Special Issue

Sliding Mode and Robust Control: Theory and Applications

Message from the Guest Editors

Advanced control strategies are critical to ensuring the effectiveness and performance of modern engineering systems. Sliding mode and robust control are effective schemes that can provide stability and precise performance under adverse conditions, such as unknown disturbances, unmodeled dynamics, parametric variations, and nonlinear interactions. We welcome original research articles and comprehensive reviews with both theoretical advances and practical applications. Topics of interest include, but are not limited to:

- Advanced sliding mode control methods.
- Robust control theory and synthesis methods.
- Adaptive sliding mode control methods.
- Higher-order sliding mode control methods.
- Active disturbance rejection control methods.
- Disturbance observer and uncertainty estimation methods.
- Event-triggered and sampled-data robust control methods.
- Learning-based and data-driven robust control methods.
- Fault-tolerant control and secure control methods.
- Sliding mode and robust control in cyber–physical systems.

Guest Editors

Dr. Xiaolei Li

Prof. Dr. Yi Zeng

Dr. Chengwei Wu

Dr. Xiangyu Shao

Deadline for manuscript submissions

20 April 2026

Applied Sciences

an Open Access Journal by MDPI

Impact Factor 2.5
CiteScore 5.5

mdpi.com/si/255657

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

mdpi.com/journal/applsci

MDPI

Applied Sciences

an Open Access Journal by MDPI

Impact Factor 2.5
CiteScore 5.5

mdpi.com/journal/applsci

About the Journal

Message from the Editor-in-Chief

As the world of science becomes ever more specialized, researchers may lose themselves in the deep forest of the ever increasing number of subfields being created. This open access journal *Applied Sciences* has been started to link these subfields, so researchers can cut through the forest and see the surrounding, or quite distant fields and subfields to help develop his/her own research even further with the aid of this multi-dimensional network.

Editor-in-Chief

Prof. Dr. Giulio Nicola Cerullo
Dipartimento di Fisica, Politecnico di Milano, Piazza L. da Vinci 32, 20133 Milano, Italy

Author Benefits

Open Access:

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

High Visibility:

indexed within Scopus, SCIE (Web of Science), Ei Compendex, Inspec, CAPlus / SciFinder, and other databases.

Journal Rank:

JCR - Q2 (Engineering, Multidisciplinary) / CiteScore - Q1 (General Engineering)

MDPI