# The 31<sup>st</sup> International Conference on Parallel and Distributed Systems



Hefei, China December 14 - 18, 2025
Ubiquitous Computing for Global Communities

### **Call for Papers**

## AIGC & Multi-Agent Parallel Computing

#### **Track Co-Chairs**

- Liang Lin, Sun Yat-sen University, China, linliang@ieee.org
- Jufeng Yang, Nankai University, China, yangjufeng@nankai.edu.cn
- Yang Liu, Sun Yat-sen University, China, liuy856@mail.sysu.edu.cn
- Zhouxia Wang, Nanyang Technological University, Singapore, zhouzi1212@gmail.com

#### **Scope and Motivation**

The AIGC & Multi-Agent Parallel Computing Track aims to serve as an international forum for experts, researchers, and practitioners from academia, industry, and government to exchange new ideas and results on research and development, as well as to promote and accelerate standardization, applications, and real-world deployment. As AI-generated content (AIGC) rapidly evolves—powering breakthroughs from multimodal generation to industrial metaverses—and multi-agent systems advance to solve distributed real-world challenges, the convergence of these fields demands scalable parallel computing frameworks to overcome critical bottlenecks in efficiency, collaboration, and embodied agents.

#### **Topics of Interest**

Our track seeks original contributions in the following topical areas, plus others that are not explicitly listed but are closely related:

- Training/inference for LLMs, diffusion models, and multimodal generators
- Distributed training/inference optimization for large generative models
- Parallel decision-making and communication in large-scale agent collectives
- Parallel perception-decision-action architectures for embodied agents
- Physical scene understanding and action simulation using multimodal generative models
- Collaborative task execution in embodied agent swarms (e.g., multi-robot systems)
- Distributed trust verification in multi-agent systems
- Real-time physical simulation and generation in industrial metaverses
- Edge-cloud collaborative platforms for embodied intelligence

#### **Important Dates**

Paper Submission: 2025-08-15

**Notification: 2025-10-01** 

Camera Ready and Registration: 2025-10-15

#### **How to Submit a Paper**

Each submission should include the authors' names, affiliations, an abstract, and 5–10 keywords. Papers are limited to 8 pages, including figures and references. Up to two additional pages may be included with an overlength charge. Full instructions on how to submit papers are provided on the IEEE ICPADS 2025 website: http://ieee-icpads.org.cn/CFP-research-paper.html