

Special Issue

Modeling, Optimization, and Control in Smart Grids: 2nd Edition

Message from the Guest Editors

This issue aims to present and disseminate the most recent advances related to the theory, design, modeling, application, optimization, communication, control, and also planning and management of smart grids. Topics of interest for publication include, but are not limited to:

- Modeling of control strategies for a robust smart grid;
- Smart grids, optimization, and artificial intelligence;
- Communication and control based on machine learning methodologies;
- Algorithms for modeling, optimization, and control;
- Wide area for monitoring, control, and protection;
- Advanced modeling approaches;
- Integration of renewable generation, distribution, and energy storage;
- Microgrids, distributed energy supply, and electricity markets;
- Energy management systems, demand response, efficiency, and challenges;
- Integration of electrical vehicles in smart grids;
- Smart grid protection/security;
- Distributed communications and sensing/metering in a smart grid.

Guest Editors

Prof. Dr. Paulo Coelho

Smart Cities Research Center (Ci2-IPT), Polytechnic Institute of Tomar,
2300-313 Tomar, Portugal

Dr. Mario Gomes

Smart Cities Research Center (Ci2-IPT), Polytechnic Institute of Tomar,
2300-313 Tomar, Portugal

Deadline for manuscript submissions

closed (5 May 2026)



Energies

an Open Access Journal
by MDPI

Impact Factor 3.2
CiteScore 8.3



mdpi.com/si/203490

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

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





Energies

an Open Access Journal
by MDPI

Impact Factor 3.2
CiteScore 8.3



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



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)