



Machine Learning and Artificial Intelligence into Analysis, Control, and Applications of Renewable Energy Systems

Guest Editors:

Dr. Xingang Fu

Department of Electrical Engineering and Computer Science, Texas A&M University-Kingsville, Kingsville, TX 78363, USA

Dr. Letu Qingge

Department of Computer Science, North Carolina A&T State University, Greensboro, NC 27411, USA

Dr. Abdullah Al Hadi

Department of Electrical and Computer Engineering, University of Kentucky, Lexington, KY 40506, USA

Deadline for manuscript submissions:

closed (15 May 2023)



mdpi.com/si/118766

Message from the Guest Editors

In recent years, machine learning, also known as artificial intelligence, has succeeded in the image processing and language processing fields, among others. These of these technologies have had several successful applications in the power and renewable energy fields.

This Special Issue intends to seek interdisciplinary topics at the junction between renewable energies and computer science, especially in artificial intelligence or machine learning.

Topics of interest include, but are not limited to:

- The application of power electronics applications in renewable sources of energy
- Wide Band Gap (WBG) semiconductor devices such as SiC and GaN in renewable sources of energy
- Wind forecasting/power using machine learning, deep learning, and artificial intelligence
- Solar forecasting/power using machine learning, deep learning, and artificial intelligence
- Applications of renewable sources of energy such as solar and wind in computer science fields such as bioenergy, bioinformatics, etc
- Solar home systems
- Building Energy Management (BEM)
- Demand response for grid stability and resiliency
- Net-zero energy buildings
- Distributed Energy Management Systems (DERMS)

Special Issue



an Open Access Journal by MDPI

Editor-in-Chief

Prof. Dr. Flavio Canavero

Department of Electronics and
Telecommunications,
Politecnico di Torino, 10129
Torino, Italy

Message from the Editor-in-Chief

Electronics is a multidisciplinary journal designed to appeal to a diverse audience of research scientists, practitioners, and developers in academia and industry. The journal is devoted to fast publication of latest technological breakthroughs, cutting-edge developments, and timely reviews of current and emerging technologies related to the broad field of electronics. Experimental and theoretical results are published as regular peer-reviewed articles or as articles within Special Issues guest-edited by leading experts in selected topics of interest.

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), CAPlus / SciFinder, Inspec, Ei Compendex and other databases.

Journal Rank: JCR - Q2 (*Physics, Applied*) / CiteScore - Q2 (*Control and Systems Engineering*)

Contact Us

Electronics Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland

Tel: +41 61 683 77 34
www.mdpi.com

mdpi.com/journal/electronics
electronics@mdpi.com
[X@electronicsMDPI](https://x.com/electronicsMDPI)