Regional Core Facility Technology Forum at Yale West Campus May 30, 2019 West Campus Conference Center Event Rooms A and B, 800 West Campus Drive, West Haven, CT 06516

Registration and Breakfast:

8:00-9:00 AM 800 West Campus Drive, West Haven, CT **Technical Talks:**

9:00-12:00 noon; (800 West Campus Drive, Room varies by section)

Session 1: Material Characterization

Auditorium, 800 West Campus Drive Coordinators: Min Li and Lei Wang

> On the Cutting Edge: The Thermo Fisher Scientific Helios G4 UX DualBeam Rick Passey, *SEM/DualBeam Product and Application Specialist* **Thermo Fisher Scientific**

High Performance S/TEM in a Modern Research Laboratory, Recent Advances and Capabilities Jan Ringnalda, *Thermo Fisher Scientific S/TEM Product and Application Specialist* **Thermo Fisher Scientific**

White Light Interferometry at Yale West Campus Nate Gilfoy, PhD, *Senior Application Engineer* **Zygo-Ametek Corporation**

Session 2: Imaging Workshop

Room 220, 800 West Campus Drive Coordinator: Joerg Nikolaus

> SP8 Super-Resolution Bootcamp: No Organelle Left Behind! Albert Ayoub, PhD, *Confocal Specialist - Life Science Division* Leica Microsystems

Session 3: Metabolomics Workshop

Room 208, 800 West Campus Drive Coordinator: Terence Wu

> Agilent hardware and software tools for metabolomics Dr. Charmion Cruikshank-Quinn, PhD, *Application Scientist* **Agilent Technologies, Inc.**

Putting metabolism in context: combining direct measurement of biochemical state with genetic and nutritional manipulation to uncover new biology Adam Rosebrock, PhD, *Assistant Professor, Department of Pathology* **Stony Brook University**

Session 4: Bioanalytical Techniques

Room 218, 800 West Campus Drive Coordinator: Ken Nelson

Imaging Mass Spectrometry for Spatially Resolved Direct Molecular Analysis including Metabolomics and Tissue Differentiation.

Roy Martin, PhD, Senior Field Marketing Manager, Biological Mass Spectrometry Waters

Precision Mass Spectrometry Technology Drives Precision Medicine Emily Chen, PhD, *Senior Director of Thermo Fisher Precision Medicine Center* **Thermo Fisher Scientific**

New Insights for Multicolor Panel Design Ana Teixeira, *Research Applications Scientist* **BD Biosciences**

Session 5: Genomic Analysis

Event Room A, 800 West Campus Drive Coordinator: Amy Blanchard

> Harnessing Multiomic Data in Single Cells for Discovery Margaret Nakamoto, PhD, *Senior Scientist, Single Cell Multiomics* **BD Biosciences**

Introduction to Agilent CRISPR-Cas9 and NGS Targeted RNA-seq Capture Technology for Discovery Raymond DiDonato, PhD, *Product Specialist* **Agilent Technologies, Inc.**

Next Generation Sequencing Current and Upcoming Trends Kimberly Troutman, Sr. Field Applications Scientist GE Healthcare Genomics & Diagnostics Solutions

Lunch:

12:00 noon -12:55 PM Event Rooms A and B, 800 West Campus Drive

Keynote Lecture:

Core Facilities and Yale's Science Priorities

1:00-1:45 PM Event Rooms A and B, 800 West Campus Drive Lisa D' Angelo, PhD *Assistant Provost for Research, Yale University*

Panel on Funding Core Instrumentation with Grants: Successes and Lessons Learned

Moderator: Janie Merkel, PhD, *Director, Yale Center for Molecular Discovery, Yale University* 1:50-2:40 PM Event Rooms A and B, 800 West Campus Drive

Panelists:

- TuKiet Lam, PhD, Yale University, Director of Yale/Keck Mass Spectrometry & Proteomics Resource; Director of Proteomics Core of Yale/NIDA Neuroproteomics Center
- Sibel Ebru Yalcin, PhD, Yale University, Associate Research Scientist, Molecular Biophysics and Biochemistry and Facility Director of NSF-MIP Program
- Chris O'Connell, PhD, University of Connecticut (Storrs), Director of Advanced Light Microscopy Facility
- Corey O'Hern, PhD, Yale University, Professor of Mechanical Engineering & Materials Science, Physics, Applied Physics & Graduate Program in Computational Biology & Bioinformatics
- Michelle Personick, PhD, Wesleyan University, Assistant Professor of Chemistry and Integrative Sciences
- Jillian Smith-Carpenter, PhD, Fairfield University, Assistant Professor of Chemistry and Biochemistry
- Michael Nathanson, MD, PhD, Yale University, Gladys Phillips Crofoot Professor of Medicine (Digestive Diseases) and Professor of Cell Biology; Director, Yale Liver Center; Director, Center for Cell and Molecular Imaging

Panel Discussion: Academia-Industry Collaboration in Cores

Moderator: Lisa D'Angelo, PhD, Assistant Provost for Research, Yale University

2:45-3:30 PM Event Rooms A and B, 800 West Campus Drive

Panelists:

- Andrew Vinard; UMass Amherst, Director, IALS Core Facilities
- Chris Incarvito, PhD, Yale University, Director of Research Operations & Technology
- Jen Waters, PhD; Harvard Medical School, Director, Nikon Imaging Center
- Brandon Mercado, PhD, Yale University, X-Ray Crystallography CBIC

Note of Thanks

Mousumi Ghosh, PhD, *Director, West Campus Analytical Core,* Yale University

Poster Session and Networking:

3:30-5:30 PM EVENT Rooms A and B, 800 West Campus Drive