

# **Products Newsletter**



September 2025 | Issue 62

### **Pubs Education**

#### **IEEE PELS Publication Accessibility and Inclusive Language Guide**

The IEEE Power Electronics Society recently posted its *IEEE PELS Publication Accessibility* and *Inclusive Language Guide* online. This guide includes global IEEE policies, including the Accessibility Statement, IEEE Code of Ethics, Ethics Reporting Line, IEEE Event Conduct & Safety Statement for Conferences, and the Non-discrimination Policy. To access the guide, click **here**.

# **Call for Papers: PELS Publications**

#### **JESTPE**

<u>Special Issue</u>: Interactive Power Converters for Renewable Energy Grid-Tied Systems. Deadline for Submission of Manuscript: extended to September 30, 2025. Guest Editors: Georgios Konstantinou, Giovanni De Carne, Marta Molinas

**Special Issue**: Integrated Machine Drives

Deadline for Submission of Manuscript: September 30, 2025.

Guest Editors: Barrie Mecrow, Thomas Jahns, Joseph Olorunfemi Ojo

**Special Issue**: Power Electronics for Distributed Generation Systems. Post-conference version of papers presented at the IEEE International Symposium on Power Electronics for Distributed Generation Systems (PEDG 2025) are welcome.

Deadline for Submission of Manuscript: November 15, 2025. Guest Editors: Samir Kouro, Pedro Rodriguez, Xinbo Ruan

#### **JWPT**

*IEEE Journal on Wireless Power Technologies* (JWPT) announces a <u>Call for Papers</u> for the Special Issue of IEEE Wireless Power Transfer Conference and Expo 2025 (WPTCE 2025). Authors of papers accepted for presentation at WPTCE 2025 are invited to submit an expanded version of their conference papers to the Special Issue. Publication Date: March 2026. Submission Deadline: November 8, 2025.

#### **OJPEL**

The editors from OJPEL would like to announce a Special Compendium on the 2025 IEEE 7th International Conference on DC Microgrids (ICDCM 2025). Papers that show the latest advancements in dc grid technologies and applications are welcome for this special compendium. The scope encompasses aspects of power electronics, system architectures, controls, protection, intelligent system management, energy storage, and ac grid interfaces that are unique to dc microgrids. We will accept selected full journal article versions of already accepted papers at ICDCM 2025. A paper submission is still expected to include a literature review to establish its relationship to prior work, and present sufficient results to prove the validity and viability of proposed concepts. The deadline for manuscript submission is November 1, 2025. The scheduled publication time is August 2026. For more information, please consult the <u>Call</u>.

#### **TPEL**

The editorial team of TPELannounces a <u>Call for Letters Proposals</u> and a <u>Call for Regular Papers Proposals</u>. The papers will be published in 2026. Submit your team's ideas today! Extended Proposals Deadline: September 30.

# **IEEE Power Electronics Magazine**



#### **Preview of September 2025**

Stay tuned for the September issue of *IEEE Power Electronics Magazine*. Readers will find such features as the following.

- Solid-State Circuit Protection and Control for Low and Medium Voltage Applications
- A Cryogenically-Cooled GaN-Based Solid-State Circuit Breaker for Electrified Aircraft
- Electronic Waste, Power Electronics, and Environmental Sustainability
- Controller Design for Sensorless Brushless DC Motors Through a Nonlinear Model Predictive Tracker and Augmented Extended Kalman Filter
- IEEE Std 2988-2024 and the Recommended Practice for Use and Functions of Virtual Synchronous Machines
- A Guide to Improving Thermal Simulations With Refined Foster and Cauer Models
- Empowering IBRs for Frequency Support: The Role of Incentive Mechanisms

#### **Get Access to Previous Issues**

For editorial from back issues of the magazine, visit our<u>website</u>. You will discover Open Access columns, Society News, Industry News, and much more.

### **IEEE Transactions on Power Electronics (TPEL)**



#### **Call for Associate Editors**

TPEL is accepting applications and nominations for Associate Editors. Please visit the **website** for the application requirements.

TPEL editors have selected a paper to highlight from the **September 2025** issue.

