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# Trustworthy AI for Prognostics and Health Management of Electronic Equipment

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Deadline for manuscript submissions:

15 May 2025

## **Message from the Guest Editors**

This Special Issue seeks original contributions that address the challenges of developing trustworthy AI solutions for PHM in electronic equipment. We invite research that focuses on explainability, transparency, reliability, and robustness in AI models, as well as their applications in PHM. Submissions may explore the use of AI in fault detection, diagnosis, and prognostics, along with innovative approaches that ensure the safety and reliability of AI-driven PHM systems.

Topics of interest include, but are not limited to, the following:

- Trustworthy AI models for predictive maintenance in electronic systems.
- Explainable AI techniques in PHM for electronic equipment.
- Robust and reliable Al models for PHM.
- Uncertainty quantification in Al-driven PHM systems.
- Al-based predictive maintenance in industrial electronics
- Digital twin-assisted reliable AI models for electronic equipment.
- Data-driven approaches for health assessment and remaining useful life estimation of electronic components.
- Security and privacy preservation in Al-based electronic equipment health management.
- Case studies componential than learned tion of trustworthy A celesting BH sollaid SSU6



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### **Editor-in-Chief**

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## **Message from the Editor-in-Chief**

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