

2023 Metabolism, Obesity & Diabetes Scientific Retreat



UCSF NORC
UCSF DIABETES CENTER
UC BERKELEY METABOLIC BIOLOGY

Chaminade, Santa Cruz



MONDAY, MARCH 13

11:45 -12:45

REGISTRATION (LOBBY), LUNCH IN SUNSET ROOM

12:55

GENERAL SESSIONS, SANTA CRUZ ROOM

SESSION 1

THE SPECTRUM OF METABOLIC INFLAMMATION

1:00 - 2:30

SESSION CHAIRS: AUDREY PARENT & BRIAN BLACK

Anudari Letian, Goldberg Lab, UCSF - Neutrophils: an overlooked player in atherosclerosis

Lulu Li, Koliwad Lab, UCSF - The Role of Myeloid IRE1alpha in Atherosclerosis Progression

Owen Jiang, Bapat Lab, UCSF - Distinct High-fat Diet Regimes Divergently Modulate Experimental Models of Psoriasis

Julia Nilsson, Molofsky Lab, UCSF - Exploring liver stromal niches - What's the flavor of liver fibrosis?

Andrew Folick, Valdearcos Lab, UCSF - Single-cell RNA sequencing reveals Apolipoprotein E as a regulator of hypothalamic microglial nutrient responsiveness

2:30 - 3:00

BREAK

SESSION 2

CENTRAL REGULATION OF BODY WEIGHT

3:00 - 4:30

SESSION CHAIRS: ROSHANAK IRANNEJAD & DENIS TITOV

Annie Yue, Vaisse Lab, UCSF - Ligand dependent localization of MC4R at the primary cilium and body weight regulation

Irene Ojeda Naharros, Nachury Lab, UCSF - Anorexigenic signals and tonic MC4R activity promote its BBSome-mediated exit from the primary cilium

Gabriela Canales, Reiter Lab, UCSF - The BBSome Regulates Ciliary Levels of MC4R and ADCY3 in the Paraventricular Nucleus

Truong Ly, Knight Lab, UCSF - An orosensory mechanism for pacing food ingestion

Tomas Bachor, Xu Lab, UCSF - New Player in Feeding Regulation

Jimmy Ma, Liu Lab, UCSF - Protein hunger gated nitrogen flow from phospholipids to amino acids in *Drosophila*

4:30 - 5:00

BREAK

SESSION 3

NEW INSIGHTS INTO GLYCEMIC CONTROL

5:00 - 6:15

SESSION CHAIRS: DIANA KUO & FEROZ PAPA

Kristen Lavelle, German Lab, UCSF - Monogenic Type 1 diabetes: 2 novel candidate genes

Diana Kuo, UC DAVIS - Investigating the systemic benefits of Gc inhibition

Mangyu Choe, Titov Lab, UC BERKELEY - Function of allosteric regulation in regulation of glycolysis

Xian Liu, Anderson Lab, UCSF - M Cells in The Thymus: Extending The Immunological Self-Shadow

Bhushan Kharbikar, Tang Lab, UCSF - Biomimetic platform for Beta Cell Replacement Therapy to Treat T1 Diabetes

