

WEDNESDAY ORAL PRESENTATIONS

June 29, 2011

8:30 AM - 9:50 AM SESSION J: Plenary Green Auditorium

* Invited paper

SESSION J5: Plenary V
Chair: Anil Patri
Wednesday Morning, June 29, 2011
Green Auditorium

8:30 AM *J5.1

Nanotechnology for Cancer Approaches in the Clinic.
James R. Baker, University of Michigan, Ann Arbor, Michigan.

9:10 AM *J5.2

Pathways through a Molecular Forest: One Person's Journey.
George R. Newkome, Polymer Science, University of Akron, Akron, Ohio.

9:50 AM BREAK

10:10 AM - 12:50 PM SESSION A: General Lecture Room A

* Invited paper

SESSION A2:
Chairs: Jon Parquette and Prasad Edamana
Wednesday Morning, June 29, 2011
Lecture Room A

10:10 AM *A2.1

Poly(Ether Imine) Dendritic Platforms: Chemical, Materials and Biological Studies. Narayanaswamy Jayaraman, Department of Organic Chemistry, Indian Institute of Science, Bangalore, India.

10:40 AM A2.2

Linear-Hyperbranched Star-Like Amphiphiles: Synthesis, Modification and Solution Behavior. Caiping Lin, Connor J. Boyle and Ivan Gitsov; Chemistry, State University of New York ESF, Syracuse, New York.

11:00 AM A2.3

Unexpected Dynamic Behavior of Hydrated Poly(Amidoamine) Dendrimers in Dilute Aqueous Solutions: Interaction with Small Molecules. Istvan Banyai¹, Monika Keri¹ and Lajos P. Balogh²; ¹Colloid and Environmental Chemistry, University of Debrecen, Debrecen, Hungary; ², AA Nanomedicine and Nanotechnology, Boston, Massachusetts.

11:20 AM *A2.4

Perspectives from the Early Years: From Amide- to Alkyl-based Connectivity. Charles N. Moorefield, University of Akron, Akron, Ohio.

11:50 AM *A2.5

Stimuli-Responsive Nanostructures from Aqueous Assembly of Dendritic Rods. Myongsoo Lee, Chemistry, Seoul National University, Seoul, Korea, Republic of.

12:20 PM *A2.6

Modular Distinctive Approach to Exponential Signal Amplification: Dendritic Chain Reaction. Doron Shabat, Tel Aviv University, Tel Aviv, Israel.

10:10 AM - 12:30 PM SESSION E: Drug Delivery Green Auditorium

* Invited paper

SESSION E3:
Chairs: S. Thayumanavan and Barbara Klajnert
Wednesday Morning, June 29, 2011
Green Auditorium

10:10 AM E3.1

Removal of the Phosphatase SSH-1L Using a Dendrimer-Vehiculated siRNA in Cortical Neurons Prevents Excitotoxic Neuronal Death. Inmaculada Posadas¹, Francisco C. Perez-Martinez³, Maria Prado Sanchez-Verdu², Francisco J. Guerra^{2,3} and Valentin Ccna¹; ¹Unidad Asociada Neurodeath, Universidad de Castilla-La Mancha, Albacete, Spain; ²Departamento de Química Inorgánica, Orgánica y Bioquímica, Universidad de Castilla-La Mancha, Ciudad Real, Spain; ³NanoDrugs, S.L., Albacete, Spain.

10:30 AM E3.2

Dendrimer-based Nano-antibiotics. Toke L. Mariager and Jørn B. Christensen; Chemistry, University of Copenhagen, Copenhagen, Denmark.

10:50 AM *E3.3

Design of Stimuli-sensitive Dendrimers, Dendrimer-gold Hybrids and Dendrimer-based Assemblies for Biomedical Applications. Kenji Kono, Applied Chemistry, Osaka Prefecture University, Sakai, Japan.

11:20 AM *E3.4

Surfactant Conjugated Dendritic Nano-construct for Treatment of Brain Tumor in Rats. Narendra K. Jain and Virendra Gajbhiye; Dept. of Pharmaceutical Sciences, Pharmaceutics Research Laboratory, Sagar, MP, India.

