



13th Optic Nerve Meeting

Obergurgl, Austria, 9-11th December 2025

20 minute slot = 15 minute talk and 5 minute discussion
10 minute slot = 6 minute talk and 4 minute discussion
7 minute slot = 4 minute talk and 3 minute discussion

Tuesday 9 th December		
Session 1: Glial Influence in Optic Neuropathy		
Chairs: Adriana Di Polo, Christian Behl		
8:30 - 8:40	Keith, Jonathan & Franz	Welcome and Introduction
8:40 - 9:00	Qi Cui	<i>Fate mapping determines the roles of monocytes and microglia in glaucoma</i>
9:00 - 9:20	Deborah Villafranca	<i>cAMP Signaling and spatially resolved astrocyte diversity in glaucoma</i>
9:20 - 9:40	James Tribble	<i>Inflammation-driven metabolic dysfunction</i>
9:40 - 9:50	Xandra Pereira	<i>Müller glia-RGC communication via extracellular vesicles</i>
9:50 - 10:00	Athanasios Alexandris	<i>Axonal degeneration and recovery after diffuse traumatic optic nerve injury: evidence for homotypic collateral sprouting and sex-dependent plasticity</i>
Morning Tea		
Session 2: Mitochondrial Dysfunction and Metabolism		
Chairs: Elena Vecino, Franz Grus		
10:30 - 10:50	Bledi Petriti	<i>Reversing mitochondrial dysfunction in optineurin E50K glaucoma</i>
10:50 - 11:10	Jeff Goldberg	<i>Axon transport of mitochondria and mRNAs</i>
11:10 - 11:30	Elena Vecino	<i>Mitochondrial importance in RGC injury and repair</i>
11:30 - 11:50	Luana Naia	<i>Mitochondria-derived vesicles in ageing and neurodegeneration</i>
11:50 - 12:00	Yasmin Alameddine	<i>Mitochondrial DNA at the interface between mitochondrial dysfunction and neuroinflammation in glaucoma</i>
Lunch Break		
Session 3: Neurodegeneration		
Chairs: Yang Hu, Giovanna Malucci		
17:30 - 17:50	Bryan Jones	<i>Retina: A model for neurodegeneration</i>
17:50 - 18:10	Giovanna Malucci	<i>Neurodegeneration and protein stress</i>
18:10 - 18:30	Christian Behl	<i>The many faces of autophagy in cellular resilience</i>
18:30 - 18:50	Len Levin	<i>Axon-to-axon signaling: A paradigm for progression in optic neuropathy</i>
18:50 - 19:00	Seungsoo Rho	<i>Nicotinamide trial in NTG patients</i>
Wednesday 10 th December		
Session 4: Regeneration and Repair Pathways		
Chairs: Richard Eva, Luana Naia		
8:30 - 8:50	Richard Eva	<i>Optimising retinal neuroprotection and optic nerve regeneration by targeting axonal organelles</i>
8:50 - 9:10	Adriana Di Polo	<i>Neuronal revival: The insulin pathway to dendritic and synaptic regeneration after axonal injury</i>
9:10 - 9:30	Robin Franklin	<i>TBC</i>
9:30 - 9:50	Yang Hu	<i>Recent progress on optic nerve protection and regeneration</i>
9:50 - 10:00	Carola Rutigliani	<i>Netrin-1 as a dual guidance and regenerative cue following sheath-preserving optic nerve transection</i>
Group Photo + Morning Tea		
Session 5: Gene Therapy and Translational Platforms		
Chairs: Alice Pébay, Keith Martin		
10:30 - 10:50	Volker Patzel	<i>Non-viral vectors for mitochondrial gene therapy</i>
10:50 - 11:10	Alice Pébay	<i>Can we use iPSCs to characterise heterogeneity in AMD? The case of reticular pseudodrusen</i>
11:10 - 11:30	Pete Williams	<i>Gene therapy targeting neuroprotection and neuroregeneration in glaucoma</i>
11:30 - 11:50	Stavros Vagionitis	<i>Neuronal activity bidirectionally regulates myelin plasticity</i>
