

# Second SCI-RSC Medicinal Chemistry Symposium

Edited by J. C. Emmett

There are many new and developing areas in the subject of medicinal chemistry. This book will provide not only interesting reading but also food for thought for those involved in active research.

## Contents:

### **Mediator Regulation in Cardiovascular Drug Therapy:**

Chemical Pharmacology of Calcium Antagonists;  $\alpha$ -Adrenoceptor Modulation; Structure-Activity Studies with Angiotensin Converting Enzyme Inhibitors Related to Enalapril and MK-521; Phosphodiesterase Inhibitors as Cardiotoxic Agents; The Cardiac Bipyridines – A New Chemical Entity with Distinct Positive Inotropic and Vasodilatory Activity;

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The Use of Interactive Computer Graphics in the Study of Molecular Structure and Intermolecular Interactions; Systematic Search of Conformational Space: Use and Visualisation; The Use of Molecular Graphics in the Design of Enzyme Inhibitors; The Design of Triazole Fungicides;

### **Biological Challenges to Organic Synthesis:**

The Anthracycline Antibiotics: Some Synthetic Endeavors; Natural Product Synthesis *via* Allylcarboxyliron Lactone Complexes; The "Chemist's Enzymes" as Templates for the Synthesis of Biologically Active Molecules;

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Manipulation of the Arachidonic Acid Cascade; Chemical Studies on Slow Reacting Substances/Leukotrienes; The Role of Arachidonic Acid Products in the Respiratory System; Peptidoleukotriene Agonists and Antagonists; The Design of Selective Thromboxane Synthetase Inhibitors; Agonists, Analogues, and Modulators of Arachidonic Acid Cascade as Therapeutic Agents; Synthesis of Some 13-Azaprostanooids and Their Actions as Thromboxane Receptors;

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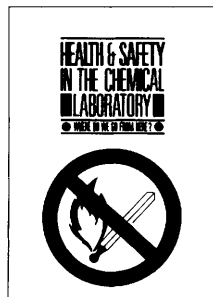
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The System in the United States of America;  
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Managing People;  
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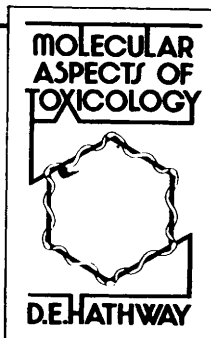
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# Molecular Aspects of Toxicology

By D. E. Hathway

Toxicology covers a wide field, which comprises chemical toxicology, cosmetics toxicology, environmental toxicology, food and drugs toxicology, industrial toxicology, pesticide toxicology, and the toxicology of atmospheric pollution, and which involves acute and long-term testing as well as special tests for carcinogenicity, irritation, mutagenicity and teratogenicity. In the testing phases, diagnoses are reached through the disciplines of chemical pathology, clinical medicine and pathology, and in the experimental one, explanation is sought through chemical/biochemical and pharmacological methods.

In such a fragmented field as toxicology with so many diverse practices and specialisms, it is hard to gain an idea of continuity.

This book attempts to unify the subject of toxicology and should be useful to chemists engaged in molecular biology and workers concerned with toxicology and cancer research in particular, as well as to pharmacologists and specialists in drug development and occupational hygiene and medicine in general.

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Assessment of Toxic Risk; Structure-Activity Considerations; Measurement of a Carcinogenic Exposure;

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### **Part III Metabolism**

Metabolic Pathways for Industrial Chemicals and Pesticides; Kinetic Considerations;

### **Part IV Pharmacogenetics**

Species Differences in Metabolism and Toxicity;

### **Part V Biochemical Lesions**

Mode of Action Studies;

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