

# OKAZAKI CONFERENCE

## Okazaki COE Conference

### Reactions in Aqueous Media

(October 2–3, 2001)

#### Organizing members:

**UOZUMI, Yasuhiro (Chairperson); WATANABE, Yoshihito; HIRATA, Fumio**

The International Center of Excellence (COE) Symposium of Institute Molecular Science (IMS) of the 2001 fiscal year was held on October 2 and 3, 2001 at Okazaki Conference Center. This symposium was organized by 3 members of IMS.

The objective of this COE symposium was to overview the frontier of chemical reactions in water from viewpoints of synthetic organic, bioorganic, theoretical chemistry. The symposium also emphasized recent major developments in the fields of process chemistry, green chemistry, spectroscopic study, and the various related fields in aqueous media.

Since development of water-based chemical transformations is rapidly becoming an of importance area of chemistry, this COE symposium was very timely and successful. Fourteen topics were given by invited speakers including 5 leading scientists from abroad. The titles of invited papers are as follows: *Designing New Recoverable/Reusable Catalysts Using Polymer Supports* [Prof. David E. Bergbreiter (Texas A & M University)]; *Structure and Dynamics of Phenol/Naphthol Aqueous Cluster Studied by Laser Spectroscopy* [Prof. Masaaki Fujii (IMS)]; *Chemical Transformations within Aqueous Coordination Nanocages* [Prof. Makoto Fujita (Nagoya University)]; *Dynamics, Pathways, and Tunneling in Enzymatic Reactions* [Prof. Jiali Gao (University of Minnesota)]; *Molecular Theory for Solvent Effect on Organic Reactions in Aqueous Environment* [Prof. Fumio Hirata (IMS)]; *New Dimensions of Organic Transformations in Water* [Prof. Shu Kobayashi (Tokyo University)]; *Developing catalytic reactions in air and water* [Prof. Chao-Jun Li (Tulane University)]; *pH-Dependent Activation Cycle of Dihydrogen* [Prof. Seiji Ogo (IMS)]; *Transition Metal-Catalyzed Enantioselective Reactions in Water Using Water-Soluble Chiral Ligands Derived from Natural Sugars* [Prof. Kouichi Ohe (Kyoto University)]; *Water Dynamics; Fluctuations and Reactions* [Prof. Iwao Ohmine (Nagoya University)]; *Radical Reaction in Water* [Prof. Koichiro Oshima (Kyoto University)]; *Catalytic Functionalization of Methane in Aqueous Solution* [Prof. Georg Suess-Fink (Institute de Chimie, Universite de Neuchatel)]; *Palladium Catalysis in Water* [Prof. Yasuhiro Uozumi (IMS)]; *Molecular Clusters as Probes of Solvent Effects: The influence of water on the conformational preferences of flexible molecules* [Prof. Timothy S. Zwier (Purdue University)].