

2027 the 13th International Conference on Mechatronics and Robotics Engineering

ICMRE 2027

University of Agder
Grimstad, Norway

March 3-5, 2027

High-Integrity Mechatronic Systems

Special Session 1

Organizer

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Committee

Conference Chairs

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Belkacem OULD BOUAMAMA, Ecole Polytechnique de Lille, France
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Hamid Reza Shaker, University of Southern Denmark, Denmark

Regional Chairs

Bin Wei, Texas A&M University, USA
Thomas Schlechter, University of Applied Sciences Upper Austria, Austria
Han Wang, Xiamen University Malaysia, Malaysia
Dao Phuong Nam, Hanoi University of Science and Technology, Vietnam

Important Dates

Submission Deadline	October 25, 2026
Notification Deadline	November 20, 2026
Registration Deadline	December 5, 2026
Listener Registration	February 26, 2027

Contact US

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Abstract

This Special Session focuses on the design, development, and operation of mechatronic systems where reliability, robustness, safety, and continued functionality are critical. It will explore advances in mechatronic system architectures, actuation, sensing, control, fault tolerance, condition monitoring, diagnostics and prognostics, and intelligent methods that enhance system integrity and resilience.

The session aims to bring together researchers and practitioners working on the development of dependable mechatronic technologies for demanding and safety- or mission-critical applications. Emphasis will be placed on approaches that enable systems to detect, accommodate, and recover from faults while maintaining acceptable levels of performance. The session will provide a forum for theoretical, computational, experimental, and application-oriented research across areas including aerospace, transportation, manufacturing, healthcare, robotics, drones, and other high-integrity mechatronic applications.

Topics

- High-Integrity System Architectures and Design
- Reliable and Redundant Actuation Systems
- Advanced Sensing and Sensor Fusion
- Robust and Fault-Tolerant Control
- Fault Detection, Diagnostics and Prognostics
- Intelligent Methods for Reliability, Safety and Resilience
- High-Integrity Industrial Robotics and Automation
- High-Integrity Mobile Robotics, UAVs and Unmanned Systems

Submission Method

1. Online submission link:
<https://www.easychair.org/my/conference?conf=icmre2027>
2. Email: icmre_contact@academic.net
Submission Type: Abstract submission for presentation only without publication;
Full paper submission for both presentation and publication.
Paper Length: The minimum page limit for full paper is full 4 pages including all figures, tables, and references. When it exceeds 6 pages, each additional page (from Page 7) will be chargeable.

Conference History

ICMRE 2016 / February 18-22, 2016 | Nice, France
ICMRE 2017 / February 8-12, 2017 | Paris, France
ICMRE 2018 / February 7-11, 2018 | University of Valenciennes, France
ICMRE 2019 / February 16 - 19, 2019 | Rome, Italy
ICMRE 2020/ February 12-15, 2020 | Barcelona, Spain
ICMRE 2021/ February 3-5, 2021 | Budapest, Hungary (Virtual)
ICMRE 2022/February 10-12, 2022 | Munich, Germany (Virtual)
ICMRE 2023/February 10-12, 2023 | Shenzhen, China (Virtual)
ICMRE 2024/February 27-29, 2024 | Milan, Italy
ICMRE 2025/February 24-26, 2025 | Lille, France
ICMRE 2026/March 2-4, 2026 | Oldenburg, Germany