

## Special Issue

# Renewable Energy System Technologies: 2nd Edition

### Message from the Guest Editor

Renewable energy resources, such as solar photovoltaic (PV) and wind turbine generation, are completely dependent on nature (wind speed, wind direction, temperature, solar irradiation, humidity, etc.). Thus, their outputs are stochastic in nature, and are required to develop and apply new technologies to overcome intermittency issues as well as Big Data in real time. Integrated system modelling methods and concepts are needed to study the self-organization, complexity, emergent properties, and dynamical behavior of complex systems for their holistic understanding, management, and development based primarily on neural networks, fuzzy and soft systems/fuzzy cognitive maps, network modelling, and mathematics. Other advanced applications in the computational early detection of mastitis and computer-based decision support systems for complex systems are also needed. Due to the scale of the network and the amount of data that needs to be digitized, new technologies such as techniques in data mining and AI approaches are needed to analyze and predict the behavior of these complex systems.

---

### Guest Editor

Prof. Dr. Tek-Tjing Lie

School of Engineering, Computer and Mathematical Sciences,  
Auckland University of Technology, Auckland 1010, New Zealand

---

### Deadline for manuscript submissions

closed (10 April 2025)



## Energies

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.9  
CiteScore 8.3



[mdpi.com/si/201718](https://mdpi.com/si/201718)

*Energies*  
Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland  
Tel: +41 61 683 77 34  
[energies@mdpi.com](mailto:energies@mdpi.com)

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





# Energies

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.9  
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)