



*sensors*



an Open Access Journal by MDPI

## IoT for Smart Grids: Challenges, Opportunities and Trends

Guest Editors:

**Dr. Haris Pervaiz**

**Dr. Muhammad Ismail**

**Dr. Islam Safak Bayram**

**Dr. Sukhpal Singh Gill**

Deadline for manuscript  
submissions:

**closed (15 October 2021)**

### Message from the Guest Editors

Dear Colleagues,

The topics of interest for this Special Issue include, but are not limited to:

- False data injection attack and detection in smart grid IoT;
- Data analytics in smart grid IoT;
- Fog/edge/cloud-based service solutions for smart grid IoT;
- Machine learning and deep learning for resilient and efficient smart grid IoT;
- Security threats and vulnerability detection in smart grid IoT;
- Energy theft detection in modern smart grid IoT;
- Energy efficient deployments for smart grid IoT;
- Data-driven framework for energy theft detection in distributed renewable energy resources (DRES) using smart grid IoT;
- Big data analytics in smart grid IoT;
- Intrusion detection in smart grid IoT;
- Privacy and security issues in AI applications in smart grid IoT.

Dr Haris Pervaiz

Dr Muhammad Ismail

Dr Islam Safak Bayram

Dr Sukhpal Singh Gill

*Guest Editors*



[mdpi.com/si/49169](https://mdpi.com/si/49169)

**Special** Issue



*sensors*



an Open Access Journal by MDPI

## Editor-in-Chief

### **Prof. Dr. Vittorio M. N. Passaro**

Dipartimento di Ingegneria  
Elettrica e dell'Informazione  
(Department of Electrical and  
Information Engineering),  
Politecnico di Bari, Via Edoardo  
Orabona n. 4, 70125 Bari, Italy

## Message from the Editor-in-Chief

*Sensors* is a leading journal devoted to fast publication of the latest achievements of technological developments and scientific research in the huge area of physical, chemical and biochemical sensors, including remote sensing and sensor networks. Both experimental and theoretical papers are published, including all aspects of sensor design, technology, proof of concept and application. *Sensors* organizes Special Issues devoted to specific sensing areas and applications each year.

## Author Benefits

**Open Access** : free for readers, with [article processing charges \(APC\)](#) paid by authors or their institutions.

**High Visibility**: indexed within [Scopus](#), [SCIE \(Web of Science\)](#), [PubMed](#), [MEDLINE](#), [PMC](#), [Ei Compendex](#), [Inspec](#), [Astrophysics Data System](#), and [other databases](#).

**Journal Rank**: JCR - Q2 (*Chemistry, Analytical*) / CiteScore - Q1 (Instrumentation)

## Contact Us

---

*Sensors* Editorial Office  
MDPI, Grosspeteranlage 5  
4052 Basel, Switzerland

Tel: +41 61 683 77 34  
[www.mdpi.com](http://www.mdpi.com)

[mdpi.com/journal/sensors](http://mdpi.com/journal/sensors)  
[sensors@mdpi.com](mailto:sensors@mdpi.com)  
[X@Sensors\\_MDPI](#)