

GRK2162

October 4th – 6th 2022

Symposium

„Developmental Processes in CNS Plasticity and Pathogenesis“

Venue:

Max Planck Institute for the Science of Light
Staudtstrasse 2, 91058 Erlangen

Tuesday Oct. 4th

2.00 pm **Registration and Poster setup**

3.15 pm **Welcome**

3.30 pm **Keynote: David Rubinsztein** University of Cambridge, UK
“P97/VCP and autophagy“

4.30 - 5.00 pm **Coffee Break and Poster setup**

Session 1 **Homeostasis**

Chair: Shadi Albasset and Roberto Bilbao Canalejas

5.00 pm **Iris Schäßner** FAU Erlangen-Nürnberg, DE
“Lysosomal acidification and function is modulated by FoxO-signaling
in adult hippocampal neural/stem progenitor cells“

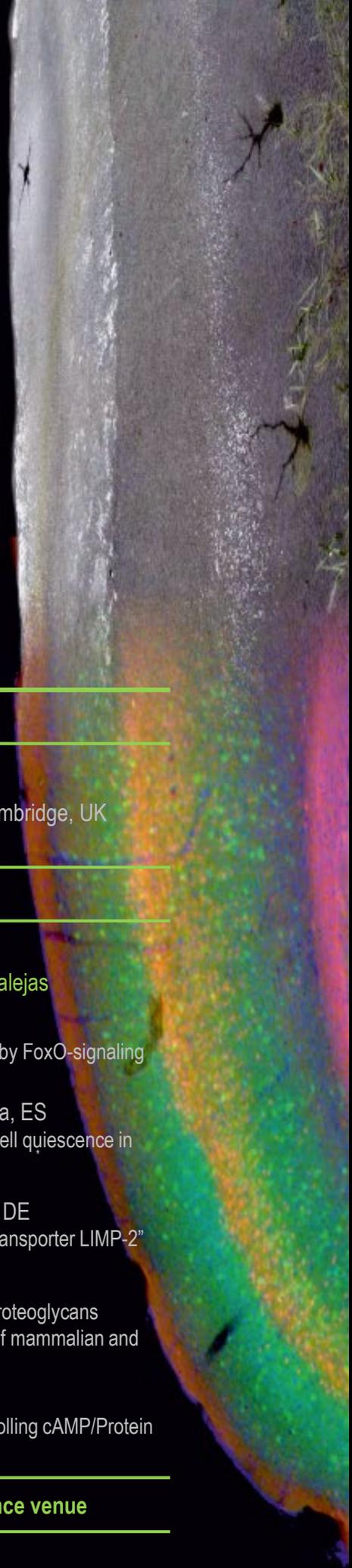
5.15 pm **Helena Mira** Institute of Biomedicine of Valencia, ES
“Autophagy is a cell-intrinsic driver of neural stem cell quiescence in
hippocampal dentate gyrus development“

5.30 pm **Jan Philipp Dobert** University Hospital Erlangen, DE
selected short talk “Activating β -glucocerebrosidase by exploiting its transporter LIMP-2“

5.45 pm **Julia Kolb** MPI Erlangen, DE
selected short talk “Tissue mechanics-modulating small leucine-rich proteoglycans
contribute to the differential regenerative capacity of mammalian and
zebrafish central nervous system axons“

6.00 pm **Natalia Kononenko** University of Cologne, DE
“Autophagy regulates neuronal excitability by controlling cAMP/Protein
Kinase A signaling“

6.30 – 10.00 pm **Get Together – Food and Drinks at conference venue**



Wednesday Oct. 5th

8.00 am **Registration and Poster setup**

Session 2

Immunology

Chair: Veronika Sigutova and Kristina Battis

8.30 am **Andreas Vlachos** Albert-Ludwigs-Universität Freiburg, DE
"Tumor necrosis factor alpha (TNF α) modulates synaptopodin-dependent synaptic plasticity"

9.00 am **Laura Krumm** FAU Erlangen-Nürnberg, DE
selected short talk "Involvement of microglia in Hereditary Spastic Paraplegia type 11"

9.15 am **Deepak P. Srivastava** King's College London, UK
"Studying the impact of interferon-gamma (IFN- γ) on development and relevance for neurodevelopmental disorders"

