



Program

Dec 02, 2013

8:30-9:00 **Opening ceremony**

9:00-9:15 **Photo taken**

Biomaterials: Challenges and Opportunities 1

Chair: Jiacong Shen

9:15-9:35

Allan S. Hoffman (*University of Washington, USA*)

History of the Development of Nanocarriers in the Controlled Drug Delivery Field

9:35-9:55

Ben Zhong Tang (*Hong Kong University of Science & Technology, China*)

Biological Probes Based on AIE Luminogens

9:55-10:15

Buddy D. Ratner (*University of Washington, USA*)

Biomaterials and Biocompatibility: Roots to Branches

10:15-10:35

Zhongwei Gu (*Sichuan University, China*)

Bio-inspired and Biomimetic Multifunctional Nanovehicles for Drug/Gene Delivery

10:35-10:55

Stuart L. Cooper (*Ohio State University, USA*)

Methacrylic Terpolymers Containing Sulfobetaine for Cardiovascular Tissue Engineering Application

Coffee Break (10:55-11:10)

Biomaterials: Challenges and Opportunities 2

Chair: Ben Zhong Tang

11:10-11:30

Xuesi Chen (*Changchun Institute of Applied Chemistry, Chinese Academy of Sciences, China*)

Study on polypeptide carriers for anticancer nanomedicines

11:30-11:50

Alexander Revzin (*University of California, USA*)

Micropatterned Sensing Surfaces for Cell Analysis

11:50-12:10

Jiandong Ding (*Fudan University, China*)

Nanopatterning of RGD Peptides on PEG Hydrogels and Corresponding Cell Studies

12:10-12:30

Alex Simonian (*Auburn University, USA*)

Layer-by-Layer Assembled Multi-enzyme/CNT Interfaces for Biosensing Applications

Lunch & Poster Preparation (12:30-14:00)

Twitter 1

Chair: Buddy Ratner

14:00-14:20

Kazuhiko Ishihara (*University of Tokyo, Japan*)

Bioinspired Phospholipid Polymeric Biomaterials for Innovative Medical Device

14:20-14:40

Shaoyi Jiang (*University of Washington, USA*)

Molecular Understanding, Design and Development of Zwitterionic-based Biomaterials

14:40-15:00

Jian Ji (*Zhejiang University, China*)

Bionanointerface: From zwitterionic ligand to mixed charge

15:00-15:20

Zhan Chen (*University of Michigan, USA*)

Molecular Level Studies on Polymer Surface Structures in Water and Interactions between Polymers and Proteins in Situ

Coffee Break & Poster Presentation (15:20-16:00)

Twitter 2**Chair: Kazuhiko Ishihara**

16:00-16:20

Han Zuilhof (*Wageningen University, Netherlands*)

Romantic Surfaces: Optimization towards the one and only!

16:20-16:40

Shengfu Chen (*Zhejiang University, China*)

Development of Protein-like Molecules base on PAMAM Surface Modification

16:40-17:00

Wei-Bor Tsai (*Taiwan University, Taiwan, China*)

In Situ Cell Encapsulation with Zwitterionic-based Polymers for Tissue Engineering Applications

17:00-17:20

Gang Cheng (*University of Akron, USA*)

Molecular Evolution of Zwitterionic Carboxybetaine-based Materials through de novo Design

17:20-17:40

Yung Chang (*Chung Yuan University, Taiwan, China*)

Bio-inert Nature of Zwitterionic Polymeric Interface and Membranes

17:40-18:00

Weiping Gao (*Tsinghua University, China*)

Site-Specific Protein-Based Bioconjugates for Biomedical Applications

Dinner (18:00-20:00)

Dec 03, 2013**Biomaterials: Nanotechnology and Nanomedicines****Chair: Allan Hoffman**

8:30-8:50

Linqi Shi (*Nankai University, China*)

Bioinspired molecular chaperone based on the mixed shell micelles

8:50-9:10

Paul R. Van Tassel (*Yale University, USA*)

