

The 4th International Symposium on Macro- and Supramolecular Architectures and Materials: Synthesis, Properties and Applications (MAM-08), sponsored by the International Union of Pure Applied Chemistry (IUPAC) and German Research Foundation (DFG), was organized by Prof. Dr. Helmut Ritter et al. and held at the Heinrich-Heine University Düsseldorf from September 7 – 11, 2008.

This symposium followed directly the legendary conference MAM-06 in 2006, held in Tokyo, Japan, and continued the series of symposia MAM-04, in Montana, USA and MAM-01 in Gwangju, South-Korea. The aim of the congress was to bring together scientists from over the world to present scientific and technological findings related to the areas of polymer chemistry (macromolecular) and extended molecular networks (supramolecular). By gathering engineers, material scientists as well as inorganic, organic and physical chemists would offer a diversified view on the fascinating and versatile issues of science.

The MAM-08 symposium involved 282 presentations by more than 300 participants from all over globe. Throughout the conference were presented 11 plenary, 45 invited, 65 contributed lectures in three parallel sessions and 161 posters. More than 40% of the participants were young PhD students.

One of the plenary lectures was given by Prof. Dr. J.-M. Lehn (Nobel Laureate of Chemistry 1987) on the general topic: “Dynamats: Dynamic Molecular and Supramolecular Materials” and another by Prof. Dr. R. Huber (Nobel Laureate of Chemistry 1988) on “Architecture, Structure and Function of Molecular Machines for Protein Degradation”.

More invited lectures were given, e.g., by Prof. Dr. K. Müllen, MPI-P Mainz “Macromolecules, Assemblies, Particles - A Discovery Journey in Materials Synthesis”;

Prof. Dr. A. Harada, Graduate School of Science, Osaka University, “Dynamic Behavior of Cyclodextrin-Based Supramolecules”; Prof. Dr. G. Wenz, Saarland University, “Design, Properties and Potential Applications of Cyclodextrin Polyrotaxanes”; Prof. Dr. R. Mülhaupt, Freiburg Institute for Advanced Studies, “Isotactic Polystyrene and Novel Crystalline Styrene Block Copolymers”; Prof. Dr. A. Greiner, Philipps-University Marburg, “Novel Nanofiber-Based Nonwovens For New Applications Based on Electrospinning of Polymers - Functionality, Reproducibility and Productivity”; Prof. Dr. M. Rehahn, Darmstadt University of Technology, “Metal-Containing Block Copolymers via Living Anionic Polymerization: Drawbacks and Opportunities of Silaferrocenophane and Vinylferrocene”; Prof. Dr. C. Barner-Kowollik, University Karlsruhe, “The Raft Hetero Diels-Alder Concept: Expanding the Conjugation Tool Box”; Prof. Dr. T. J. J. Müller, Heinrich-Heine-University Düsseldorf, “Oligophenothiazines -Synthesis, Electrochemical and Fluorescence Properties of Nanoscale Molecules”; Prof. Dr. B. Voit, Leibniz Institute of Polymer Research Dresden, “Functional and Nanostructured Polymers by Combining Controlled Radical Polymerization and Click Chemistry”.

The topics of contributed lectures and posters were related to polymer chemistry and physics, polymer thermodynamics, nanostructured materials, biodegradable materials, polymer membranes, polymer composites, self-organizing materials, polymers in optic and electronic, ionic liquid and polymers in dental. New catalysts and catalytic polymerization processes were also included.

Awards for the three best outstanding poster presentations were granted, sponsored by IUPAC and “Wiley-VCH” Publisher. The winners were: J.H. Lee, T.S. Lee

(Korea); T. Friedrich, B. Tieke (Germany) and H. Yabu, T. Higuchi, A. Tajima, K. Motoyoshi, M. Shimomura (Japan).

Special thanks go to following companies for their financial support: Deutsche Forschungsgemeinschaft DFG, Bonn; Lohmann & Rauscher GmbH & Co. KG, Neuwied; Dentsply DeTray GmbH, Konstanz; Ivoclar Vivadent AG, Schaan/Liechtenstein; Evonik Degussa GmbH, Essen; Axel Semrau GmbH & Co. KG,

Sprockhövel; Clariant Produkte (Deutschland) GmbH, Frankfurt/Main; CEM GmbH, Kamp-Lintfort.

At least, we thank the members of the International Advisory Committee and Organizing Committee for helping us to establish a scientific and social program of high quality.

*Helmut Ritter
Kurt E. Geckeler*