6:30 - 7:30

DINNER, SUNSET RESTAURANT

7:30 - 9:30	POSTER SESSION & COCKTAILS, NEW BRIGHTON & LA SELVA ROOMS
	CHAired BY SAGAR BAPAT, AUDREY PARENT & MARTIN VALDEARCOS
9:30 - 11:00	SOCIAL HOUR & GAMES, SANTA CRUZ ROOM
TUESDAY, MARCH 14	
8:30 - 9:30	BREAKFAST, SUNSET RESTAURANT
SESSION 4	THE ENTERIC-NUTRIENT REGULATORY AXIS
9:30 - 10:45	SESSION CHAIRS: DIANA ALBA & ANDREAS STAHL
	George Lemieux, Ashrafi Lab, UCSF - A gut-derived steroid hormone that promotes learning through modulating levels of a neuro-inhibitory metabolite
	Mustafa Ozcam, Lynch Lab, UCSF - Gut Microbial Lysophospholipids Relate to Oral Immunotherapy Responsiveness in Children with Peanut Allergy
	Archana Venkataraman, Ingraham Lab, UCSF - Gut epithelial-nerve circuit drives pain differently in males and females
	Carla Bueno Silva, Bayrer Lab, UCSF - Intestinal LRH-1 and the modulation of Bile Acids metabolism
	Ritwik Datta, Atabai Lab, UCSF - Integrin-mediated regulation of diet-derived lipid droplets in intestinal epithelial cells
10:50 - 11:20	GROUP PHOTO, FOUNTAIN & PERGOLA
SESSION 5	LIPIDS & ADIPOCYTES
11:30 - 12:45	SESSION CHAIRS: ISHA JAIN & DAVID MOORE
	Alyssa Mathiowetz, Olzmann Lab, UC BERKELEY - Hepatocellular determinants of lipid storage and secretion
	Hai Nguyen, Ahituv Lab, UCSF - Adipose modulation transplantation (AMT) suppresses tumor growth providing a novel cancer therapy
	Manish Kumar Sharma, Wang Lab, UCSF - Role of ADAR in adipocyte
	Radha Singh, Feldman Lab, UCSF - Identifying pathways connecting systemic signals to the regulation of adipocyte stem cell activity
	Gunes Parlakgul, Arruda Lab, UC BERKELEY - Impact of fasting and hepatic zonation on liver subcellular architecture
12:45 - 2:00	LUNCH, SUNSET RESTAURANT
SESSION 6	THE GENOME IN METABOLISM & DEVELOPMENT
2:00 - 3:15	SESSION CHAIRS: SHYLAJA SRINIVASAN & MARK HUISING
	Neel Singhal, UCSF - Of Mice and Human (and Squirrel): Probing genomes for metabolic resilience
	Krishna Choudhary, McManus Lab, UCSF - Genome scale optical CRISPR screens
	Updip Kahlon, Aydogan Lab, UCSF - A mitochondrial oxidant acts as a metabolic switch at the onset of morphogenesis
	Federica Liccardo, Irannejad Lab, UCSF - Deconvolution of G protein coupled receptors compartmentalized signaling using spatially restricted small molecules

	Seok Hee Lee, Rinaudo Lab, UCSF - Blastocysts generated by in vitro fertilization show increased Warburg metabolism and altered lactate production
3:15 - 6:30	RECREATIONAL TIME
6:30 - 7:30	DINNER, SUNSET RESTAURANT
7:30 - 8:30	Keynote Address, SANTA CRUZ ROOM
	Introduction by Suneil Koliwad, Dr. Stephen Gitelman
	<i>Altering the course of type 1 diabetes: end of the beginning?</i>
8:30 - 10:30	POSTER SESSION & COCKTAILS, NEW BRIGHTON & LA SELVA ROOMS
10:30 - 1:00	RETREAT PARTY & GAMES, MANRESA ROOM
WEDNESDAY, MARCH 15	
8:00 - 9:00	BREAKFAST, SUNSET RESTAURANT
SESSION 7	BETA CELLS
9:00 - 10:00	SESSION CHAIRS: ALLISON XU & STEPHEN GITELMAN
	Shabrina Amirruddin, Sneddon Lab, UCSF - Vascular niche enhances engraftment and function of stem cell-derived engineered islets
	Yaohuan Zhang, Ku Lab, UCSF - The role of CLIC-like Chloride Channel (Clcc1) in diabetes and beta cell function
	Ryan Hart, Huisung Lab, UC DAVIS - Inhibitory GPCR activation prevents exocytosis by reorganizing filamentous actin in primary beta cells
10:00 - 10:15	BREAK
SESSION 8	STRESS RESPONSES IN AGING & METABOLISM
10:15 - 11:30	SESSION CHAIRS: ANA ARRUDA & MARK ANDERSON
	Yao Wang, Bhushan Lab, UCSF - Restoration of immune surveillance by inhibiting osteoprotegerin in senescence-related diseases
	Frances Lin, Sul Lab, UC BERKELEY - Aging-dependent regulatory cells emerge in subcutaneous fat to inhibit adipogenesis
	Kiyomi Kaneshiro, Kapahi Lab, BUCK INSTITUTE - Glycation lowering compounds blunt ghrelin signaling to reduce food intake and improve insulin sensitivity and extend lifespan
	Ayush Midha, Jain Lab, UCSF - Organ-Specific Fuel Rewiring in the Adaptation to Hypoxia
	Luka Suzuki, Papa Lab, UCSF - Obesity-induced diabetes through a maladaptive UPR
11:30 - 12:00	AWARDS & CONCLUDING REMARKS