

## Special Issue

# Dependability of Emerging Computing Paradigms and Technologies in IoT-Oriented Circuits, Architectures and Algorithms

### Message from the Guest Editors

In recent decades, the incessant growing presence of smart applications in our daily lives has pushed the frenetic development of new devices which constitute the Internet of Things infrastructure (IoT). The undeniable need for energy efficiency in these devices is leading to the adoption of innovative computing paradigms—such as approximate computing, computation-in-memory, and neuromorphic computing—and emerging technologies—such as new nonvolatile memories (RRAM, MRAM, FeRAM, etc.). As we are heading toward a future where the ubiquitous presence of these devices will simplify and guide our daily actions, their dependability is of primary concern. This Special Issue focuses on aspects related to the dependability of these emerging computing paradigms and technologies in the context of IoT devices. Keywords

- dependability
- reliability
- fault tolerance
- test
- verification
- energy efficiency
- emerging computing paradigms
- emerging technologies
- embedded IoT

---

### Guest Editors

Dr. Marcello Traiola  
Dr. Elena-Ioana Vătăjelu  
Dr. Angeliki Kritikakou

---

### Deadline for manuscript submissions

closed (30 September 2023)



## Electronics

---

an Open Access Journal  
by MDPI

---

Impact Factor 2.6  
CiteScore 6.1



[mdpi.com/si/86040](https://mdpi.com/si/86040)

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

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





# Electronics

---

an Open Access Journal  
by MDPI

---

Impact Factor 2.6  
CiteScore 6.1



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



## About the Journal

### Message from the Editor-in-Chief

*Electronics* is a multidisciplinary journal designed to appeal to a diverse audience of research scientists, practitioners, and developers in academia and industry. The journal is devoted to fast publication of latest technological breakthroughs, cutting-edge developments, and timely reviews of current and emerging technologies related to the broad field of electronics. Experimental and theoretical results are published as regular peer-reviewed articles or as articles within Special Issues guestedited by leading experts in selected topics of interest.

---

### Editor-in-Chief

Prof. Dr. Flavio Canavero

Department of Electronics and Telecommunications, Politecnico di Torino, 10129 Torino, Italy

---

### Author Benefits

#### High Visibility:

indexed within Scopus, SCIE (Web of Science), CAPlus / SciFinder, Inspec, Ei Compendex and other databases.

#### Journal Rank:

JCR - Q2 (Engineering, Electrical and Electronic) /  
CiteScore - Q1 (Electrical and Electronic Engineering)

#### Rapid Publication:

manuscripts are peer-reviewed and a first decision is provided to authors approximately 16.4 days after submission; acceptance to publication is undertaken in 2.6 days (median values for papers published in this journal in the second half of 2025).