Special Issue

GaN-Based Power Electronic Devices and Their Applications

Message from the Guest Editors

The main aim of this Special Issue is to bring the latest and most important innovations in GaN-based power electronic devices and their applications, address recent breakthroughs in GaN power electronics, and provide an up-to-date picture of current challenges and future development. The topics covered in this Special Issue include but are not limited to simulation and modelling, device and integration design, epitaxy, processing technology, reliability and failure analysis, advanced characterizations, and applications.

- Simulation and modelling of GaN power electronics
- Epitaxial growth for GaN power devices
- Lateral and vertical GaN power devices
- Processing technology for GaN power electronics
- Reliability and failure analysis of GaN power electronics
- Advanced characterizations for GaN power electronics
- GaN power IC technology
- Power electronic applications based on GaN devices

Guest Editors

Dr. Kai Fu

Department of Electrical and Computer Engineering, The University of Utah, Salt Lake City, UT 84112, USA

Dr. Houqiang Fu

School of Electrical, Computer and Energy Engineering, Arizona State University, Tempe, AZ 85287, USA

Deadline for manuscript submissions

closed (31 May 2022)

Electronics

an Open Access Journal by MDPI

Impact Factor 2.6
CiteScore 6.1

mdpi.com/si/73382

Electronics
Editorial Office
MDPI, Grosspeteranlage 5
4052 Basel, Switzerland
Tel: +41 61 683 77 34
electronics@mdpi.com

mdpi.com/journal/electronics

Electronics

an Open Access Journal by MDPI

Impact Factor 2.6
CiteScore 6.1

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 guest-edited 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 16.8 days after submission; acceptance to publication is undertaken in 2.4 days (median values for papers published in this journal in the first half of 2025).