

# 10<sup>th</sup> Annual Acute Kidney Injury Symposium

Thursday, October 29, 2020

9:00am – 3:30pm

Virtual Conference



## Planning Committee

John A. Kellum, MD	Center for Critical Care Nephrology, Dept of Critical Care Medicine
Thomas R. Kleyman, MD	Pittsburgh Center for Kidney Research – O'Brien Center Renal-Electrolyte Division, Department of Medicine
Fadi G. Lakkis, MD	Thomas E. Starzl Transplantation Institute, Department of Surgery
Carlton Bates, MD	Children's Hospital of Pittsburgh, Division of Nephrology

Purpose: To continue to foster across campus research collaboration on acute kidney injury and further AKI awareness, education and advocacy.

9:00-9:05am **Welcome** Drs. Bates, Kellum, Kleyman and Lakkis

## Session I Scientific Presentations

9:05-9:20	Renal Metabolic Reprogramming and Microvascular Dysfunction Frame the Development of Sepsis-induced AKI	Hernando Gómez
9:20-9:35	Is There an Association Between Net Ultrafiltration Rate and Outcomes in Critically Ill Patients with Acute Kidney Injury?	Raghavan Murugan
9:35-9:50	Extracellular Heme: An Emerging Threat to the Kidneys in Sickle Cell Disease	Samit Ghosh
9:50-10:05	Use of Super-resolution Ultrasound to Examine Microvascular Rarefaction in Real Time	Roderick Tan
10:05-10:20	Generation of a Human Kidney Organoid Model of Acute Kidney Injury	Neil Hukriede
10:20-10:35	Discussion/Moderator (Questions via Zoom Q&A feature)	Tom Kleyman

## Session 2 Abstract Presentations (6min talk/4min Questions via Zoom Q&A feature) No CME credit awarded

10:35-10:40	Introduction	Fadi Lakkis
10:40-10:50	Association Between Exposure to Metformin During Hospitalization and Mortality in Septic Adult Patients with Type 2 Diabetes Mellitus	Gaspar Del Rio
10:50-11:00	Loss of the Molecular Chaperone GRP170 in the Mouse Nephron Results in AKI and Activates the Unfolded Protein Response (UPR)	Aiden Porter
11:00-11:10	Microcirculatory Dysfunction in Sepsis-Associated Acute Kidney Injury is not Synonym of Decreased Oxygen Delivery	Carlos Manrique
11:10-11:20	Classification of Sepsis-Associated Acute Kidney Injury using Markers of Function and Stress	Luca Molinari
11:20-11:30	HIF-1 Activity During Recovery After Mild to Severe Ischemia	Corry Bondi

11:30am-12:00pm **Abstract Voting/Lunch Break**

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**Session 3**

**Keynote Speakers**

	Introduction of Dr. Kathleen Liu from UCSF	John Kellum
12:00-12:30	Fluid Overload and AKI	Kathleen Liu
12:30-12:40	Questions via Zoom Q&A feature	John Kellum
	Introduction of Dr. David Askenazi from UAB	Carl Bates
12:40–1:10	Improving Outcomes in AKI: What Do Neonatal Studies Teach Us?	David Askenazi
1:10-1:20	Questions via Zoom Q&A feature	Carl Bates

1:20-1:25

**Announcement of Abstract Awards**

**Session 4**

**Scientific Presentations**

1:25-1:40	Sirtuin 5 and AKI	Sunder Sims-Lucas
1:40-1:55	Micro RNAs and AKI	Jackie Ho
1:55-2:10	Association of AKI and Development of Sepsis in Pediatric Critically Ill Patients	Cassandra Formeck
2:10-2:25	Kynurenine-derived Electrophiles: Potential Reno-protective Mediators in Sickle Cell Disease	Dario Vitturi
2:25-2:40	Discussion/Moderator (Questions via Zoom Q&A feature)	Carl Bates

