

## Special Issue

# Intelligent Massive-MIMO Systems and Wireless Communications

### Message from the Guest Editors

The deployment of the fifth-generation (5G) networks has already starting taking place, aiming to provide improved data rates to mobile users, higher spectral end energy efficiency, as well as coverage in harsh propagation conditions. To this end, two key novel technologies in the physical layer include the deployment of a very large number of transmitting antennas to access points, also known as massive multiple input multiple output (m-MIMO), as well as the use of millimeter-wave transmission; however, conventional beamforming techniques with a dedicated radio frequency (RF) chain per transmitting antenna cannot be directly applicable in m-MIMO topologies, as this would significantly increase hardware and computational complexity. In this context, an alternate approach is based on the use of an RF chain for a specific group of transmitting antennas while their phases are controlled by the analog part. Recent studies have shown that the performance of this sub-optimal architectural approach, also known as hybrid-beamforming, can nearly reach the performance of fully digital m-MIMO configurations.

---

### Guest Editors

Dr. Panagiotis K. Gkonis

Dr. Petros S. Bithas

Dr. Christos G. Tsinos

---

### Deadline for manuscript submissions

closed (15 January 2026)



## Sensors

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.5  
CiteScore 9.4  
Indexed in PubMed



[mdpi.com/si/174080](https://mdpi.com/si/174080)

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

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





# Sensors

---

an Open Access Journal  
by MDPI

---

Impact Factor 3.5  
CiteScore 9.4  
Indexed in PubMed



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



## About the Journal

### 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.

---

### Editor-in-Chief

Prof. Dr. Vittorio M. N. Passaro  
Department of Electrical and Information Engineering, Politecnico di Bari, Via Orabona 4, 70126 Bari, 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), PubMed, MEDLINE, PMC, Ei Compendex, Inspec, Astrophysics Data System, and other databases.

#### Journal Rank:

JCR - Q2 (Instruments and Instrumentation) / CiteScore - Q1 (Instrumentation)