



# IEEE INTERNATIONAL SYMPOSIUM ON BIOMEDICAL IMAGING ISBI 2024

27-30 MAY, 2024 – ATHENS, GREECE  
MEGARON ATHENS INTERNATIONAL CONFERENCE CENTRE (MAICC)



VISIT WEBSITE  
[biomedicalimaging.org/2024](http://biomedicalimaging.org/2024)

## Call for challenges

Carrying on the tradition of scientific challenges IEEE International Symposium on Biomedical Imaging (ISBI) 2024 will again welcome proposals for scientific challenges. Such challenges have become a main feature of ISBI as they aim to accelerate the pace of biomedical science in various demanding research workloads and clinically relevant problems.

A challenge should aid quantitative comparisons of competing approaches to cutting-edge research problems in biomedical image analysis, using standardized datasets, evaluation metrics, and multi-institutional collaborations.

Each challenge proposal needs an organizer who will be responsible for providing training, validation, and testing datasets, defining the tasks, specifying the performance metrics, managing and evaluating entries (through appropriate software environments), and organizing on-site presentations in the challenge workshop. The organizers are ultimately responsible for the success of the challenge. ISBI will assist in advertising and augmenting existing advertisements of the challenges. Some useful points:

- The organization of a challenge and the agenda for each workshop will be determined exclusively by challenge organizers.
- The challenge organizers should not rely solely on the on-site evaluation, i.e., while at ISBI.
- Scientific presentations by the challenge participants during the challenge at ISBI are encouraged.
- Multi-institutional collaborations are encouraged to ensure the wider applicability of the solutions.
- New challenge topics as well as topics that were addressed during previous challenges are acceptable.
- New challenge topics could introduce new imaging devices, new biomedical applications, or existing applications that would benefit from focused attention from the biomedical imaging research community.
- Challenges that address previous challenge topics could feature, for example, repeating a challenge to track how the field has

advanced, addressing bottlenecks in existing processing pipelines, processing larger and more heterogeneous datasets or analyzing specific sub-populations.

- We also encourage the investigation of alternative formats for hosting challenges.
- Prospective challenge organizers are encouraged to discuss their plans with the challenge co-chairs at an early stage before the acceptance of the proposal.
- Challenge organizers will have the opportunity to present interesting findings of their challenge, associated novel methods by challenge participants, and final ranking results of their respective challenge, during the main conference. Challenge organizers are responsible for coordinating the participating teams and provide sufficient time to each to present their top-ranked method.
- Challenge organizers should notify participating challenge teams that they have the opportunity to publish their work on the ISBI 2024 proceedings.

### How to Submit a Challenge Proposal

This year we coordinated with the [MICCAI Special Interest Group for Biomedical Image Analysis Challenges \(BIAS\)](#) and adopted a single challenge proposal submission template towards improving the quality of each submission and ensuring uniformity across the reported challenge parameters. Challenge organizers should download the Word template from [here](#).

### IMPORTANT DATES

- Submission Deadline: 27 November 2023 (11:59pm Pacific Time)
- Accept/Reject Notification: 17 December 2023
- Challenge Website Running: January 8, 2024
- Challenge Days: 27-30 May

All challenge proposals are accepted **only via the following link**.

## Organizers

### General chairs

Konstantina S. Nikita, NTUA, Greece  
Christos Davatzikos, U Penn, USA

### Technical Program Chairs

Spyretta Golemati, NKUA, Greece  
Elisa E. Konofagou, Columbia U, USA

### Plenary chair

Ioanna Chouvarda, AUTH, Greece

### Finance

Ilias Maglogiannis, U Piraeus, Greece

### Special advisor

Nikos Paragios, TheraPanacea, France

### Strategic planning

Andrew Laine, Columbia U, USA

### Special sessions

Elsa Angelini, Telecom Paris, France  
Yu Gan, Stevens Institute of Technology, USA

### Awards

Roberto Lavarello, U Católica del Perú, Perú

### Challenges

Spyridon (Spyros) Bakas, U Penn, USA  
Alex Karargyris, MLCommons

### Tutorials

Aimilia Gastouniotti, Washington U in St Louis, USA  
Aris Sotiras, Washington U in St Louis, USA

### Industry

Beatriz Paniagua, Kitware, USA  
Jon Xue, Shanghai United Imaging  
Intelligence Co Ltd  
Lilla Zolley, Massachusetts General  
Hospital, USA

### Communication

Alexandros Tzallas, U Ioannina, Greece

### Diversity

Jose Marcio Luna, Washington U in  
St Louis, USA

### Social media

Konstantinos Mitsis, NTUA, Greece