**Session 5**

**COVID**

2:40-2:50	AKI in COVID-19; Results of ADQI 25	John Kellum
2:50-3:00	Multicenter Study of AKI in Critically Ill Patients with COVID-19	Amar Bansal
3:00-3:10	Case of Collapsing Glomerulopathy and Pathologic Findings in COVID 19 in New York City	Syeda Ahmed
3:10-3:30	Panel Discussion	John Kellum, Amar Bansal, Syeda Ahmed
	Discussion/Moderator (Questions via Zoom Q&A feature)	Paul Palevsky

3:30

**Adjourn**

### **Program Overview, Learning Objectives, Target Audience**

This symposium will promote the clinical knowledge related to diagnosis and personalized treatment of acute kidney injury (AKI). It will help to improve the care of critically ill patients who develop or are at risk for AKI. It will also promote communication and collaboration among experts and specialists treating and researching acute kidney injury. The understanding of AKI and the effective strategies for developing, implementing, and performing protocols for managing the condition will be enhanced. The symposium is targeted for doctors, fellows, researchers, and professionals in the medical and research fields of critical care medicine, transplantation, nephrology, and the renal-electrolyte division. The symposium also serves as a platform to spread kidney awareness and to educate and share resources with patients and the community.

### **Faculty Listing**

1. Syeda Behjat Ahmed, MD – University of Pittsburgh; Department of Medicine, Renal-Electrolyte Division, Assistant Professor of Medicine; Pittsburgh, PA
2. David Askenazi, MD, MSPH – Children's of Alabama; Division of Nephrology, Professor/Director, Pediatric and Infant Center for Acute Nephrology; Birmingham, AL
3. Amar Bansal, MD – University of Pittsburgh; Department of Medicine, Renal-Electrolyte Division and Section of Palliative Care and Ethics, Assistant Professor of Medicine; Pittsburgh, PA
4. Carlton Bates, MD – University of Pittsburgh; Chief, Division of Nephrology; Children's Hospital of Pittsburgh of UPMC; Pittsburgh, PA
5. Michele Elder, RN, BSN - University of Pittsburgh; Center for Critical Care Nephrology, Operations Manager; Pittsburgh, PA
6. Cassandra Formeck, MD, MS – University of Pittsburgh; Department of Pediatrics, Instructor of Pediatrics, Pittsburgh, PA
7. Samit Ghosh, PhD – University of Pittsburgh; Vascular Medicine Institute, Research Assistant Professor of Medicine; Pittsburgh PA
8. Hernando Gómez, MD, MPH – University of Pittsburgh; Assistant Professor, Department of Critical Care Medicine, Center for Critical Care Nephrology; Pittsburgh, PA
9. Jacqueline Ho, MD, MSc – University of Pittsburgh; Department of Pediatrics, Associate Professor of Pediatrics; Pittsburgh, PA
10. Neil Hukriede, PhD – University of Pittsburgh; Professor and Vice-Chair Department of Developmental Biology; Pittsburgh, PA
11. John Kellum, MD, MCCM – University of Pittsburgh; Department of Critical Care Medicine, Professor of Critical Care Medicine, Medicine, Bioengineering, and Clinical & Translational Science, Vice Chair for Research, Director of the Center for Critical Care Nephrology; Pittsburgh, PA

