

## Special Issue

# Challenges with Microgrids, Mini-Grids, and Nanogrids in Remote Communities: Modeling, Control, and Operation

### Message from the Guest Editors

This Special Issue aims to encourage researchers and practitioners to share and exchange their original and high-quality research (new theories, methods, techniques, and applications) in the fields of the new generation of hybrid renewable energy, electrical power, renewable energy integration, and electric vehicles systems related to the aforementioned topics. In particular, potential topics include but are not limited to: Smart grids, nanogrids, minigrids, and microgrids; Strengthening the power grid through smart hybrid systems; Challenges in the new generation of hybrid energy systems; New operation and maintenance strategies for power systems; Resilience of hybrid electric power systems; Modelling, sizing, and design of microgrids; Smart grid self-healing; Performance analysis of hybrid energy systems; Advanced control techniques; Electric vehicles and their systems; Reliability analysis; Power system management; Implementation and modern optimization techniques algorithms for microgrids systems.

### Guest Editors

Dr. Omar Hazem Mohammed

Dr. Mohammed Kharrich

Dr. Salah Kamel

### Deadline for manuscript submissions

closed (20 October 2023)



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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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### Editor-in-Chief

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