

Special Issue

Modeling, Optimization and Control of Robotic Systems

Message from the Guest Editors

Robotics has grown in importance in industrial applications, domestic services, and healthcare as one of the most promising future technologies. Robotics is concerned with interdisciplinary research and development in fields such as design optimization, kinematics, dynamics, motion planning, control, sensors, and machine intelligence. The control system is at the heart of robotic system development and implementation. The breadth of robotics and control research has resulted in numerous notable achievements that can be shared with the research community. The proposed Special Issue's main goal is to present a cutting-edge collection of articles presenting novel developments in robot dynamic modeling, optimization and control, as well as experimental studies related to their use in real-world applications. This Special Issue covers a variety of contributions from different fields.

Guest Editors

Prof. Dr. Ahmad Taher Azar

Prof. Dr. Amjad J. Humaidi

Dr. Ammar K. Al Mhdawi

Deadline for manuscript submissions

closed (15 November 2023)



Actuators

an Open Access Journal
by MDPI

Impact Factor 2.3
CiteScore 4.3



mdpi.com/si/127860

Actuators
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
actuators@mdpi.com

[mdpi.com/journal/
actuators](https://mdpi.com/journal/actuators)





Actuators

an Open Access Journal
by MDPI

Impact Factor 2.3
CiteScore 4.3



[mdpi.com/journal/
actuators](https://mdpi.com/journal/actuators)



About the Journal

Message from the Editorial Board

We are just entering the Next Wave of Technology (NWT) where actuators will play the same role as the computer chip did for computers/social media approximately four decades ago. Just in the U.S., production of \$1 trillion year of electromechanical systems (vehicles, orthotics, manufacturing cells, freight trains, aircraft, etc.) will be impacted by the NWT, all driven by actuators. Five key trends can be found for the future perspectives: “Performance to Reliability”, “Hard to Soft”, “Macro to Nano”, “Homo to Hetero” and “Single to Multi functional”. We invite papers that primarily impact these economic sectors; those illustrating basic scientific principles are also welcome.

Editors-in-Chief

Prof. Dr. Kenji Uchino

Emeritus Academy Institute, The Pennsylvania State University,
University Park, PA 16802, USA

Prof. Dr. Norman M. Wereley

Department of Aerospace Engineering, University of Maryland, 3179J
Martin Hall, College Park, MD 20742, USA

Author Benefits

Open Access:

free for readers, with article processing charges (APC) paid by authors or their institutions.

High Visibility:

indexed within SCIE (Web of Science), Scopus, Inspec, and other databases.

Journal Rank:

JCR - Q2 (Engineering, Mechanical) / CiteScore - Q1
(Control and Optimization)