



*sensors*



an Open Access Journal by MDPI

## Metal Oxide Based Nanosensors

Guest Editor:

**Dr. Renaud Leturcq**

Luxembourg Institute of Science and Technology, 5, avenue des Hauts-Fourneaux, L-4362 Esch-sur-Alzette, Luxembourg

Deadline for manuscript submissions:

**closed (30 November 2021)**

### Message from the Guest Editor

Dear Colleagues,

This Special Issue is aimed at the submission of both review and original research articles related to nanoscale devices based on metal-oxide materials, from material synthesis to nanostructure integration, device characterization, and understanding of their sensing properties. Due to their high sensitivity and low cost, metal-oxide materials are used in a wide range of sensors, from gas sensors to biosensors, mechanical sensors, and photodetectors. Current research activities concentrate on nanoscale devices, due to the opportunity to improve their sensitivity, their selectivity, and reduce their power consumption, which are mandatory criteria for Internet of Things (IoT) applications. More specifically, this Special Issue will focus on new nanosensor device architectures for enhanced sensing performance and lower power consumption, from their synthesis and integration to the understanding of their working principle, including in situ local analysis methods.

Dr. Renaud Leturcq  
*Guest Editor*



[mdpi.com/si/43179](https://mdpi.com/si/43179)

**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](#)