

ticular importance is one by Sir John Eccles, which summarizes some of the work for which he was awarded a share in the 1963 Nobel Prize for Medicine. Later articles describe research into the mechanism of action of various centrally acting drugs such as tranquillizers, analgesics, anti-depressants and strychnine-like compounds. Volume 9 describes the proceedings of two short symposia. The first, *Bradykinin and Vasodilating Polypeptides*, edited by M. Rocha E. Silva, of São Paulo, and U. S. von Euler, of Stockholm, consists of nine articles dealing with the structure, synthesis, pharmacological actions and possible functions of kinins. The second, *Pharmacology of the Lung*, edited by D. M. Aviado, of Philadelphia, contains six articles dealing with the action of drugs on the lung and its blood vessels. Volume 10 consists of abstracts of the 595 lectures and communications given by members of the conference.

It is now more than two years since the first International Meeting was held, but, although no longer quite the last word on the various subjects, the information contained in these volumes is not as out of date as it might have been since, at the time of the meeting, much of the work described by the authors had not been published elsewhere. The books are nicely bound and printed on good quality paper; the figures are clearly reproduced. The volumes should be of great interest, not only to research pharmacologists but also to research workers in related disciplines. They would form a valuable addition to any library catering for biological scientists. However, at the high price of £5 per volume, the biggest of which is Volume 7 with 387 pages and the smallest Volume 4 with 184 pages, the series will probably be considered less than value for money by most individual scientists. Volume 10, which contains the abstracts of communications, differs in size of format from the rest; although possibly desirable to complete a library set, it is merely an expensive duplication of the conference issue of a scientific journal (*Biochemical Pharmacology*, 8, No. 1; 1961) which contains the same information.

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PHYTOPHARMACY

Veertiende International Symposium over Fytofarmacie en Fytiatrie, 8 Mei 1962

(Overdruk uit de Mededelingen van de Landbouwhogeschool en de Opzoekingsstations van de Staat te Gent, 1962, Deel XXVII, No. 3.) Pp. x+671-1370. (Gent: Rijkslandbouwhogeschool, 1962.) n.p.

PHARMACY is concerned with drugs and diagnostic agents used in the treatment of human diseases. Phytopharmacy deals with the use of drugs and chemicals in the control of diseases in plants; a group of investigations which must also include a detailed knowledge of disease-producing organisms, their methods of infection as well as of the normal life-history of the plant and its nutritional or environmental requirements.

The proceedings of the fourteenth International Symposium of Phytopharmacy and Phytiatry, held in Gent, Belgium, in May 1962, have been published by the Rijkslandbouwhogeschool and indicate the range of these investigations. The great majority of commercial crops are considered, including beetroot, celery, the cereals, chicory, lucerne, melons, paprika, potatoes, raspberries, strawberries, sugar-beet, tobacco, tomato, vines, also fruit trees, roses and sylviculture.

The main themes of the Symposium were plant diseases (15 papers); disease transmission, soils and fertilizers (10 papers); problems of crop treatment and the evaluation of the efficiency of pharmaceutical formulation of sprays or washes (10 papers); the quantitative determination of residual insecticides or other agents on crops, also resistance of infecting organisms to insecticides (8 papers). The largest number of papers (more than 20)

was devoted to the nature, uses and efficiency of new and of widely used compounds; some of these are recorded by their chemical or trivial names while others are described by their trade names: they include afalon, aresin, 6-azauracil, brestan, chloro-nitrobenzotriles, chloro-phenyl-methoxymethylureas, dithio-carbamates, DNOC, DDT, ekatin, ferbam, organic mercurials, ortho-phaltan, phenylthiourea, reglone, telodrin, terracur, triazine, tri-P.E., vamidothion, zoom and zinc metirame.

The 67 research papers were read by authors from some ten countries; Belgium and the Netherlands being represented by at least 27 papers, German authors presented eight papers, while France, Great Britain, Switzerland, the United States, Canada and Poland were also represented. The papers appear to have received little or no editing, fifteen of them give no indication of country or laboratory of origin, some are without lists of references and many are devoid of either summary or conclusions. Papers are written in Flemish or Dutch (23 papers), French, German or English. Only twelve contain summaries in these four languages, four have summaries in three languages and eight give a summary in one language other than that in which the paper is written. The English reader has thus some difficulty in following a number of the papers, but to appreciate this contribution to our knowledge of phytopharmacy, the effort is well worth while.

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CANCER PROGRESS

Cancer Progress Volume 1963

Edited by Ronald W. Raven. Pp. xiii+254. (London: Butterworth and Co. (Publishers), Ltd., 1963.) 60s.

IN his introduction, Mr. R. W. Raven suggests that each new volume of *Cancer Progress* should be a milestone on the road to the ultimate goal of cancer control. This volume coming three years after *Cancer Progress 1960* (*Nature*, 192, 298; 1961) is devoted partly to the experimental and epidemiological facets of cancer and partly to the more chemical aspects of diagnosis and attempted therapy.

The first fifty-five pages contain a factual review of some of the 700 or so references to tumour virology which appeared between mid-1959 and December 1961 (R. J. C. Harris). Other authors, whose subjects are not so extensive, include 1962 literature. Chemical carcinogenesis is represented by a succinct account of the pathological and biochemical properties of the dialkylnitrosamines (P. N. Magee). The suggestion that this potent group of carcinogens may act through their *in vivo* conversion to diazoalkanes should serve as a warning to those chemists who use diazomethane and similar chemicals.

The papers on the epidemiology of cancer are fascinating reading. The necessity for unequivocal information on the geographical distribution of cancer in elucidating environmental hazards is stressed (J. Higginson). The effect of atmospheric pollution on the incidence of lung cancer and of the composition of the soil on stomach cancer (G. Wynne Griffith) show the importance of the careful evaluation of morbidity statistics in initiating new experimental approaches, whereas the description of the climate-dependent children's lymphoma in Africa (D. Burkitt) illustrates how much may be done by experienced investigators in parts of the world which lack an extensive medical service.

The sections on diagnosis, clinical aspects, radiotherapy and chemotherapy show how closely united the men of medicine and the men of science have become in the fight against cancer. Attempts to use the cytophotometer to measure the nucleic acid content of normal and cancer cells has, so far, had only limited success in diagnosis (C. C. Spencer and E. M. Nadel). Similarly, attempts to determine the number of circulating cancer cells in