

---

**Wednesday, September 16, 2020**

---

**11:50 a.m. – 12:00 p.m.** Opening Remarks (Alexander Kabanov, Ph.D., Dr.Sc., UNC-CH)

---

## **Advanced Technologies for Drug Delivery**

Chairs: Samir Mitragotri, Ph.D., *Harvard University*; Juliane Nguyen, Ph.D., *UNC-CH*.

**12:00 – 12:30 p.m.** From Microtechnology to Nanotechnology: New Ways to Discover and Deliver Medicine to Treat Disease (*Robert Langer, Sc.D., David H. Koch Institute Professor, Department of Chemical Engineering, Department of Biological Engineering, Massachusetts Institute of Technology*).

**12:30 – 1:00 p.m.** Device Assisted Drug and Vaccine Delivery (*Joseph M. DeSimone, Ph.D., Professor, Department of Radiology and the Molecular Imaging Program, Stanford University School of Medicine; Professor, Department of Chemical Engineering, Stanford University School of Engineering; Professor, Stanford University Graduate School of Business, by Courtesy*).

---

## **Power Hour: Diversity in Nanomedicine**

Chair: Joseph DeSimone, Ph.D., *Stanford University*.

**1:00 – 2:00 p.m.** Christine Allen, Ph.D., *Professor, Associate Vice-President and Vice-Provost, Strategic Initiatives, University of Toronto*.  
Cathleen Crudden, Ph.D., *Allie Douglas Distinguished Research Professor, Department of Chemistry, Canada Research Chair (Tier 1), Metal Organic Chemistry, Queen's University, Canada; Research Professor, Institute of Transformative Bio-Molecules, Nagoya University, Japan*.  
Tyrone Porter, Ph.D., *Professor, Myron L. Begeman Fellowship in Engineering, Department of Biomedical Engineering, The University of Texas at Austin*.  
Elizabeth Wayne, Ph.D., *Assistant Professor, Department of Biomedical Engineering, Department of Chemical Engineering, Carnegie Mellon University*.

---

---

**Wednesday, September 16, 2020**

---

**Vaccines and Therapeutics for COVID-19**

Chairs: Kristy Ainslie, Ph.D., *UNC-CH*; Gaurav Sahay, Ph.D., *Oregon State University*.

**2:00 – 2:30 p.m.**                      Pandemic Preparedness and the Design and Development of Broad Spectrum Coronavirus Drugs (*Ralph Baric, Ph.D., William R. Kenan, Jr. Distinguished Professor, Department of Epidemiology; Professor, Department of Microbiology and Immunology, UNC-CH*).

**2:30 – 3:00 p.m.**                      Optimization of Lipid Nanoparticles for Intramuscular Delivery of mRNA Vaccines (*Kimberly Hassett, Ph.D., Senior Scientist, Formulation Science, Moderna Therapeutics, MA*).

**3:00 – 3:30 p.m.**                      Remdesivir: Broad-Spectrum Antiviral for the Treatment of COVID-19 (*Tomas Cihlar, Ph.D., Vice President of Virology, Gilead Sciences, CA*).

---

**3:30 – 3:35 p.m.**                      **Break**

---

**Power Hour: Research Funding for Nanomedicine**

Chairs: Omid Veisheh, Ph.D., *Rice University*; Kathryn Whitehead, Ph.D., *Carnegie Mellon University*.

**3:35 – 4:35 p.m.**                      Leslie Itsara, Ph.D., *Scientific Review Officer, Gene and Drug Delivery Systems, Center for Scientific Review, NIH*.  
Luisa Russell, Ph.D., *Program Director, Biochemical Engineering and Biomimetic Systems, Division of Discovery Science & Technology (Bioengineering), NIBIB*.  
Daniel Siegwart, Ph.D., *Associate Professor, Department of Biochemistry, The University of Texas Southwestern Medical Center*.  
Hok Hei Tam, Ph.D., *Senior Associate, Flagship Pioneering, MA*.

---