

Detailed MaM 2014 Program

Wednesday, 26.3.2014

- 16:00 - 18:00 Registration
18:00 - 19:00 Dinner Buffet
19:00 - 19:30 Opening

Protein Quality Control (Session Chair: Christian Freund)

- 19:30 - 19:55 **Bernd Bukau**
"Mechanisms of folding of newly synthesized polypeptide"
19:55 - 20:00 Discussion
20:00 - 20:25 **Peter-Michael Kloetzel**
"The role of immunoproteasomes in protein homeostasis"
20:25 - 20:30 Discussion
20:30 - 20:55 **Ron Kopito**
"Protein quality control in the endoplasmic reticulum"
20:55 - 21:00 Discussion

Thursday, 27.03.2014

Plasma Membrane Scaffolds (Session Chair: Gary Lewin)

- 09:00 - 09:25 **Patrik Verstreken**
"Systematic analysis of the "membrane deformome" in presynaptic function"
09:25 - 09:30 Discussion
09:30 - 09:55 **Stephan Sigrist**
"Shedding light on the functional anatomy of presynaptic active zones"
09:55 - 10:00 Discussion
10:00 - 10:25 **Robert Edwards**
"Biogenesis of the Regulated Secretory Pathway"
10:25 - 10:30 Discussion
10:30 - 10:55 **Christian Rosenmund**
„Regulation of short-term plasticity by the active zone protein Munc13"
10:55 - 11:00 Discussion
11:00 - 11:30 Coffee Break

Ribosome Structure and Mechanisms (Session Chair: Zoya Ignatova)

- 11:30 - 11:55 **Marina Rodnina**
"Translational Recoding as a Kinetic Event"
11:55 - 12:00 Discussion

- 12:00 - 12:25 **Rachel Green**
"Mechanisms of mRNA surveillance defined by ribosome profiling and biochemistry"
- 12:25 - 12:30 Discussion
- 12:30 - 12:55 **Scott Blanchard**
"Gaining new insights into macromolecular function through single-molecule fluorescence imaging"
- 12:55 - 13:00 Discussion
- 13:00 - 14:00 Lunch and Coffee
- 14:00 - 15:00 **Poster Session I**

Membrane Dynamics I (Session Chair: Oliver Daumke)

- 15:00 - 15:25 **Petra Schwille**
"Membrane models to investigate lipid-dependent protein dynamics"
- 15:25 - 15:30 Discussion
- 15:30 - 15:55 **Andrew Carter**
"The structure of the dynein motor"
- 15:55 - 16:00 Discussion
- 16:00 - 16:25 **Ulrike Kutay**
"Around the Cell Nucleus – Nuclear Envelope Structure, Function and Dynamics"
- 16:25 - 16:30 Discussion
- 16:30 - 16:55 **John Briggs**
"Cryo-electron microscopy and correlative microscopy approaches to study assembly of coated vesicles and enveloped viruses"
- 16:55 - 17:00 Discussion
- 17:00 - 17:30 Coffee Break

Signal Transduction (Session Chair: Klaus Peter Hofmann)

- 17:30 - 17:55 **Peter Hegemann**
"Light-driven Ion Transporters" -Mechanistic perspectives and novel optogenetic applications"
- 17:55 - 18:00 Discussion
- 18:00 - 18:25 **Alex Gottschalk**
"Optogenetic Analysis of a Distributed Neuronal Network that Mediates Food Responses in *Caenorhabditis elegans*"
- 18:25 - 18:30 Discussion
- 18:30 - 18:55 **Gebhard Schertler**
"Free Electron Lasers (FELs) are changing the Structural Biology of Membrane Proteins"
- 18:55 - 19:00 Discussion

19:00 - 19:25 **Martin Lohse**
"Optical studies of receptor activation and signaling"
19:25 - 19:30 Discussion
20:00 Dinner/ Speakers Dinner

Friday, 28.03.2014

Translational Control (Session Chair: Udo Heinemann)

