panchromatograph is that a sample is fed into a column packed with special material and carried through in the stream of inert gas. Separation is achieved so that the component parts of the sample emorge at intervals and are measured by a variety of detecting and recording systems. The analyser unit is the result of extensive study of modern chromatographic requirements and has been designed to accommodate new advances of technology as they occur. It is applicable to all analytical problems. Columns and detectors are housed in separate ovens. both temperature-controlled to precise limits by electronic proportional counters. The column oven is $42.5 \times 28 \times 16$ cm and is of low thermal inertia construction. A wide variety of columns can be accommodated. The choice of column size and length is governed by the resolving power required by a given sample. For the majority of applications 1.5 metre or 2.7 metre long, 4 mm diameter, glass columns are recommended. Metal columns in lengths ranging from 0.3 to 6 m are also available. The column units may be rapidly exchanged. The detector oven is $23 \times 23 \times 16$ cm and accommodates flame ionization, micro-argon ionization, macro-argon ionization, electron capture, photoionization, cross-section ionization. hot wire gas density and thermal conductivity detectors, together with the experimental triode ionization and electron mobility detectors. An important feature is that any two detectors can be accommodated, allowing simultaneous use.

The panchromatograph has applications in many fields, including medical research, petroleum refining, drug manufacture and food processing. Separate pamphlets, obtainable from W. G. Pye and Co., Ltd., York Street, Cambridge, give details of the various accessories and the numerous applications.