IEEE PEMC 2026

22nd International Power Electronics
and Motion Control Conference
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**Power Electronics
and Motion Control
Conference**

PEMC

Special Session on

"Advanced Propulsion and Drive Technologies for Future Electric Mobility"

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Call for Papers

This Special Session invites original contributions on emerging propulsion and electric drive technologies enabling the next generation of software-defined and intelligent electric mobility. Topics include advanced motor control and torque modulation strategies, AI-driven and learning-based control approaches, real-time adaptive propulsion control, edge-enabled drive architectures, and connected electric drive systems for online monitoring and adaptation. We welcome theoretical, experimental, and implementation-oriented studies that enhance efficiency, robustness, adaptability, and intelligence in electric drives. Researchers and industry experts are encouraged to submit novel control methods, drive architectures, and system-level insights that advance intelligent propulsion for future electric mobility platforms.

Submissions Procedure:

All the instructions for paper submission are given at the conference website**:**
https://taltech.ee/en/PEMC2026/paper-submission

Topics of interest include but are not limited to

1	Modeling, Simulation, and Reliability of Electric Propulsion Systems
2	AI-driven, Learning-based, and Adaptive Motor Control Strategies
3	Digital Twin and Hardware-in-the-Loop (HiL) Validation for E-Drives
4	Virtual sensors, soft sensing, and sensorless control for electric drives
5	Centralized Control Architecture for Integrated Powertrains
6	Advanced powertrains for aerospace and marine electric mobility
7	Fault detection, diagnosis, and fault-tolerant control of EV propulsion systems