Special Issue

Enhancing Energy Efficiency in Industry 4.0 for Sustainable Production, Smart Design and Manufacturing, Demand-Side Management, and Efficient Scheduling with Renewable Energy Sources

Message from the Guest Editors

This Special Issue aims to serve as a guiding resource and help industrial entities to achieve heightened energy efficiency, diminish their carbon emissions, and advance overall sustainability through the incorporation of Industry 4.0 (I4.0) technologies. The scope of this Special Issue, but is not restricted to, the following topics:

- Analysis of the current situation of sustainable industrial processes and the use of Industry 4.0 technologies in the assessment, measurement, and management of energy-saving and emission reduction strategies.
- New proposed technologies for smart sustainable design and production.
- Assessment of the impacts of emerging technologies on sustainability.
- Integration of renewable energies and energy storage for enhanced energy self-sufficiency.
- Integration of energy-efficient scheduling models in intelligent production systems.
- In-depth exploration of demand-side management and demand–response integration in the manufacturing industry.

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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.

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