# **Special Issue**

# Al Security and Edge Computing in Distributed Edge Systems

## Message from the Guest Editors

With the integration of AI techniques into edge systems, the potential for innovation and efficiency gains is vast. However, this integration also introduces significant security challenges that must be addressed to ensure the robustness and reliability of these systems. The Special Issue aims to provide a platform for researchers to disseminate their latest findings, ideas and discuss challenges and solutions related to the security aspects of AI in distributed edge environments. Topics of interest include, but are not limited to:

- Security threats and vulnerabilities in Al-enabled edge systems;
- Privacy-preserving AI techniques for edge computing;
- Distributed machine learning algorithms for edge devices;
- Trustworthiness and integrity of Al models deployed at the edge;
- Secure communication protocols for edge-to-cloud and edge-to-edge interactions;
- Threat modeling and risk assessment in edge computing:
- Intrusion detection and prevention systems for edge networks:
- Hardware-based security solutions for edge devices;
- Federated learning and secure aggregation in edge computing;
- Regulatory and ethical considerations in securing Al at the edge.

### **Guest Editors**

Dr. Kongyang Chen

Dr. Hongyang Yan

Dr. Yatie Xiao

## Deadline for manuscript submissions

28 February 2026



# **Mathematics**

an Open Access Journal by MDPI

Impact Factor 2.2 CiteScore 4.6



mdpi.com/si/202960

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

mdpi.com/journal/ mathematics





# **Mathematics**

an Open Access Journal by MDPI

Impact Factor 2.2 CiteScore 4.6



## **About the Journal**

## Message from the Editor-in-Chief

The journal *Mathematics* publishes high-quality, refereed papers that treat both pure and applied mathematics. The journal highlights articles devoted to the mathematical treatment of questions arising in physics, chemistry, biology, statistics, finance, computer science, engineering and sociology, particularly those that stress analytical/algebraic aspects and novel problems and their solutions. One of the missions of the journal is to serve mathematicians and scientists through the prompt publication of significant advances in any branch of science and technology, and to provide a forum for the discussion of new scientific developments.

### Editor-in-Chief

Prof. Dr. Francisco Chiclana

School of Computer Science and Informatics, De Montfort University, The Gateway, Leicester LE1 9BH, UK

### **Author Benefits**

## **High Visibility:**

indexed within Scopus, SCIE (Web of Science), RePEc, and other databases.

### Journal Rank:

JCR - Q1 (Mathematics) / CiteScore - Q1 (General Mathematics)

### **Rapid Publication:**

manuscripts are peer-reviewed and a first decision is provided to authors approximately 18.4 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).

