



FKNE Winter Symposium 2019

Nov. 12th-14th, [Galaxy Hotel](#), Heraklion, Crete

Monday, 11th Nov. 2019

19:30-21:30 **Welcome Reception** (Galaxy Hotel lobby)

Day 1: Tuesday 12th Nov. 2019

Session 1: Functional development of brain circuits

09.00-10:00 Keynote: Theo Karayiannis, University of Zurich
Developmental divergence of sensory stimulus coding in the barrel Cortex

10:00-10:30 Laura Cancedda, FKNE
The Development of Synaptic Transmission is Time-Locked to Early Social Behaviors in Rats

10:30-11:00 Coffee break

11:00-11:30 Filippo del Bene, FKNE
An intertectal neural circuit that allows binocular integration in the absence of ipsilateral retinotectal projections

11:30 -12:00 Emre Yaksi, FKNE
Born together, function together

12:00-12:15 Daniel von Wangenheim, 3i
3i's Cleared Tissue LightSheet

12:15–13:30 Free discussion time

13:30-14:30 Lunch break

Session 2: From neuroscience to Artificial Intelligence and beyond

14.30-15:30 Keynote: Yulia Sandamirskaya, UZH
Neuromorphic computing: perception and control with spiking neurons in animals and machines

15:30-16:00 Pavan Ramdya, FKNE
A view from the middle of the nervous system

16:00-16:30 Coffee break

- 16:30-17:00 Panayiota Poirazi, FKNE
Dendritic modelling and potential contributions to AI
- 17:00-17:30 Susanne Schreiber, FKNE
Synchronizing networks with a novel type of spike
- 17:30-19:00 Poster Session 1* with drinks
- 19:00–22.00 Dinner at [Kouzineri restaurant](#)

Day 2: Wednesday 13th Nov. 2019

Session 3: NeuroEvoEco 1

- 09.00-10:00 Keynote: Daniel Robert, Bristol Univ.
The sensory ecology of aerial electroreception
- 10:00-10:30 Sinziana Pop (Prieto-Godino lab, FKNE)
Programmed cell death sculpts neural networks in flies
- 10:30-11:00 Coffee break
- 11:00-11:30 Kristin Tessmar, FKNE
Timing under the light of sun and moon
- 11:30-12:00 Asya Rolls, FKNE
Using the brain to control immunity
- 12:00-12:30 Takeshi Yoshimatsu (Baden lab, FKNE)
Optimal rotation of colour space in the first synaptic layer of the visual system in zebrafish
- 12:30-13:30 Lunch

Session 4: NeuroEvoEco 1

- 13:30-14:30 Keynote: Yun Ding, University of Pennsylvania
Sing me a new song: towards the genetic and neural basis of behavioral diversity
- 14:30–15:00 Maximilian Jösch, FKNE
Evolution of Sensorimotor Transformation Across Diptera
- 15.00-15.30 Dana Galili (Jefferis lab, FKNE)
Neural circuits for fly social behaviours
- 15.30-16.30 Free discussion time
- 16:30-17:00 Coffee break
- 17:00–18:30 Poster Session 2*
- 18:30-21:00 Dinner at [Merastri restaurant](#)
- 21:00– Dance party at Galaxy Hotel

Day 3: Thursday 14th Nov. 2019

Session 5: Organelles

09.00-10:00 Keynote: Nektarios Tavernarakis, IMBB-FORTH
Mitochondrial turnover and neurodegeneration during ageing

10:00-10:30 Vassiliki Nikoletopoulou, FKNE
Autophagy at the synapse

10:30-11:00 Coffee break

11:00-12:00 Keynote: Franck Oury, Paris
Talk title tbd

12:00-13:30 Lunch and departure

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* *Please check on next page the scheduled poster presentations.*

Poster Session 1*

| No | Name | Poster presentations |
|----|----------------------|--|
| 1 | Sara Mancinelli | Investigating HCN1-mediated activity-dependent processes in controlling early development of cortical subtypes |
| 2 | Caroline Quoilin | The gut microbiota as a new target in the treatment of disinhibition in alcohol-dependence: a clinical study |
| 3 | Adi Doron | Structure, Neuronal Content, and Functional Significance of Hippocampal Astrocytic Domains |
| 4 | Alicja Puścian | Analyzing dynamics of social behavior in Eco-HAB system |
| 5 | Anthi Apostolopoulou | Homeostatic plasticity in an olfactory circuit in the <i>Drosophila</i> central brain |
| 6 | Rudolf Degen | Investigation of calcium-mediated signaling in different compartments of mouse vomeronasal sensory neurons |
| 7 | Fabrizio Palumbo | Zebrafish dorsal habenula is required for updating learned behaviors |
| 8 | Colom Cadena Marti | TMEM-97 synaptic localization and potential amyloid beta interaction in human Alzheimer's disease cases |
| 9 | Wiktor Mlyarski | High-order statistics of population activity in the superior colliculus |

Poster Session 2*

| No | Name | Poster presentations |
|----|----------------------|--|
| 1 | Paul Pfeiffer | Capacitance clamp |
| 2 | Natalie Kaempf | Sleep dysfunction in Parkinson's disease |
| 3 | Bernadette Basilio | The role of the high risk gene <i>Cul3</i> in brain development and autism |
| 4 | Diana Balazsfi | Activity of basal forebrain neurons in a classical sustained attention task (5-CSRTT) |
| 5 | Salvatore Magara | Plasticity Desaturation Rescues Synaptic-Plasticity Deficits In A Mouse Model Of Down Syndrome |
| 6 | Takeshi Yoshimatsu | Optimal rotation of colour space by zebrafish cones <i>in vivo</i> |
| 7 | Maria Savvaki | the role of autophagy in the developing CNS myelin |
| 8 | Spiros Chavlis | Breakdown of spatial coding and neural synchronization in epilepsy using a computational model |
| 9 | Rimante Minkeviciene | MIM-deficient mice exhibit anatomical changes in dendritic spines, cortex volume and brain ventricles, and functional changes in motor coordination and learning |
| 10 | Aleksij Kraljič | An affordable method for electrode localization for standalone EEG or simultaneous EEG-fMRI scanning |