

Preface

Natural products chemistry primarily involves research on organic compounds produced by plants, animals, and microorganisms, and focuses not only on the determination of chemical structures and biosynthesis, but also on chemical synthesis and the development of stereoselective chemical reactions. In recent years, developments have spread to the field of molecular biology in particular, as indicated by the investigation of the relationship between the structure and activity of biologically active substances, in addition to the elucidation of the mechanisms of biological effects at the molecular level. These achievements have facilitated corresponding progress in other related sciences, and have contributed significantly to developments in pharmaceutical, agrochemical, and other industries. Meanwhile, the science of biodiversity focuses on objectives such as the search for active ingredients in organisms and the preservation of species and diversity, from a scientific perspective. These two fields are closely related in their respective focuses on the diversity of organisms and the diversity of metabolic products, and it is for this reason that the respective conferences on biodiversity and natural products chemistry have come to be merged, starting with the preceding event in the series, held in India. I believe that this joint approach is highly beneficial, and sincerely hope that this conference has provided opportunities for exchange of a diverse range of information between the respective researchers and has contributed to further global development of these fields.

This conference was held at the Kyoto International Conference Hall on 23–28 July 2006, and was officially sponsored by IUPAC and hosted by the Science Council of Japan jointly with the Chemical Society of Japan, the Pharmaceutical Society of Japan, and the Japan Society for Bioscience, Biotechnology, and Agrochemistry. In addition to 17 plenary speakers, lectures were also delivered by 77 invitees of various generations, and 580 posters were presented, primarily by younger delegates, of which 72 were supplemented by oral presentations. In order to broadly examine various topics relating to each aspect of the field of natural products chemistry, discussions were conducted by classifying this diverse field into the following eight themes, thereby promoting interactions between researchers and cooperation between related fields.

- Isolation and Structure Elucidation of Natural Products
- Synthesis of Natural Products and their Models
- Biosynthesis and Genetic Engineering on Natural Products
- Spectroscopy in Natural Products Chemistry
- Molecular Mode of Action on Natural Products and Drugs
- Chemical Biology and Related Areas
- Chemistry and Biochemistry Related to Biodiversity
- Drug Diversity and Developments

Approximately 1200 participants from 31 countries and regions attended this conference, and exhibits from a total of 26 companies were presented in the concurrently held exhibition. In addition, pre- and post-symposia were held in Nagoya, Tokushima, Sapporo, Sendai, Fukuoka, and Tokyo, and the 48th Symposium of a regular series on the Chemistry of Natural Products (in Sendai) also took advantage of the opportunity to promote more diverse and closer interactions.

I would like to express my deepest gratitude to the aforementioned hosts, co-hosts, and many other organizations and individuals for their support, without which this conference would not have been possible. Finally, it is my sincere hope that this conference has provided opportunities for the future advancement of natural products chemistry and biodiversity science.

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Chairman, Organizing Committee