

Foreword

The Scientific Committee on Problems of the Environment (SCOPE) was established by the International Council of Scientific Unions (ICSU) in 1969 to advance knowledge of the influence of the human race upon its environment, as well as the effects of those alterations upon human health and welfare. It was intended to give particular attention to those effects which are either global or shared in common by several nations. It serves as a non-governmental, interdisciplinary and international council of scientists, and as a source of advice for governments and inter-governmental agencies with respect to environmental problems.

SCOPE seeks to synthesize environmental information from diverse scientific fields, identifying knowledge gaps, and disseminating the results. During the last several years, the main emphasis has been on the following topics:

1. Biogeochemical cycles;
2. Dynamic changes and evolution of ecosystems;
3. Environmental aspects of human settlements;
4. Ecotoxicology;
5. Simulation modelling of environmental systems;
6. Environmental monitoring;
7. Communication of environmental information and societal assessment and response.

A number of publications have resulted, including *SCOPE 10: Environmental Issues*, which provides an overview of the environmental challenges of the next decade.

One result of SCOPE's activities in ecotoxicology is the publication of this report which gives a general overview of the subject, addresses the apparent difficulties in assessing dose-effect relationships of sublethal exposure to chemicals, and stresses the point at which research may provide better understanding of the processes involved. That research, however, requires international cooperation in order to ensure the comparability of data and the acceptance of test methods. Only with such assistance will international coordination and harmonization of regulations controlling the release of chemicals into the environment be possible. Too often, well-intentioned steps to cope with new chemicals are based upon incomplete and inconsistent information.

SCOPE expects to play an active role in ecotoxicology by promoting the establishment of an international forum of scientists which would seek to improve the scientific basis of test methods used. Such a new group would act as an

international focal point for scientists concerned with the toxic effects of chemicals on ecosystems.

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