# Call for Papers – IEEE SIU 2025

## 33rd IEEE Conference on Signal Processing and Communications Applications
### June 25th-28th, 2025
### Işık University, Şile, İstanbul
### siu2025.isikun.edu.tr

We are pleased to announce the Call for Papers for the 33rd IEEE Conference on Signal Processing and Communications Applications (SIU), a premier venue for researchers and practitioners from academia and industry to share their advancements in the fields of communications, signal processing, and their applications. SIU 2025 will take place from June 25th 2025 to June 28th 2025, at Işık University Şile Campus, Istanbul.

## Important Dates

- **Paper Submission Deadline:** ~~March 9th 2025.~~ March 21st 2025 (Firm)
- **Notification of Acceptance:** May 2nd, 2025.
- **Camera-Ready Paper Deadline**: May 16th, 2025.
- **Conference Dates:** June 25th, 2025 to June 28th, 2025.

## Tracks and Topics of Interest

The conference invites original research papers on, but not limited to, the following topics, organized across five dedicated tracks. Original contributions on any topic in the broad fields of Communication and Signal Processing are also welcome.

### Track 1: Communications and Networking

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| Information Theory and Coding | Millimeter-Wave and Terahertz | Optical Communications and Networking |
| Wireless Communication and Networks | Physical Layer Security | Security and Privacy in Communications and Networking |
| Internet of Things (IoT) | Software-Defined Networks, Network Function Virtualization | Molecular and Nano Communications |
| Cyber-Physical Systems | Unmanned Aerial Vehicles and Non-Terrestrial Networks | Age and Value of Information in Communication Networks |
| Satellite and Deep Space Communications | Wireless Networks | Energy-Efficient and Green Networking |
| Energy Harvesting and Low Energy Communications | Communication Theory and Applications | Edge Computing, Edge Intelligence, and Fog Networks |
| Digital Twins | 5G/6G and Beyond Technologies | Network Security and Privacy |
| Quantum Communications | Vehicular Communications | Resource Allocation |
| Cooperative Communications and Networking | Integrated Sensing and Communications | Semantic and Goal-Oriented Communication |
| Holographic Surfaces and MIMO | Wireless Power and Information Transfer | Backscatter and RIS-based Communications |

### Track 2: Image Processing and Computer Vision

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|---|---|---|
| Image and Video Processing | Image and Video Coding/Compression | Remote Sensing and Geospatial Analysis |
| Object Detection and Pattern Recognition | Image and Video-Based Biometrics | Document Analysis and Understanding |
| Multichannel and Multi-Camera Processing | 3D Vision and Computational Photography | |

### Track 3: Signal Processing and Applications

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|---|---|---|
| Signal Processing Theory | Industrial and Automotive Applications | Signal Processing for Autonomous Systems |
| Nonlinear Signal Processing | E-Health Applications and Assistive Technologies | Robotics and Automation |
| Radar Signal Processing | Statistical Signal Processing | Real-Time Signal Processing and Embedded Systems |
| Signal Processing for Cybersecurity Applications | Audio/Speech Processing | Financial Signal Processing |
| Human-Computer Interaction and Behavior Analysis | Signal Processing for Smart Cities and Smart Grids | |

### Track 4: Machine Learning and Artificial Intelligence

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|---|---|---|
| Machine Learning Theory | Transfer, Semi-Supervised, and Unsupervised Learning* | Machine Learning, Deep Learning in Signal Proccessing |
| Natural Language Processing and Text Mining | Performance Analysis of Machine Learning Techniques | Adversarial Machine Learning and Robust AI |
| Multimodal Analysis | Machine Learning, Deep Learning for Communication Systems | Unsupervised and Generative Models |
| Explainable AI and Trustworthy Machine Learning | Deep Learning | Reinforcement Learning |

### Track 5: Biomedical Signal/Image Processing and Applications

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|---|---|---|
| Biomedical Signal Analysis | Telemedicine and Remote Patient Monitoring | Biometric Signal Processing |
| Bioinformatics and Genomic Signal Processing | Medical Image Analysis and Applications | Applications of Artificial Intelligence for Medical Diagnosis |
| Biomedical Data Privacy and Security | Wearable Sensors and E-Health | Neuroengineering and Brain Signal Processing |

## Submission Guidelines

- Paper Format: Submissions should be no more than four pages in length.
- Language: Papers must be written in Turkish. In case one or more of the authors are foreign nationals, the paper can be submitted in English.
- Review Process: All submissions will be double-blind peer-reviewed. Ensure manuscripts are anonymized.
- Publication: Accepted and presented papers will be published in IEEE Xplore Digital Library.

For detailed submission instructions, templates, and guidelines, please refer to the official conference website: siu2025.isikun.edu.tr.

We look forward to receiving your contributions and welcoming you to SIU 2025!

## Organizing Committee

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