

Special Issue

Challenges, Innovation and Future Perspectives of GaN Technology

Message from the Guest Editor

Dear Colleagues, This Special Issue is aimed at addressing some of the above challenges. This includes but not limited to:

- Next-generation GaN device architecture with or without new material;
- Good linearity GaN devices;
- High power density GaN devices;
- Ultra-high switching speed GaN devices;
- Terahertz and sub-terahertz GaN devices;
- Ultra-high bandwidth GaN power amplifier;
- AI-assisted GaN fault detection and mitigation;
- AI-assisted and model-based GaN design;
- Device modeling for performance and reliability study;
- AI-assisted GaN RF amplifier for next-level performance;
- Digital GaN power amplifier for audio applications;
- Low-voltage GaN DC to DC converter;
- GaN integration technology including CMOS, logical gates, etc.;
- GaN technology integration with other technologies such as silicon and others;
- GaN in quantum electronics;
- GaN in space applications;
- GaN fabrication challenges and improvement;
- GaN manufacturing challenges and improvement;
- Ultra-high speed digital GaN;
- GaN for 5G and 6G communication networks;
- GaN CMOS.

Guest Editor

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Deadline for manuscript submissions

closed (15 October 2024)



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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.

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