



Advanced Photon Source

## 79<sup>th</sup> Pittsburgh Diffraction Conference

### Hosts:

Uta Ruett

[uruett@anl.gov](mailto:uruett@anl.gov)

John Rose

[jprose@uga.edu](mailto:jprose@uga.edu)

Lynnean Celmer

[lcelmer@anl.gov](mailto:lcelmer@anl.gov)

### Chairs/Organizers:

Uta Ruett

John Rose

Aina Cohen

Olaf Borkiewicz

Bob Fischetti

Wenqian Xu

Brent Nannenga

Andrey Yakovenko

Angus Wilkinson

Cora Lind-Kovacs

Kevin Stone

Stephan Hruszkewycz

Matthias Zeller

Allen Oliver

Leighton Coates

Chuck Luke

Silvia Russi

Charles Lake

### October 2-4, 2022, 79<sup>th</sup> Pittsburgh Diffraction Conference

The annual Pittsburgh Diffraction Conference will be hosted by the Advanced Photon Source (APS) at Argonne National Laboratory.

The conference will discuss progress in fundamental and applied diffraction and crystallographic research, ranging from materials discovery for functional devices to targeting viruses for drug development.

### Tentative Agenda

The plenary sessions will address the APS Upgrade, advances in electron microscopy, and a look at upcoming developments. Separate sessions in materials- and biology-related topics will be held on AI assisted research, automation and autonomous experiments, serial crystallography, room temperature MX diffraction, total scattering in bulk and thin films, Covid related research, and in situ and operando structural science for clean energy.

### Awards

The Chung Soo Yoo award, established by the Pittsburgh Diffraction Society to honor Dr. Yoo's memory, will give a \$400 cash prize to the graduate students who best present their poster in the fields of materials and biological research.

A truly outstanding scientist within six years of earning their Ph.D. (or equivalent) with contributions to crystallography and/or diffraction may be honored with the Sidhu award and its cash prize. If you want to nominate a candidate for the Sidhu award, please [review the nomination process](#) and reach out to John Rose ([jprose@uga.edu](mailto:jprose@uga.edu)).

### Registration

starting May 2022

### Satellite event

After the conference on Wednesday October 5<sup>th</sup>, the Structural Science group at the APS will [conduct a school](#) on basic and advanced data analysis methods of powder X-ray diffraction (XRD) and total scattering for pair distribution function (PDF) analysis of inorganic materials.

For additional information, visit the APS event announcement or contact Wenqian Xu [wenqianxu@anl.gov](mailto:wenqianxu@anl.gov).