

PREFACE TO THE ICALEPCS'25 CONFERENCE PROCEEDINGS

STATEMENT FROM CONFERENCE CO-CHAIRS

On behalf of the organizing committee, we were pleased to welcome attendees from all over the world to the 20th International Conference on Accelerator and Large Experimental Physics Control Systems, ICALEPCS'25.

This series of conferences facilitates fruitful collaborations among the world's control system specialists from major scientific installations and industries, such as particle accelerators, light sources, laser facilities, telescopes, tokamaks, and others. The series of ICALEPCS conferences started in 1987 in Villars-sur-Ollon (Switzerland), hosted by CERN. The conferences subsequently rotated between three major areas of the world: America (including North, Central and South America), Asia (including Oceania) and EMEA (Europe including Russia, the Middle East and Africa). Over the years the conferences have seen a growing number of participants, institutions, and countries.

With the help of the International Scientific Advisory Committee (ISAC), a vibrant and varied program was assembled. Attendees enjoyed opportunities to meet with other experts from around the world, interacting and building new collaborations. We welcomed new faces as well as those we know from past conferences, coming to share ideas and learning new things.

ICALEPCS'25 was hosted by Argonne National Laboratory (ANL), home to the Advanced Photon Source (APS), the world-class particle accelerator which is finishing its major renovation. Argonne is a multipurpose research institution funded primarily by the U.S. Department of Energy's Office of Science.

The ICALEPCS series has a storied history, and this conference was structured to welcome newcomers and students to our community. The conference fostered an open forum for discussions, and provided avenues for students to be greater participants in the conference.

We would like to express our deepest gratitude to all our sponsors. Your generous support was instrumental in making our conference a success, and we are truly thankful for your contributions. We also want to share our heartfelt appreciation for Editor-in-Chief Dr. Kent Wootton and his wonderful editorial team (Jeffery Biss, Gustavo Bruno, Kelly Jaje, Jeff Kirchman, Denise Skiadopoulos, SuYin Grass Wang). Dr. Wootton's unwavering dedication and thoughtful leadership, along with the hard work of his team, ensured that the proceedings were completed efficiently, successfully, and to a high standard.

Conference Co-Chairs:

Guobao Shen (ANL)

Joseph Sullivan (ANL)

FOREWORD TO THE PROCEEDINGS

The ICALEPCS'25 program included:

- 11 focused control system workshops,
- 5 invited keynote presentations,
- 127 contributed oral presentations,
- 89 mini-orals,
- 3 Speaker's Corner live demonstrations, and
- 300 poster presentations.

Authors submitted 390 papers and 221 sets of presentation slides for inclusion in the proceedings.

Kent Wootton thanks the International Scientific Advisory Committee led by Oscar Matilla for their work performing quality assurance of author's submitted abstracts. Kent Wootton especially thanks Karen White and Martin Pieck for their unwavering and thorough commitment to program the conference sessions.

We thank the Editorial Team for their diligent editing of the papers and presentations and the JACoW Collaboration for assistance producing the final proceedings.

Editor-in-Chief:

Kent Wootton (ANL)