"A Dual-Side Variable Duty Cycle Phase-Shift Modulation Strategy for DAB Converter With Minimal Current Stress" by Shanshan Gao, Jiaran Xu, Yijie Wang, Xiangjun Zhang, Jianxing Liu, Cong Huang, and Dianguo Xu. This article proposes a new modulation scheme for DAB converters with three degrees of freedom based on EPS control and ADM control, in which the duty cycle of the switches on both sides of the transformer changes simultaneously. The basic working principle and operational characteristics of DVDM are presented. An optimal control scheme of the full power range is obtained. A 100 kHz, 250W DAB experimental prototype is built to verify the effectiveness of the scheme. Compared with other schemes, the proposed one can achieve the lowest peak-to-peak inductor current and RMS current.

## **IEEE Power Electronics Letters**

The <u>September 2025</u> issue of TPEL features 21 Letters advancing the state of the art in power electronics. It also has the Special Section: Highly Robust Power Electronics in the Era of DC Grid. Here is a highlighted letter from the issue.

"Bennet's Doubler-Extended Converter With Optimized Bias for Enhanced Energy Extraction From Triboelectric Nanogenerators" by Yirui Su and Youhua Shi. Bennet's doubler (BD) significantly enhances the output of triboelectric nanogenerators (TENGs) by alternating two storage capacitors between series and parallel configurations and applying a bias voltage to the TENG. However, challenges, such as impedance matching and the risk of breakdown due to excessively high bias voltages, can significantly reduce overall output energy, thus decreasing energy conversion efficiency and increasing the risk of unintended electrical discharges. To address these issues, we propose a BD-extended circuit with dual outputs for performance improvement. This design not only considers the breakdown voltage of TENG devices but also enhances efficient energy extraction in a self-powered mode.

# **IEEE Transactions on Transportation Electrification (TTE)**

The editors of *IEEE Transactions on Transportation Electrification* (TTE) would like to recognize their Outstanding Associate Editors for their contributions to TTE as AEs in the year 2024. These exceptional contributions include managing reviews and delivering timely and accurate recommendations.

For more information on TTE, please visit us**online**.



**Ziyou Song**National Univ. of Singapore
(Singapore)



Mateja Novak Aalborg University (Denmark)



**Liang Du** Temple University (USA)



Sobhan Mohamadian Univ. of L'Aquila (Italy)



Marco Palmieri Univ. of Basilicata (Italy)



**Hao Bai** Northwestern Polytechnical Univ. (China)

# **IEEE Open Journal of Power Electronics (OJPEL)**

The *IEEE Open Journal of Power Electronics* (OJPEL) is pleased to announce that current Co-Editor-in-Chief Wenkang Huang will become the Editor-in-Chief in 2026. Current EiC and Division II Director Alan Mantooth will assist with the transition. Thank you to both editors for your strong support of OJPEL. For more on OJPEL, please visit us **online**.



Alan Mantooth University of Arkansas (USA)

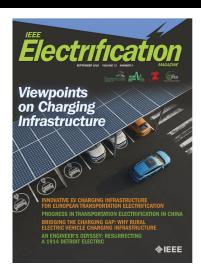


Wenkang Huang Infineon Technologies (USA)

# **IEEE Journal of Emerging and Selected Topics in Power Electronics (JESTPE)**

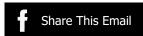
The August 2025 issue of JESTPE features two special issues. The first, Special Issue on High-Frequency Wireless Power Transfer Technology. The second, Special Issue on Power Electronics and Drive Systems for Aviation Electrification. You can access the issue on IEEE **Xplore**.

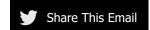
# **IEEE Electrification Magazine**

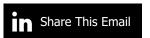


The September 2025 issue of *IEEE Electrification Magazine* focuses on critical enabling technologies and infrastructure for modern multi-modal electrified transportation systems. If you are interested in submitting an article to the magazine, please **email** the editorial team. For detailed submission guidelines, please visit the magazine **website**.









This message is being sent to you because of your membership with and/or your interest in <u>publications</u> of the IEEE Power Electronics Society. For any questions about the newsletter, please contact Mary Beth Schwartz (<u>marybeth.schwartz@ieee.org</u>).

#### <u>Unsubscribe</u> | <u>Update Profile</u> | <u>Constant Contact Data Notice</u>

