



**9th Annual International Conference of Aldosterone and ENaC
in Health and Disease: The Kidney and Beyond**
Estes Park, Colo. • October 2–6, 2019

PRELIMINARY AGENDA

WEDNESDAY, OCTOBER 2, 2019

- 6:00 p.m. – 7:00 p.m. Dinner
- 7:30 p.m. – 8:30 p.m. **Keynote Lecture**
Chair: **Daniela Rotin**, Univ. of Toronto
- Joseph Bonventre**, Harvard Univ.
 Kidney Organoids
- 8:30 p.m. – 10:00 p.m. Welcome Reception

THURSDAY, OCTOBER 3, 2019

- 7:00 a.m. - 8:00 a.m. Breakfast
- 8:00 a.m. - 10:00 a.m. **Symposium 1A: Aldosterone and Mineralocorticoid Receptors in the Kidney and Hypertension**
Chairs: **David Calhoun**, Univ. of Alabama Birmingham, and **Celso Gomez Sanchez**, Univ. of Mississippi
- 8:00 a.m. – 8:30 a.m. **Toshiro Fujita**, Univ. of Tokyo
MR activation by Rac1 in kidney disease
- 8:30 a.m. – 9:00 a.m. **Anand Vaidya**, Brigham and Women’s Hospital
The Expanding Spectrum of Primary Aldosteronism
- 9:00 a.m. – 9:30 a.m. **Peter Fuller**, Hudson Institute of Medical Research
Structural Determinants of Activation of the Mineralocorticoid Receptor: an Evolutionary Perspective
- 2 talks chosen from abstracts
- 10:00 a.m. - 10:30 a.m. Coffee Break
- 10:30 a.m. - 12:00 p.m. **Symposium 1B: Metabolic and Sex Differences in Aldosterone Responses**
Chairs: **Massi Caprio**, IRCCS, and **James Mathew Luther**, Vanderbilt Univ.
- 10:30 a.m. – 11:00 a.m. **Jose Romero**, Brigham and Women’s Hospital
Biological Sex-Specific Differences in the Aldosterone Responses to Angiotensin II in Humans and Rodents

- 11:00 a.m. – 11:30 a.m. **Eric Belin de Chantemèle**, Augusta Univ.
The Leptin-Aldosterone-Mineralocorticoid Receptor axis: a major contributor to cardiovascular disease in obese females
- 2 talks chosen from abstracts
- 12:00 p.m. - 1:00 p.m. Lunch
- 1:00 p.m. - 3:00 p.m.** **Symposium 2A: Structure Function of ENaC and Related Transporters**
Chairs: **Peter Snyder**, Univ. of Iowa, and **Bernard Rossier**, Univ. of Lausanne
- 1:00 p.m. – 1:30 p.m. **Isabelle Baconguis**, Oregon Health Science Univ.
ENaC structure by cryo-electron microscopy
- 1:30 p.m. – 2:00 p.m. **Ossama Kashlan**, Univ. of Pittsburgh
ENaC regulation by biliary factors in urine
- 3 talks chosen from abstracts
- 3:00 p.m. - 3:30 p.m. Coffee Break
- 3:30 p.m. - 5:00 p.m.** **Symposium 2B: ENaC Function and Regulation in Tissues**
Chairs: **Larry Palmer**, Cornell Univ., and **Edith Hummler**, Lausanne Univ.
- 3:30 p.m. – 4:00 p.m. **Tom Kleyman**, Univ. of Pittsburgh
ENaC regulation by the extracellular environment
- 4:00 p.m. – 4:30 p.m. **Christoph Korbmacher**, Univ. of Erlangen
ENaC regulation by aldosterone and proteases
- 2 talks chosen from abstracts
- 6:00 p.m. – 7:00 p.m. Dinner
- 7:00 p.m. – 9:30 p.m.** **Poster Session 1**

Friday, October 4, 2019

- 7:00 a.m. - 8:00 a.m. Breakfast
- 8:00 a.m.-10:00 a.m.** **Symposium 3A: Signaling and Regulation of ENaC and Other Epithelial Channels/Transporters I**
Chairs: **Doug Eaton**, Emory Univ., and **Alicia McDonough**, USC
- 8:00 a.m. – 8:30 a.m. **David Pearce**, UCSF
ENaC Regulation by the mTORC2/SGK1 pathway
- 8:30 a.m. – 9:00 a.m. **Michael Butterworth**, Univ. of Pittsburgh
Role of microRNAs in aldosterone signaling and ENaC regulation

- 9:00 a.m. – 9:30 a.m. **Kenneth Hallows, USC**
Metabolic regulation of ENaC by AMPK and β 1Pix

2 talks chosen from abstracts
- 10:00 a.m. - 10:30 a.m. Coffee Break
- 10:30 a.m. - 12:00 p.m. **Symposium 3B: Signaling and Regulation of ENaC and Other Epithelial Channels/Transporters II**
Chairs: **Alexander Staruschenko**, Medical College of Wisconsin, and **Jim Stockand**, Univ. of Texas, San Antonio
- 10:30 a.m. – 11:00 a.m. **Arohan Subramanya**, Univ. of Pittsburgh
WNK kinases and cell volume regulation
- 11:00 a.m. – 11:30 a.m. **Robert Tarran**, Univ. of North Carolina
SPLUNC1 and new clinical trials for CF treatment

