Special Issue

Modelling, Condition Monitoring and Design of Electrical Machines

Message from the Guest Editors

This Special Issue focuses on the latest advancements in modeling, condition monitoring, fault-tolerant control, and design of electrical machines, emphasizing the interdisciplinary integration needed to enhance predictive maintenance. We invite contributions that explore novel mathematical models, Al-based diagnostic methods, and the practical application of digital twins and IoT in electrical machines. By converging diverse perspectives from these fields, we aim to spark innovative solutions for developing the next generation of intelligent and resilient electrical machines.

- condition monitoring
- electrical machines
- mathematical modeling
- predictive maintenance
- signal processing
- digital twin
- Internet of Things
- parameters estimation
- inverse problem theory
- artificial intelligence

Guest Editors

Dr. Bilal Asad

Department of Electrical Power Engineering and Mechatronics, Tallinn University of Technology, 12616 Tallinn, Estonia

Dr. Toomas Vaimann

Department of Electrical Power Engineering and Mechatronics, Tallinn University of Technology, 12616 Tallinn, Estonia

Deadline for manuscript submissions

closed (25 February 2025)



Energies

an Open Access Journal by MDPI

Impact Factor 3.2 CiteScore 7.3



mdpi.com/si/215410

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

mdpi.com/journal/energies





Energies

an Open Access Journal by MDPI

Impact Factor 3.2 CiteScore 7.3



About the Journal

Message from the Editor-in-Chief

Energies is an international, open access journal in energy engineering and research. The journal publishes original papers, review articles, technical notes, and letters. Authors are encouraged to submit manuscripts which bridge the gaps between research, development and implementation. The journal provides a forum for information on research, innovation, and demonstration in the areas of energy conversion and conservation, the optimal use of energy resources, optimization of energy processes, mitigation of environmental pollutants, and sustainable energy systems.

Editor-in-Chief

Prof. Dr. Enrico Sciubba

Department of Mechanical and Industrial Engineering, University Niccolò Cusano, 00166 Roma, 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, RePEc, Inspec, CAPlus / SciFinder, and other databases.

Journal Rank:

CiteScore - Q1 (Control and Optimization)

