## Xianliang Li

yinleung.ley@gmail.com  $\cdot$  www.yinleung.com Tokyo, Japan

### Research interests

Deep Learning Theory, Optimization

### Education

| 2025 – 2028<br>(Expected) | <b>The Graduate University for Advanced Studies, SOKENDAI</b> Ph.D. in Statistical Science |
|---------------------------|--|
| 2022 – 2025               | University of Chinese Academy of Sciences M.Eng. in Computer Technology                    |
| 2018 - 2022               | Sun Yat-sen University B.S. in Physics   |

### **Publications**

# 2025 Time-of-Arrival Simultaneous Sensor and Target Localization with Dynamic Optimal Sensor Placements

**Xianliang Li**, Sheng Xu<sup>†</sup>, K. C. Ho.

IEEE Transactions on Aerospace and Electronic Systems.

## AOA Sensor Placement for Anchor-Assisted Target Localization in GNSS-Denied Environment: Formulation, Bounds and Optimization

Sheng Xu, Linlong Wu, **Xianliang Li**, Xinyu Wu<sup>†</sup>, Tiantian Xu<sup>†</sup>.

IEEE Transactions on Mobile Computing.

# 2025 On the Performance Analysis of Momentum Method: A Frequency Domain Perspective

**Xianliang Li**\*, Jun Luo\*, Zhiwei Zheng\*, Hanxiao Wang, Li Luo, Lingkun Wen, Linlong Wu, Sheng  $Xu^{\dagger}$ .

International Conference on Learning Representations (ICLR).

<sup>\* -</sup> equal contribution, † - corresponding author.

### 2024 Systematical Sensor Path Optimization Solutions for AOA Target Localization Accuracy Improvement with Theoretical Analysis

Sheng Xu, Bing Zhu, **Xianliang Li**, Xinyu Wu, Tiantian Xu<sup>†</sup>.

IEEE Transactions on Vehicular Technology.

# 2024 3D Source Tracking Using a Position-Unknown AOA Sensor with Measurement Drift and UAV Moving Direction Optimization

Rongrong Xu, Sheng  $Xu^{\dagger}$ , Kaimin Cao, **Xianliang Li**, Jialiang Wang, Wujing Cao. *IEEE International Conference on Real-time Computing and Robotics*.

## Experience

October 2025 - The Institute of Statistical Mathematics, Research Assistant

Present Mentors: Professor Han Bao.

July 2025 - **The Chinese University of Hong Kong, Visiting Student** 

Present Mentors: Professor Weiyang Liu.

September 2023 Shenzhen Institutes of Advanced Technology, Research Student

– June 2025 Mentors: Professor Sheng Xu.

• Acted as the team leader and studied the optimizer of deep learning.

• Studied sensor localization and estimation under Prof. Sheng Xu.

2019 – 2020 Cantonese Association of Sun Yat-sen University, President

• Organized Cantonese cultural activities.

### **Awards**

#### 2025 - Present **SOKENDAI Special Researcher**

Supported by JST SPRING, Japan Grant Number JPMJSP2104.

### Technical skills

#### **Coding & Software**

Familiar: Python, MATLAB, LATEX, PyTorch, Git. Basic: C++.

#### Languages

Cantonese: Native. Mandarin: Native. English: Competent.

#### Presentation

Presented research at machine learning conference: ICLR 2025.