09:00 - 09:25 **Jonathan Weissman**
"Monitoring translation in time and space using ribosome profiling."
09:25 - 09:30 Discussion
09:30 - 09:55 **Matthias Hentze**
"REM networks connect gene regulation and metabolism"
09:55 - 10:00 Discussion
10:00 - 10:25 **Jon Yewdell**
"Generating Peptides for T Cell Immunosurveillance: Breaking the Law of Mass Action"
10:25 - 10:30 Discussion
10:30 - 11:00 Coffee Break

Systems Biology and Signaling (Session Chair: Edda Klipp)

11:00 - 11:25 **Anna Marie Pyle**
"Building a new machine from ancient parts: how nature transformed a helicase motor into a family of biosensors for innate immunity"
11:25 - 11:30 Discussion
11:30 - 11:55 **Matthias Selbach**
"Studying proteome dynamics using quantitative mass spectrometry"
11:55 - 12:00 Discussion
12:00 - 12:25 **Nikolaus Rajewsky**
"Regulatory RNAs"
12:25 - 12:30 Discussion
12:30 - 12:55 **Gary Lewin**
"Stomatin-domain family proteins: versatile scaffolds regulating the activity of plasma membrane ion channels and transporters"
12:55 - 13:00 Discussion
13:00 - 13:25 **Philippe Bastiaens**
"The interdependence of membrane dynamics and signaling"
13:25 - 13:30 Discussion
13:30 - 14:30 Lunch and Coffee
14:30 - 15:30 Poster session II

Membrane Dynamics II (Session Chair: Kate Poole)

- 15:30 - 15:55 **Sean Munro**
"Vesicle tethering by the large coiled-coil proteins of the Golgi apparatus"
- 15:55 - 16:00 Discussion
- 16:00 - 16:25 **Volker Haucke**
"Spatiotemporal control of endocytosis"
- 16:25 - 16:30 Discussion
- 16:30 - 16:55 **Samara Reck-Peterson**
"Spatial Regulation of Molecular Motors"
- 16:55 - 17:00 Discussion
- 17:00 - 17:30 Coffee Break
- 17:30 - 17:55 **Rob Parton**
"New Insights into the Formation and Functions of Caveolae"
- 17:55 - 18:00 Discussion
- 18:00 - 18:25 **Helmut Grubmüller**
"MD Simulations of single molecule experiments, molecular machines, and a dynasome perspective"
- 18:25 - 18:30 Discussion

18:30 – 19:30 Evening Lecture: Jon Yewdell:

"How to Succeed in Science Without Really Trying"

20:30 **PARTY Frannz Club**

Saturday, 29.03.2014

Molecular Machines (Session Chair: Markus Wahl)

- 09:30 - 09:55 **Venki Ramakrishnan**
„Structure of a eukaryotic initiation complex”
- 09:55 - 10:00 Discussion
- 10:00 - 10:25 **Stefan Raunser**
"How to kill a mocking bug - Structural Insights into Tc toxin complex action"
- 10:25 - 10:30 Discussion
- 10:30 - 10:55 **Mark Mayer**
"Glutamate Receptor Ion Channels: Structure and Mechanism"
- 10:55 - 11:00 Discussion
- 11:00 - 11:25 **Christian Spahn**
„Structure and structural dynamics of mammalian ribosomal complexes”
- 11:25 - 11:30 Discussion
- 11:30 - 12:00 Coffee Break

Protein Quality Control/ Autophagosome (Session Chair: Stephan Sigrist)

- 12:00 - 12:25 **Volker Dötsch**
"DNA damage in oocytes induces an irreversible switch of the quality control factor TAp63 α from dimer to tetramer"
- 12:25 - 12:30 Discussion
- 12:30 - 12:55 **David Rubinsztein**
"Autophagy: from neurodegeneration to the plasma membrane"
- 12:55 - 13:00 Discussion
- 13:00 - 13:25 **Jim Hurley**
"Vesicle Scaffolding and the Birth of the Autophagosome"
- 13:25 - 13:30 Discussion
- 13:30 - 13:45 Closing: **Volker Haucke**
- 13:45 - 14:30 Lunch