9.45 am **Martin Kerschensteiner** LMU Munich, DE
"CRISPR-based dissection of inflammatory CNS lesion formation"

10.15 -10.45 am **Coffee Break**

Session 3

Epigenetics

Chair: Anna Fliedner and Filippo Zoppi

10.45 am **Hongjun Song** University of Pennsylvania, Philadelphia, US
"Continuous neurogenesis in the mammalian hippocampus across the lifespan"

11.15 am **Ksenia Sarieva** University of Tuebingen, DE
selected short talk "Human dorsal forebrain organoids help to elucidate cell type-specific effects of maternal immune activation on neocortical development"

11.30 am **Johan Holmberg** Karolinska Institute Stockholm, SE
"PRC2-mediated repression is essential to maintain identity and function of differentiated dopaminergic and serotonergic neurons"

12.00 pm **Alexi Nott** Research Institute at Imperial College London, UK
"Brain cell-type regulatory landscapes and associations with disease"

12.30 - 2.30 pm **1st Poster Session and Boxed Lunch**

Session 4

Oligodendrogenesis

Chair: Lisa Hassel and Tim Aberle

2.30 pm **Claire Jacob** Johannes Gutenberg University Mainz, DE
"Learning from Schwann cells to promote oligodendrocyte differentiation and plasticity after lesion"

3.00 pm **Dies Meijer** The University of Edinburgh, UK
"Mechanisms of Voltage-Gated Potassium Channel distribution in myelinated axons"

3.30 pm **Lisa Hassel** FAU Erlangen-Nürnberg, DE
selected short talk "Analysis of ectopic Sox9 expression during different timepoints of oligodendrocyte development in the murine CNS"

3.45 pm **William D. Richardson** University College London, UK
"Myelin in motor learning, cognition and memory"

4.15 - 4.45 pm **Coffee Break**

Wednesday Oct. 5th

Session 5

Neurogenesis

Chair: Neerja P. Suresh und Sneha Adhikarla

- 4.45 pm **Guo-li Ming** University of Pennsylvania, Philadelphia, US
“Harnessing intrinsic properties for engineering human brain-region specific organoids using induced pluripotent stem cells”
- 5.15 pm **Sneha Adhikarla** FAU Erlangen-Nürnberg, D
selected short talk
“A novel role of SOXC factors in proliferation and survival of adult neural stem and progenitor cells”
- 5.30 pm **Daniel Berg** University of Aberdeen, Scotland, UK
“The Development of an Adult Neurogenic Niche”
- 6.00 pm **Sebastian Jessberger** University of Zurich, CH
“Molecular and functional heterogeneity of neural stem cells”

Thursday Oct. 6th

8.30 - 9.00 am **Coffee and Poster setup**

Session 6

Circuit Formation and Maintenance

Chair: Sriity M. Sadanandan and Jan Philipp Dobert

- 9.00 am **Anna-Lena Fleischer** Jena University Hospital, DE
selected short talk
“Possible role of NKCC1 in the fate of hippocampal neural stem cells during Alzheimer’s disease”
- 9.15 am **Sriity Melley Sadanandan** FAU Erlangen-Nürnberg, DE
selected short talk
“Impact of activin signalling on hippocampal GABAergic inhibition and its effects in neuropsychiatric disorders”
- 9.30 am **Sabine Liebscher** LMU Munich, DE
“Exciting complexity: Circuit mechanisms of cortical hyperexcitability in ALS”

10.00 - 12.00 am **2nd Poster Session and Coffee Break**

- 12.00 am **Michel Aimé Picardo** Institute of Neurobiology, Marseille, FR
“The rapid developmental rise of somatic inhibition disengages hippocampal dynamics from self-motion”
- 12.30 am **Simon T. Schäfer** Technical University of Munich, DE
“Modeling Neuro-Immune Interactions under Physiological Conditions: A novel Organoidbased Approach for Studying Human Environment-dependent Microglia Phenotypes“
- 12.45 am **Tomohisa Toda** German Center for Neurodegenerative Diseases, DE
“Roles of nuclear structural proteins in the maintenance of brain function“

1.00 - 1.15 pm **Wrap up - End of Meeting**
