

GPCR Workshop Agenda Dec 5 — 9, 2017, Big Island of Hawaii

PRELIMINARY PROGRAM – SESSIONS AND TOPICS:

Day 1	Tuesday, December 5th	
14:00 – 16:00	Registration	
16:00 – 16:10	Welcome	Brian Kobilka, Chair, Stanford University, USA
16:10 – 17:10	Rhodopsin, Both a Paradigm and Exception Among GPCRs	Klaus Peter Hofmann, Charité – Universitätsmedizin Berlin
17:30 – 18:30	Poster Preview Presentations	Katie Leach, Chair Monash Institute of Pharmaceutical Sciences
18:30	Welcome Reception	
Day 2	Wednesday, December 6th	
Session 2	Structure 1	Chair: Sebastian Granier
8:30 – 9:10	Structural Mechanisms of Ligand-dependent Activation in Class C GPCRs	Qing Fan, Columbia University
9:10 – 9:50	Structural Insights into Family B GPCR Activation	Patrick Sexton, Monash Institute of Pharmaceutical Sciences
9:50 – 10:30	Structural and Functional Analysis of a GPCR-GRK Complex	Jeff Benovic, Thomas Jefferson University, Pittsburgh
10:30 – 11:00	Break	
Session 3	Chemical Biology	Chair: Arthur Christopoulos
11:00 – 11:40	Novel Selective Ligands Based on GPCR Crystal Structures	Peter Gmeiner, University of Erlangen- Nurnberg, Germany
11:40 – 12:20	Structure-based Screening for GPCR Ligands from Fragment and Lead-like Chemical Space	Jens Carlsson, Uppsala University, Sweden
12:20 – 13:00	From Chemokine Receptors to Orphan GPCRs: In Silico Insights into Ligand Interactions	Irina Kufareva, UCSD
13:00 – 15:30	Lunch and Poster Viewing	
15:30 – 19:30	Free Time and Preparation for Interactive Discussion Session	
19:30 – 21:30	Interactive Discussion	Chair: Roger Sunahara
Day 3	Thursday, December 7th	
Session 4	Structure 2	Chair: Brian Kobilka
8:30 – 9:00	Structural Insights into G Protein Activation	Xiang Yu Liu, Tsinghua University, Beijing
9:00 – 9:40	Structure and Function of Adiponectin	Sebastian Granier,

9:40 – 10:20	Structural and Functional Basis of Adhesion GPCR Activation	<i>Demet Arac, University of Chicago</i>
10:20 – 10:30	Break	
Session 5	Physiology	Chair: Martin Lohse
10:30 – 11:10	The Endothelium in Blood Pressure Control and Atherosclerosis Progression – Roles of Endothelial GPCRs and Downstream Signalling Pathways	<i>Stefan Offermanns, Max Planck Institute for Heart and Lung Research, Bad Nauheim, Germany</i>
11:10 – 11:50	Biological Functions of GPCRs and Beta-arrestins Studied with Novel Mutant Mouse Models	<i>Jurgen Wess, NIH</i>
11:50 – 12:30	Fine-tuning Calcium Sensing Receptor Activity to Treat Bone and Mineral Disorders	<i>Katie Leach, Monash Institute of Pharmaceutical Sciences</i>
12:30 – 13:10	From Cognition to Seizures: Novel Molecular Mechanisms Underlying Key Muscarinic Receptor Action	<i>Andrew Tobin, University of Glasgow, UK</i>
13:10 – 15:30	Lunch and Poster Viewing	
15:30 – 19:30	Free Time and Preparation for Interactive Discussion Session	
19:30 – 21:30	Interactive Discussion	Chair: Andrew Tobin
18:00	Sunset Dinner/Banquet	

Day 4	Friday, December 8th	
Session 6	GPCRs in the Clinic	Chair: Stefan Offermanns
8:30 – 9:10	Novel GPCR Targets for Obesity and Type 2 Diabetes Treatment	<i>Lora Heisler, University of Aberdeen, NZ</i>
9:10 – 9:50	GPCR Ligands in the Novo Nordisk Diabetes and Obesity Pipeline	<i>Lotte Bjerre Knudsen, Novo Nordisk, Denmark</i>
9:50 – 10:30	GPCR Directed Biologics – From Discovery Strategies to the Clinic	<i>Andrew Tebben, Bristol Myers Squibb</i>
10:30 – 11:00	Break	
Session 7	Signaling	Chair: Jurgen Wess
11:00 – 11:40	Progress Toward Understanding GPCR Signaling From Endosomes	<i>Mark von Zastrow, UCSF</i>
11:40 – 12:20	Dynamic Brain Changes and the Emergence of Psychosis. Implications for Treatment?"	<i>Christos Pantelis, University of Melbourne</i>
12:20 – 13:00	Toward a Structural Understanding of Ligand-biased Signalling	<i>Michel Bouvier, University of Montreal, Canada</i>
13:00 – 14:30	Lunch and poster take down	
14:30 – 15:30	Free Time and Preparation for Interactive Discussion Session	
15:30 – 17:30	Interactive Session	Chair: Mark von Zastrow

Day 5	Saturday, December 9th	
Session 8	Potpourri	Chair: Patrick Sexton
9:30 – 10:10	Allostery in G Protein-coupled Receptors: From G Proteins to Small Molecules to Cations.	<i>Roger Sunahara, UCSD</i>
10:10 – 10:50	GPCR Contact Atlas: Dynamic Non-covalent Interactions in GPCRs	<i>A.J. Venkatakrisnan and Rasmus Fonseca</i>

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11:40 – 12:00 Closing Remarks by Organizers – Lunch

*Arthur, Patrick, Tong
Sun*