

# Image-Based Profiling: A Powerful and Challenging New Data Type

Monday January 3, 2022

Plaza Ballroom

1:30 - 4:30 PM

Organizers:

Gregory P. Way, Hannah Spitzer, Philip Burnham, Arjun Raj,  
Fabian Theis, Shantanu Singh, Anne E. Carpenter

1:30 - 1:40

**Welcome**

Gregory P. Way  
University of Colorado Anschutz

1:40 - 2:00

**Introduction to image-based profiling**

Niranj Chandrasekaran  
Broad Institute of Harvard and MIT

2:00 - 2:20

**Image-based cell phenotyping with deep learning**

Juan C. Caicedo  
Broad Institute of Harvard and MIT

2:20 - 2:40

**Challenges and opportunities in the analysis of image-based profiling data**

Paula Andrea Marin Zapata  
Bayer

2:40 - 2:55

**Break**

2:55 - 3:15

**Mapping biology with a unified representation space for genomic and chemical perturbations to enable accelerated drug discovery**

Imran Haque  
Recursion

3:15 - 3:35

**Integrated intracellular organization and reorganization of the human stem cell**

Susanne Rafelski  
Allen Institute for Cell Science

3:35 - 4:05

**Lightning talks**

5 selected speakers, 6 minutes each

4:05 - 4:30

**Panel discussion**

All invited speakers