11:50 AM E3.5

Paclitaxel Loaded Hyaluronic Acid Conjugated Dendrimers : Anticancer Nanoconstructs Against Tumor Induced Mice. Umesh Gupta^{1,2} and Narendra K. Jain¹; ¹Department of Pharmaceutical Sciences, Dr. H. S. Gour University, Sagar, M.P. 470115, India; ²Pharmacy, Guru Ramdas Khalsa Institute of Science and Technology, Jabalpur, Madhya Pradesh, India.

12:10 PM E3.6

An Intrinsically Fluorescent PAMAM Dendrimer as Nanocarrier and Nanoprobe for Nucleic Acids Delivery: Transfection and Bioimaging Study. Chih-Chien Chu¹ and Imae Toyoko²; ¹Applied Chemistry, Chung Shan Medical University, Taichung, Taiwan; ²National Taiwan University of Science and Technology, Taipei, Taiwan.

10:10 AM - 11:30 AM SESSION I: Catalysis and Light Harvesting Lecture Room B

* Invited paper

SESSION I1:
Chairs: Martin Brechbiel and Ling Peng
Wednesday Morning, June 29, 2011
Lecture Room B

10:10 AM *I1.1

Self-assembly of Light-harvesting Antennae Based on Luminescent Dendrimers. Paola Ceroni, Chemistry Ciamician, University of Bologna, Bologna, Italy.

10:40 AM *I1.2

Enhanced Optical Properties of Dendrimer Materials. Theodore Goodson, Chemistry, University of Michigan, Ann Arbor, Michigan.

11:10 AM I1.3

Immobilizing Water Soluble Dendritic Electron Donors (Phthalocyanines) and Electron Acceptors (Perylene-diimides) onto Single Wall Carbon Nanotubes. Uwe Hahn¹, Dirk M. Guldi² and Tomas Torres¹; ¹Department of Organic Chemistry, Universidad Autonoma de Madrid, Madrid, Spain; ²Department of Chemistry and Pharmacy, Friedrich-Alexander-University Erlangen-Nuremberg, Erlangen-Nuremberg, Germany.

11:30 AM - 1:00 PM
SESSION F: Imaging
Lecture Room B

* Invited paper

SESSION F3:
Chairs: Martin Brechbiel and Ling Peng
Wednesday Morning, June 29, 2011
Lecture Room B

11:30 AM F3.1

Dendrimer-based Fluorescent Indicators: in vitro and in vivo Applications. Lorenzo Albertazzi^{1,2}, Marco Brondi^{1,2}, Barbara Storti^{1,2}, Giovanni M. Pavan³, Laura Marchetti¹, Sebastian Sulis Sato^{1,2}, Giovanni Signore², Gian Michele Ratto¹ and Fabio Beltram^{1,2}; ¹Scuola Normale Superiore - NEST, Pisa, Italy; ²Center for Nanotechnology Innovation @NEST, Pisa, Italy; ³University of Applied Sciences of Southern Switzerland (SUPSI), Manno, Switzerland.

11:50 AM F3.2

Dendritically Modified Lanthanide-based Up-converting Nanoparticles. Tatiana V. Esipova¹, XingChen Ye², Joshua E. Collins³, Christopher B. Murray² and Sergei A. Vinogradov¹; ¹Biochemistry and Biophysics, University of Pennsylvania, Philadelphia, Pennsylvania; ²Chemistry, University of Pennsylvania, Philadelphia, Pennsylvania; ³Intelligent Material Solutions Inc., Princeton, New Jersey.

12:10 PM F3.3

Combined Convergent-Divergent Synthesis of PEG-Core Dendrimers for CT Imaging. Reena Bajpai, Runtang Wang, Robert Brasch, Benjamin Yeh and Yanjun Fu; Radiology & Biomedical Imaging Dept, Box 0628, University of California San Francisco (UCSF), San Francisco, California.

12:30 PM *F3.4

The Imaging Probe Development Center: A Central Core Facility for the Production and Dissemination of Molecular Imaging Probes Including Diverse Dendrimer-based Compositions. O. Vaslatiy, H. Wu, A. Sulima, A. Opina, N. Shenoy, B. Xu, P. Young and Gary L. Griffiths; Imaging Probe Development Center at the National Heart and Blood Institute, National Institutes of Health, Rockville, Maryland.