Porous nanofilm biomaterials: biomolecular adsorption and cellular response

9:10-9:30

Xiqun Jiang (*Nanjing University, China*)

Protein Nanoparticles for Cell-Penetration and Drug Delivery

9:30-9:50

Lino Ferreira (*University of Coimbra, Portugal*)

Bioengineered nanomaterials

Coffee Break & Poster Presentation (9:50-10:30)

Twitter 3**Chair: Stuart L. Cooper**

10:30-10:50

Andre Laschewsky (*University of Potsdam, Germany*)

Sulfobetaines as Zwitterionic Building Blocks in Stimuli-responsive Polymers

10:50-11:10

Jun Wang (*University of Science and Technology of China, China*)

Differential Drug Delivery with Bacterial-Responsive Polymeric Nanoparticles

11:10-11:30

David Hoagland (*University of Massachusetts, USA*)

Polyelectrolytes, Proteins, Poly(Amino Acid)s, and Polyzwitterions in Ionic liquids

11:30-11:50

Jui-Che Lin (*Cheng Kung University, Taiwan, China*)

Surface Characterization and Platelet Compatibility Studies for the Self-Assembled Monolayers Prepared by Pseudo-Zwitterionic Binary Mixed-Charge Alkanethiols or Zwitterionic Sulfobetaine-Terminated Alkanethiol

11:50-12:10

Matthew T. Bernards (*University of Missouri, USA*)

Polyampholyte Polymers as a Novel Nonfouling Biomaterial Platform

12:10-12:30

Lingyun Liu (*University of Akron, USA*)

Amino Acid – Based Zwitterionic Antifouling Polymers and Applications in Wound Care

Lunch & Poster Presentation (12:30-14:00)

Biomaterials: Surface Coatings

Chair: Jiandong Ding

14:00-14:20:

Thomas Horbett (*University of Washington, USA*)

Blood (in)compatibility of Biomaterials: a failure of biomaterials science?

14:20-14:40

Hong Chen (*Soochow University, China*)

Combining Surface Chemical Modification and Topographic Design to Explore New Interfacial Biological Phenomen

14:40-15:00

Shutao Wang (*Institute of Chemistry, Chinese Academy of Sciences, China*)

Engineering biointerface with controlled cell adhesion towards cancer diagnostics

15:00-15:20

Axel Rosenhahn (*Ruhr-University Bochum, Germany*)

Biopolymeric coatings for biomedical and antifouling applications

15:20-15:40

Jonathon Zhao (*Zhejiang Zylox Medical Devices, Co., Ltd, China*)

Opportunities and Challenges of Bio-inspired Materials as Medical Device Coatings

Coffee Break & Poster presentation (15:40-16:00)

Biomaterials: Smart Materials and Hydrogels

Chair: Paul R. Van Tassel

16:00-16:20

Tao Xie (*Zhejiang University, China*)

Shape Memory Polymer Based Bio-Inspired Material Systems

16:20-16:40

Jie Zheng (*University of Akron, USA*)

Design, Synthesis, and Characterization of Smart and Multifunctional Hydrogels

16:40-17:00

Wenguang Liu (*Tianjin University, China*)

Construction of 3-D hydrogel scaffolds for cell encapsulation: from manual operation to self-shaping and memory

17:00-17:20

Wei Huang (*Shanghai Jiao Tong University, China*)

Synthesis and Biomedical Application of Hyperbranched Polyphosphates

17:20-17:35

Yongkuan Gong (*Northwest University, China*)

Bio-inspired Catechol and Cell Membrane Mimetic Antifouling Coatings

17:35-17:50

Jian Zhou (*South China University of Technology, China*)

Computer Simulation on the Self-assembly of PLA-PCB and PLA-PEG Systems and their Drug Delivery Application

17:50-18:10 Close remark

Dinner (18:30-20:00)

Dec 04, 2013

09:00-18:00

Social Activity
