Junyu XUE

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EDUCATION

Southern University of Science and Technology, Shenzhen, China
Doctor of Engineering, Electronic and Information Engineering, Sept. 2029 (Expected)
China University of Petroleum (East China), Tsingtao, China
Bachelor of Engineering with Honors, Internet of Things Engineering, Jun. 2024

PUBLICATIONS

Conference Paper:

Prompting Large Language Models for Training-Free Non-Intrusive Load Monitoring
Junyu Xue, Xudong Wang, Xiaoling He, Shicheng Liu, Yi Wang, Guoming Tang
arXiv:2505.06330, 2025

Towards Real-world Deployment of NILM Systems: Challenges and Practices
Junyu Xue, Yu Zhang, Xudong Wang, Yi Wang, Guoming Tang
IEEE International Conference on Sustainable Computing and Communications (SustainCom), 2024, **Best Paper Award**

Fast-DecoupledNet: An Improved Multi-branch Edge Enhanced Semantic Segmentation Network
Junyu Xue, Zhiyuan Zhang
International Conference on Artificial Intelligence Technologies and Applications, 2023

Journal Paper:

A Review of Artificial Intelligence in Marine Science
Song Tao, Cong Pang, Boyang Hou, Guangxu Xu, **Junyu Xue**, Handan Sun, Fan Meng
Frontiers in Earth Science, 2023

RESEARCH EXPERIENCE

Research Assistant   Feb. 2025 - Present
SusCom Lab, The Hong Kong University of Science and Technology (Guangzhou)
Advisor: Prof. Guoming Tang
Topic: LLM Agents for Building Energy Management & Networked System for LLM Serving

Team Member   Sept. 2024 - Present
TSN Lab, Southern University of Science and Technology
Supervisor: Prof. Yi Wang
Topic: Data Center Network, RDMA, Networked System For LLMs

Research Intern   May. 2024
Zendure Technology Co., Ltd, R&D Center
Topic: Non-intrusive Load Monitoring System Development.

Team Member   Feb. 2022 - Jun. 2024
AITA Lab, China University of Petroleum (East China)
Advisor: Prof. Tao Song
Topic: AI For Science (Meteorology)

HONORS & AWARDS

Outstanding Student Cadre,
Southern University of Science and Technology   May. 2025

Best Paper Award, IEEE SustainCom 2024	Oct. 2024
Outstanding Graduate of Shandong Province, China	Jan. 2024
Xiaomi Top Grade Scholarship (Only 4 undergraduate students, 20000RMB)	Nov. 2023
Second Prize, China Collegiate Computing Contest-Network Technology Challenge	Sep. 2023
Third Prize, China Software Cup, College Student Software Design Competition	Aug. 2023
Tsingtao City Outstanding University Student (Top 1000)	May. 2023
First Prize in Shandong Province, China Undergraduate Mathematical Contest in Modeling	Nov. 2022
First Prize in the Eastern Division, CCF Big Data & Computing Intelligence Contest	Nov. 2022

SKILLS

Languages: English (Passed CET-4&6), Mandarin (Native).
Programming: Python, C, C++, Java, SQL, LaTeX.
Frameworks & Softwares: Pytorch, Matlab, Docker, Office.

RESERACH INTERESTS

Data Center Network, Machine Learning System, Computing Power Network, Applied AI (AI4Sustainability).