

Book review

M.G. Ford, D.W. Hollomon, B.P.S. Khambay & R.M. Sawicki (Eds), 1987. Combating resistance to xenobiotics. Biological and chemical approaches. ISSN 0930-3367, Ellis Horwood Ltd., Chichester, England. 320 pp. Price £ 61. Also available as: ISBN 0-89573-601-2 (VCH, New York) and ISBN 3-527-26606-2 (VCH, Weinheim).

This book is a volume of the Ellis Horwood Series in Biomedicine and contains proceedings of a conference held at Southampton University in July 1986. The aim of the conference was to discuss the contribution fundamental studies can make to understanding pesticide resistance, and to review how this fundamental knowledge can be utilized in the search for ways to overcome the problem. The conference provided an all too rare opportunity to bring together experts from many disciplines and so linked themes of work on resistance to insecticides, fungicides, herbicides and veterinary products. The published proceedings maintain this interdisciplinary approach. The chapters concentrate on resistance in the field and on strategies to cope with development of resistance. Fundamental support for such strategies is given in separate chapters on genetics of resistance, biochemical mechanisms of resistance and chemical ways of coping with resistance.

The book is of high quality and offers detailed information on general aspects of resistance to xenobiotics. This information will be especially helpful to readers who already have insight into resistance in specific fields and want to be introduced to related areas. They will learn that the principles of resistance to various xenobiotics and management of resistance to different types of pesticides have much in common. The case studies in the book on actual resistance in practice are well treated, but are not uniform and not consistently devoted to the different classes of xenobiotics. Most attention is paid to insecticides in chapters on resistance in three insect pests. Field cases on fungicide resistance are only generally mentioned in a chapter on 'Epidemiology of fungicide resistance'. The chapter on herbicide resistance is exceptional for the book, since it is the only one designed as a research paper.

The book is recommended literature for scientists and students who want to deepen their insight into fundamental or practical aspects of resistance to xenobiotics. It would appear that resistance is not necessarily an intractable problem and that sensible use of existing pesticides may provide means to counteract its spread.

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