11:50 - 12:00	Steven Bergmans	<i>A proof-of-concept study for single-nucleotide base editing to prevent vision loss in a Wolfram Syndrome mouse model</i>
Lunch Break		
Session 6: Vision Circuits and Synaptic Plasticity		
Chairs: Pete Williams, Deborah Villafranca		
17:30 - 17:50	Ben Siver	<i>Melanopsin in high-acuity RGCs</i>
17:50 - 18:10	Tas Khatib	<i>CNTF-mediated rescue of circuit dysfunction</i>
18:10 - 18:30	Christian van Oterendorp	<i>Mechanosensitive responses of cultured RGCs</i>
18:30 - 18:50	Luca Masin	<i>Successful injury-induced axonal regeneration requires extensive dendritic remodelling</i>
18:50 - 19:00	Greg Duncan	<i>Remyelination protects retinal ganglion cells from dual leucine zipper kinase-mediated apoptosis</i>
Thursday 11 th December		
Session 7: Rapid-Fire		
Chairs: Michel Cayouette, Len Levin		
8:30 - 8:37	Lidia Sánchez-Puebla	<i>The retina as a mirror of Alzheimer's Disease: Early structural and vascular alterations in the APPNL-F/NL-F mouse model</i>
8:37 - 8:44	Alan Nicol	<i>Pyrroloquinoline quinone is a potent metabo- and gero- protective agent in C. elegans</i>
8:44 - 8:51	Marcelino Aviles-Trigueros	<i>Unveiling hidden complexity: Insights into an uncharacterized subtype of retinal ganglion cell</i>
8:51 - 8:58	Ngan Pan Bennett Au	<i>Neuronal-intrinsic mechanisms for effective nerve repair: therapeutic implications for glaucoma</i>
8:58 - 9:05	Andrew White	<i>Role of Lactoferrin on RGC survival in a retinal explant model</i>
9:05 - 9:12	Xiaosha Wang	<i>Crybb3 promotes retinal ganglion cell axon regeneration via mTOR pathway activation</i>
9:12 - 9:19	Qiong Ding	<i>Evaluating AMPK activation as a strategy to enhance retinal ganglion cell survival and function in glaucoma</i>
9:19 - 9:26	Jesse Gardner-Russell	<i>Selective axonal injury depletes interpericyte tunnelling nanotubes</i>
9:26 - 9:33	Marta Molinari	<i>Modulation of miR-181a/b prevents glaucomatous optic neuropathy by improving mitochondrial dynamics and suppressing inflammation</i>
9:33 - 9:40	Markus Kuehn	<i>Altered distribution of T Cells in peripheral blood of patients with POAG</i>
9:40 - 9:47	Valery I. Shestopalov	<i>Inflammasome blockade strategies in optic neuropathies</i>
Morning Tea		
Session 8: Neuroprotection		
Chairs: Jeff Goldberg, Katharina Bell		
10:30 - 10:50	Antje Grosche	<i>TSPO maintains Müller Cell metabolic resilience under stress to preserve retinal homeostasis</i>
10:50 - 11:10	Livia Carvalho	<i>Drug-based interventions for cone preservation</i>
11:10 - 11:30	John D. Ash	<i>AMPK and mitochondria-targeted neuroprotection</i>
11:30 - 11:50	TBA	
11:50 - 12:00	Eleonora Daghini	<i>Targeting taurine metabolism for neuroprotection in a rat model of ocular hypertensive glaucoma</i>
Lunch Break		
Session 9: Transplantation, Stem cells and Organoid Models		
Chairs: Tas Khatib, Andrea Loreto		
17:30 - 17:50	Tim Kennedy	<i>Making connections: guiding synaptic plasticity in the CNS</i>
17:50 - 18:10	Michel Cayouette	<i>Numb-mediated Tau lowering therapy</i>
18:10 - 18:30	Luis Alarcon-Martinez	<i>Neurovascular coupling</i>
18:30 - 18:50	Veronica Moreno-Juan	<i>Cell type-targeted mitochondrial transplantation mediated by protein binders rescues cell degeneration</i>
18:50 - 19:00	Keith, Jonathan & Franz	Close and suggestions for 2026