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12. Thomas Kleyman, MD – University of Pittsburgh; Chief, Renal-Electrolyte Division; Professor of Cell Biology, Professor of Pharmacology and Chemical Biology; Pittsburgh, PA
13. Fadi Lakkis, MD – University of Pittsburgh; Frank and Athena Sarris Chair in Transplantation Biology; Professor of Surgery, Immunology, and Medicine; Scientific Director, Thomas E. Starzl Transplantation Institute; Pittsburgh, PA
14. Kathleen Liu, MD, PhD – University of California, San Francisco; Departments of Medicine and Anesthesia, Professor in Residence; San Francisco, CA
15. Carmela Londino, MBA, MS – University of Pittsburgh; Department of Medicine, Program Administrator, Renal-Electrolyte Division; Pittsburgh, PA
16. Brandon McLaughlin, BA – University of Pittsburgh, Department of Critical Care Medicine, Academic Coordinator; Pittsburgh, PA
17. Raghavan Murugan, MD, MS – University of Pittsburgh; Department of Critical Care Medicine, Center for Critical Care Nephrology, and CRISMA Center, Associate Professor of Critical Care Medicine and Clinical & Translational Science; Pittsburgh, PA
18. Amy Nye, BS – University of Pittsburgh, Thomas E. Starzl Transplantation Institute, Executive Administrator; Pittsburgh, PA
19. Wendy O'Donnell, MSPR, University of Pittsburgh; Department of Critical Care Medicine, Director of Communications; Pittsburgh, PA
20. Paul Palevsky, MD – University of Pittsburgh; Professor of Medicine, Renal-Electrolyte Division, Chief, Renal Section VA Pittsburgh Healthcare System; Pittsburgh, PA
21. Sunder Sims-Lucas, PhD – University of Pittsburgh; Department of Pediatrics, Assistant Professor of Pediatrics; Pittsburgh, PA
22. Roderick Tan, MD, PhD – University of Pittsburgh; Department of Medicine, Renal-Electrolyte Division, Assistant Professor; Pittsburgh, PA
23. Dario Vitturi, PhD – University of Pittsburgh; Department of Pharmacology and Chemical Biology, Research Assistant Professor; Pittsburgh, PA

### CME Accreditation and Designation Statement

In support of improving patient care, the University of Pittsburgh is jointly accredited by the Accreditation Council for Continuing Medical Education (ACCME) and the Accreditation Council for Pharmacy Education (ACPE), and the American Nurses Credentialing Center (ANCC), to provide continuing education for the healthcare team.

#### Physicians

The University of Pittsburgh School of Medicine designates this virtual activity for a maximum of 5.0 *AMA PRA Category 1 Credits*<sup>TM</sup>. Physicians should only claim credit commensurate with the extent of their participation in the activity.

#### Nursing (CNE)

The maximum number of hours awarded for this Continuing Nursing Education activity is 5.0 contact hours.

#### Other health care professionals

Other health care professionals will receive a certificate of attendance confirming the number of contact hours commensurate with the extent of participation in this activity.

### **Disclaimer Statement**

The information presented at this CME program represents the views and opinions of the individual presenters, and does not constitute the opinion or endorsement of, or promotion by, the UPMC Center for Continuing Education in the Health Sciences, UPMC/University of Pittsburgh Medical Center or Affiliate and University of Pittsburgh School of Medicine. Reasonable efforts have been taken intending for educational subject matter to be presented in a balanced, unbiased fashion and in compliance with regulatory requirements. However, each program attendee must always use his/her own personal and professional judgement when considering further application of this information, particularly as it may relate to patient diagnostic or treatment decisions including, without limitation, FDA-approved uses and any off-label uses.

### **Faculty Disclosure**

All individuals in a position to control the content of this education activity including members of the planning committee, speakers, presenters, authors, and/or content reviewers have disclosed all relevant financial relationships with any entity producing, marketing, re-selling, or distributing health care goods or services, used on, or consumed by, patients.

The following relevant financial relationships were disclosed:

1. David Askenazi – Consultant: Baxter, CHF Solutions, Medtronic, Bioporto, AKI Foundation; Grant/Research Support: Baxter, CHF Solutions, NIH
2. Hernando Gómez – Grant/Research Support: TES Pharma, Department of Defense
3. John Kellum – Grant/Research Support: Astute Medical, bioMerieux, Baxter; Consultant: Astute Medical, bioMerieux, Baxter
4. Raghavan Murugan – Grant/Research Support: NIH, La Jolla
5. Roderick Tan – Grant/Research Support: American Society of Nephrology

No other planners, members of the planning committee, speakers, presenters, authors, content reviewers and/or anyone else in a position to control the content of this education activity have relevant financial relationships to disclose.

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