



CALL FOR PAPERS

International Symposium on Measurement and Control in Robotics

“Robotics for the Benefits of Humanity”

ISMCR 2019

19-21 September 2019, Houston, Texas, USA



Organized by:
IMEKO Technical Committee
on Robotics, TC-17

Technical Sponsorship By:
IEEE Aerospace & Electronic Systems Society
IEEE Instrumentation and Measurement Society
IEEE Robotics and Automation Society
AIAA-American Inst. of Aeronautics & Astronautics
Clear Lake Council of Technical Societies

HOSTED BY:

University of Houston-Clear Lake UHCL
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SCOPE

The symposium will focus on various aspects of international research, applications and trends of robotic innovations for the benefit of humanity, advanced human-robot systems and applied technologies, e.g. in the fields of robotics, telerobotics, simulator platforms and environment and mobile work machines as well as virtual reality/augmented reality and 3D modelling and simulation. The symposium will consist of keynote presentations on the state-of-the-art technology, workshops and topical panels. All papers will have peer review and will be published with IMEKO and IEEE Guidelines.

PARTICIPANTS

As in previous ISMCR Conferences, ISMCR 2019 is intended to be a forum for the exchange of recent research results and ideas in robotic technologies and applications; this time with specific reference to service to humanity. It should be of interest to a wide range of participants from government agencies, relevant international institutions, universities, research organizations, robotics and automated vehicle companies, as well as media and the general public. The conference should serve as an opportunity for networking and fruitful exchange with fellow participants on topics of mutual interest.

PAPER SUBMISSION

Prospective participants are invited to submit electronically abstracts and then full papers of their work, following the instructions available on the web page.

All accepted papers will be published in the conference proceedings, which will be available at the time of the conference. Presented papers will be recommended for publication in IEEE Xplore, Scopus and Web of Science (THOMSON REUTERS Conference Proceedings Citation Index).

As the previous ISMCRs, after the conference, the extended and enhanced versions of the selected papers will be considered for publication in the IMEKO Publication

IMPORTANT DATES- REVISED

Abstracts submission ~~19th April~~ **MAY 10th 2019**
Abstract acceptance to authors ~~9th May~~ **MAY 17th 2019**
Submission of full paper for review ~~9th June~~ **JUNE 17th 2019**
Notification of paper acceptance 15th July 2019
Submission of camera ready paper 15th August 2019

TOPICS

In general, contributions regarding all aspects of recent developments in robotics technologies are welcome. Presentations addressing the specific theme of ISMCR 2019 are especially encouraged. Papers may fall under, but not be limited to the following topics:

- Robot Design Innovations
- Sensors/Smart Sensors their Integration / Fusion
- Advanced Controls and Actuators
- New Power Supplies
- Methods of Artificial Intelligence in Robotics
- Humanoid, Climbing/Walking, Service, and Autonomous Robots
- Anthropomorphic Robots/Mobile Robots
- Telexistence / Telepresence
- Augmented Reality / Mixed Reality / Virtual Reality
- Communication with Realistic Sensations
- Intelligent CAD and IMS
- Visual and Auditory Displays
- Tactile and Force Displays
- Tools and Techniques for Modeling VR Systems
- Real Time Computer Simulation
- Software Architectures for VR
- VR Interaction and Navigation Techniques, Distributed VR Systems and Motion Tracking
- VR Input and Output Devices
- Innovative Applications of VR
- Human Factors in VR
- Evaluation of VR Techniques and Systems
- Internet and VRML Application of VR in all areas
- Interactive Art and Entertainment
- Artificial Life
- Education and Entertainment Robots
- Medical and Healthcare Robots
- Micro and Nano Robots
- Innovative Robotics Applications