













Important Dates

Submission Deadline for Proceeding Track: Aug 28, 2023
Submission Deadline for Recent Spotlight Track: Oct 10, 2023
Final Decisions Released: Nov 20, 2023
Camera Ready Deadline: Dec 5, 2023
Main Conference Date: Jan 3-6, 2024

Overview

- The Conference on Parsimony and Learning (CPAL) is an annual research conference focused on addressing the parsimonious, low dimensional structures that prevail in machine learning, signal processing, optimization, and beyond.
- We envision the conference as a general forum where researchers in machine learning, applied mathematics, signal processing, optimization, hardware & systems, and all associated science and engineering applications can gather, share insights, and ultimately work towards a common data-centric understanding of modern parsimonious learning frameworks.

Topics of interest

- Models and Algorithms: parsimonious training and inference algorithms for deep networks; compact and efficient neural network architecture design; robust model; interpretability; generative models; distributed and federated learning; etc.
- **Data:** modern signal models; dataset parsimony; representation learning with structured data; etc.
- Theory: generalization, optimization, robustness, and approximation in deep learning; theories for classical sparse coding; fairness, privacy and bias concerns; etc.
- Hardware and Systems: accelerating sparse computation; resourceefficient learning; etc.
- Applications and Science: parsimonious AI for science and engineering; theoretical neuroscience and cognitive science foundations for parsimony; other cross-disciplinary applications; etc.

Call for Papers

Submission instruction: https://cpal.cc/cfp/
Submission site: OpenReview-CPAL 2024
Submission format: CPAL LaTeX style files

- (1) Proceeding track (archival): The submission and review stage is double-blind. Full proceedings papers can have up to 9 pages with unlimited pages for references and appendix.
- (2) "Recent Spotlight" Track (non-archival): The submission and review stage is single-blind. Submit a conference-style paper up to 9 pages, with extra pages for references. We permit under-review or concurrent submissions.

Invited Speakers

Dan Alistarh, IST Austria/Neural Magic
Tom Goldstein, University of Maryland
Yingbin Liang, Ohio State University
Robert D. Nowak, University of Wisconsin-Madison
Dimitris Papailiopoulos, University of Wisconsin-Madison
Jong Chul Ye, KAIST

Organization Team (See Website)

General Chairs

Yi Ma, UC Berkeley Gitta Kutyniok, LMU Munich Harry Shum, HKUST/IDEA René Vidal, UPenn

Program Chairs

Yuejie Chi, Carnegie Mellon University Gintare Karolina Dziugaite, Google DeepMind Qing Qu, University of Michigan Atlas Wang, UT Austin

Contact: pcs@cpal.cc