2 talks chosen from abstracts
- 12:00 p.m. - 1:00 p.m. Lunch
- 1:00 p.m.-3:00 p.m. **Symposium 4A: ENaC Biogenesis and Trafficking**
Chairs: **Daniela Rotin**, Univ. of Toronto
- 1:00 p.m. – 1:30 p.m. **Vivek Bhalla**, Stanford
Metabolic syndrome and ENaC trafficking
- 1:30 p.m. – 2:00 p.m. **Olivier Staub**, Univ. of Lausanne
Regulation of renal sodium transport by ubiquitination
- 2:00 p.m. – 2:30 p.m. **Theresa Buck**, Univ. of Pittsburgh
ENaC Processing at the ER

2 talks chosen from abstracts
- 3:00 p.m. - 5:00 p.m. **APS Career Development Workshop/Hike**
The purpose of the workshop/hike is to provide career advice from senior investigators to junior faculty, post-doctoral fellows, and students on areas including grant writing, academic promotion, manuscript writing, mentorship, and other faculty activities.
- 6:00 p.m. - 7:00 p.m. Dinner
- 7:00 p.m. -9:30 p.m. **Poster Session 2**

Saturday, October 5, 2019

- 7:00 a.m. -8:00 a.m. Breakfast
- 8:00 a.m. -10:00 a.m. **Symposium 5A: MR in the Vasculature**
Chairs: **Frederic Jaisser**, INSERM, and **Iris Jaffe**, Tufts Medical Center

- 8:00 a.m. – 8:30 a.m. **Anna Davel**, Univ. of Campinas
Sex-specific mechanisms of resistance vessel endothelial dysfunction induced by cardiometabolic risk factors
- 8:30 a.m. – 9:00 a.m. **Jennifer Dupont**, Tufts Medical Center
Sex differences in the role of smooth muscle cell MR in vascular aging

3 talks chosen from abstracts
- 10:00 a.m. - 10:30 a.m. Coffee Break
- 10:30 a.m. - 12:00 p.m. **Symposium 5B: MR in the Heart**
Chairs: **Gail Adler**, Brigham and Women’s Hospital, and **Shawn Bender**, Univ. of Missouri
- 10:30 a.m. – 11:00 a.m. **Guanghong Jia**, Univ. of Missouri
Enhanced endothelium epithelial sodium channel signaling prompts left ventricular diastolic dysfunction in obese female mice
- 11:00 a.m. – 11:30 a.m. **TBA**
Deoxycorticosterone/salt-mediated cardiac inflammation and fibrosis are dependent on functional CLOCK signaling

2 talks chosen from abstracts
- 12:00 p.m. - 1:00 p.m. Lunch
- 1:30 p.m. - 2:30 p.m. **Clinical Plenary Lecture**
Chair: **Maria-Christina Zennaro**, Paris Cardiovascular Research Center

Bertram Pitt, Univ. of Michigan
The role of non-steroidal MR antagonists and new potassium binders for the treatment of cardiovascular disease
- 2:30 p.m. - 6:00 p.m. Free time
- 6:00 p.m. - 9:00 p.m. **APS Banquet and Awards Presentation**

Sunday, October 6, 2019

- 7:00 a.m. - 8:00 a.m. Breakfast
- 8:00 a.m.-10:00 a.m. **Symposium 6A: Normal and Pathogenic Regulation of Aldosterone Biosynthesis**
Chairs: **Eleanor Davies**, Univ. of Glasgow, and **Jun Yang**, Monash Univ.
- 8:00 a.m. – 8:30 a.m. **William Rainey**, Univ. of Michigan
Aging related autonomous aldosteronism
- 8:30 a.m. – 9:00 a.m. **Fabio Fernandes-Rosa**, Paris Cardiovascular Research Center
A gain of function mutation in CLCN2 chloride channel gene causes primary aldosteronism

3 talks chosen from abstracts

10:00 a.m. -10:30 a.m.

Coffee Break

10:30 a.m. - 12:00 p.m.

Symposium 6B: Integrated Regulation of Renal Ion Transport

Chairs: **David Ellison**, Oregon Health Science Univ., and **Johannes Loffing**, Univ. of Zurich

10:30 a.m. – 11:00 a.m.

My Helm, Univ. of Utah

ENaC regulation by oxidized glutathione

11:00 a.m. – 11:30 a.m.

James McCormick, Oregon Health Science Univ.

Differential regulation of renal ion transport and blood pressure by SPAK isoforms

11:30 a.m. – 12:00 p.m.

Aylin Rodan, Univ. of Utah.

WNK regulation of ion transport in the Malpighian tubule

1 talk chosen from abstract

Conclusion