



Combined SDF and MFI Conference Call for Papers

Combined SDF and MFI

This year the combined IEEE 2023 Symposium Sensor Data Fusion and International Conference on Multisensor Fusion and Integration (SDF-MFI) will take place in Bonn, Germany. We are happy to announce the collaboration of two great conferences on robotics, data fusion, automation and intelligent systems in combined one-track conference. The Uniclub Bonn next to the Rhine river at the center of the former capital provides a great venue.

Topics

<u>Theory</u>: Probability theory, Bayesian inference, nonlinear estimation, Dempster-Shafer, fuzzy sets, logic, machine learning, neural networks, distributed architectures.

<u>Sensors</u>: RGB cameras, depth cameras, radar and sonar devices, laser scanner, infrared sensors, IMU, gyroscopes.

Algorithms for: tracking and localization, recognition, perception, AI in robotics, cognitive systems, sensor registration, big data, sensor management, distributed sensor systems, SLAM, visual servoing, learning by demonstration.

<u>Applications</u>: Sensor networks, robotics, multi-robot systems, bio-inspired systems, automation, biomedical applications, autonomous vehicles (land, sea, air), manipulation planning and control, multifinger hands, micro/nano systems, data fusion, state estimation, artificial intelligence, surveillance, multimodal interface and human robot interaction

Fees

| €499 Regular $€399$ AESS or GMA membe | €299 | Students | €199 | Stud. AESS/GMA mem. |
|---|------|------------|-------|---------------------|
| | €499 | Regular | € 399 | AESS or GMA members |
| equal 90 1 Tutorial $equal$ 150 2 Tutorials | €90 | 1 Tutorial | €150 | 2 Tutorials |

Contributions

Prospective authors are encouraged to submit high-quality full draft papers (6-8 pages, IEEE format). All submissions are subject to a peer-review process by the technical program committee. Accepted and presented papers will be submitted to IEEE for publication. At least one of the authors of each accepted contribution is expected to register for the conference and to present the paper. For details contact mfi2023.org.

Important Dates

| 31.08.2023 | Submission of full draft papers |
|-----------------------|---------------------------------|
| 14.09.2023 | Submission of full draft papers |
| 27.10.2023 | Notification of acceptance |
| 17.11.2023 | Submission of the final version |

Organisation

Executive Chairs:

- Wolfgang Koch, Fraunhofer FKIE and University of Bonn
- Uwe D. Hanebeck, Karlsruhe Institute of Technology KIT

Program Chairs:

- Florian Pfaff, Karlsruhe Institute of Technology KIT
- Felix Govaers, Fraunhofer FKIE, Germany

Tutorial Chair:

• Isabel Schlangen, Fraunhofer FKIE, Germany

Special Session Chairs:

- Martin Herrmann, Ulm University
- Michael Buchholz, Ulm University

Financial Chair:

• Joachim Biermann, Fraunhofer FKIE, Germany

Tutorials on Day 1

| Jeremie Houssineau | Bridging theory and applications | | |
|--------------------|--------------------------------------|--|--|
| | with possibility theory | | |
| Sabine Apfeld | Introduction to ELINT and ESM: A | | |
| | Beginner's Tutorial | | |
| Daniel Clark | Statistical and information- | | |
| | theoretic methods for multi-sensor | | |
| | multi-target estimation | | |
| Corina Barbalata | Emerging trends in sensing capabil- | | |
| | ities and their integration with un- | | |
| | derwater robotics | | |
| Marcus Baum | Multiple Extended Object Tracking | | |
| | for Automotive Applications | | |
| Carolin Frueh | Human-made Space Object Charac- | | |
| | terization over Large Distances | | |





VDI

VDF



VDI/VDE-Society

Measurement & Automatic Control



