2026 IEEE 10th International Conference on Fog and Edge Computing (ICFEC 2026)

Sydney, Australia
18-21 May 2026

IEEE Catalog Number: CFP26K56-POD
ISBN: 979-8-3315-7063-7

IEEE Advancing Technology for Humanity

Copyright © 2026, IEEE

All Rights Reserved

Copyright and Reprint Permissions:

Abstracting is permitted with credit to the source. Libraries are permitted to photocopy beyond the limit of U.S. copyright law for private use of patrons those articles in this volume that carry a code at the bottom of the first page, provided the per-copy fee indicated in the code is paid through Copyright Clearance Center, 222 Rosewood Drive, Danvers, MA 01923.

For other copying, reprint or republication permission, write to IEEE Copyrights Manager, IEEE Service Center, 445 Hoes Lane, Piscataway, NJ 08854. All rights reserved.

*** This is a print representation of what appears in the IEEE Digital Library. Some format issues inherent in the e-media version may also appear in this print version.

IEEE Catalog Number:	CFP26K56-POD
ISBN (Print-On-Demand):	979-8-3315-7063-7
ISBN (Online):	979-8-3315-7062-0
ISSN:	2694-3263

Additional Copies of This Publication Are Available From:

Curran Associates, Inc
57 Morehouse Lane
Red Hook, NY 12571 USA

Phone: (845) 758-0400
Fax: (845) 758-2633
E-mail: curran@proceedings.com
Web: www.proceedings.com



TABLE OF CONTENTS

K-Sense: A Non-Invasive eBPF Framework For QoS Inference 1
Abdullah Muslim, Ali Beiti Aydenlou, Stephan Recker

Cost-Effective Processing of IoT Data in the Computing Continuum 9
Vasileios Karagiannis, Dražen Ignjatović, Antonios Iosifidis, Stefan Schulte

LLMEdger: Phase-Aware Model Parallelism Scheduler for LLM Inference on Edge 17
Xinyang Shen, Lena Mashayekhy

Layer-Wise Weight Sharing for Efficient Transformer on SoCs 25
Saeed Khalilian, Hang Xu, Nirvana Meratnia, Anuj Pathania

Coral: Covariance-Guided Resource Adaptive Learning for Efficient Edge Inference 33
Ahmad N. L. Nabhaan, Zaki Sukma, Rakandhiya D. Rachmanto, Muhammad Husni Santriaji, Byungjin Cho Arief Setyanto, In Kee Kim

Order-Aware Compression for RF-DETR on Edge Devices: Overcoming Graph Fragmentation and Quantization Instability 41
Farhan Mahmood, Michalis Karamousadakis, Antonis Porichis, Vishwanathan Mohan Panagiotis Chatzakos

Multi-Provider Caching in Multi-Tier Fog Networks 49
Ferdous Sharifi, Shaahin Hessabi, Young Choon Lee

NL-CPS: Reinforcement Learning-Based Kubernetes Control Plane Placement in Multi-Region Clusters 57
Sajid Alam, Amjad Ullah, Ze Wang

UAV-Enabled Integrated Sensing, Semantic Communication, and Computation: Disaster-Oriented Edge Computing and Sensing 65
Yaxi Liu, Wencan Mao, Xulong Li, Meng Gu, Yu Xiao, Wei Huangfu, Keping Long

A Federated LLM-Based Framework for DDoS Defense in Mobile Edge Computing 73
Zhang Shuo, Mori Kousuke, Hirotsu Toshio

Atlas Synchronization in the Hierarchical Federated Learning Continuum 81
Antonios Iosifidis, Vasileios Karagiannis, Stefan Schulte

Lifetime-Aware Zone Allocation for ZNS SSDS 89
Jinyoung Kim, Doeun Kim, Junmo Seong, Hyuck Han, Sooyong Kang

Attention-Based Decomposition Framework for Joint Task Offloading and Resource Allocation in Multi-Task Multi-Server MEC 91
Hoa Tran-Dang, Dong-Seong Kim

Practical Monitoring Tool for ZNS SSD Emulator 93
Junmo Seong, Doeun Kim, Hyuck Han, Sooyong Kang