

JIAMENG LYU

✉ lvjm21@mails.tsinghua.edu.cn · 🔗 <https://jiamenglyu.github.io>

EDUCATION

Tsinghua University, Beijing, China Aug. 2021 – Jun. 2025 (Expected)

Ph.D. Candidate in **Operations Research** *Department of Mathematics* **Advisor:** Prof. Yuan Zhou

University of Science and Tchenology of China (USTC), Hefei, China Aug. 2017 – Jul. 2021

B.S. in Statistics (Honor Degree)

Rank: 2 / 40 **Guo Moruo Schlorship** (the highest honor for undergraduates in USTC)

RESEARCH INTERESTS

Data-driven Decision-Making in Operations Management including online learning, online optimization, statistical machine learning, and their applications to **inventory management** and **revenue management**.

PUBLICATIONS AND PREPRINTS

Publications (* refers to alphabetical order and ** refers to equal contribution)

- [1] Xi Chen*, **Jiameng Lyu***, Yining Wang*, Yuan Zhou*. [Network Revenue Management with Demand Learning and Fair Resource-Consumption Balancing](#). *Production and Operations Management*, 33(2), 494-511, 2024.
- [2] Qi Qi**, **Jiameng Lyu****, Kung-Sik Chan, Er-Wei Bai, Tianbao Yang. [Stochastic Constrained DRO with a Complexity Independent of Sample Size](#). *Transactions on Machine Learning Research*, 2023.

Paper Under Revision or Review

- [3] **Jiameng Lyu***, Jinxing Xie*, Shilin Yuan*, Yuan Zhou*. [A Minibatch-SGD-Based Learning Meta-Policy for Inventory Systems with Myopic Optimal Policy](#). Under major revision at *Management Science*.
- [4] Xi Chen*, **Jiameng Lyu***, Xuan Zhang*, Yuan Zhou*. [Fairness-aware Online Price Discrimination with Nonparametric Demand Models](#). Under major revision at *Operations Research*.
- [5] Xin Chen*, **Jiameng Lyu***, Shilin Yuan*, Yuan Zhou*. [Learning in Lost-Sales Inventory Systems with Stochastic Lead Times and Random Supplies](#). Under major revision at *Management Science*.
- [6] Shilin Yuan, **Jiameng Lyu**, Jinxing Xie, Yuan Zhou. [Asymptotic Optimality of Base-Stock Policies for Lost-Sales Inventory Systems with Stochastic Lead Times](#). Submitted.

Working in Progress

- [7] **Jiameng Lyu***, Shilin Yuan*, Bingkun Zhou*, Yuan Zhou*. Closing the Gaps: Optimality of Sample Average Approximation for Data-Driven Newsvendor Problems.
- [8] Xin Chen*, **Jiameng Lyu***, Shilin Yuan*, Yuan Zhou*. Nonstationary Sample Average Approximation with Applications in Inventory Management.

TEACHING EXPERIENCES

At Tsinghua University:

- Co-Instructor: Probability Tutorial Course for Yau College Student Mathematics Contest Spring 2022
- Teaching Assistant: Mathematical Modelling (00420033) Spring 2024
- Teaching Assistant: Advanced Numerical Analysis (60420024) Fall 2023
- Teaching Assistant: Machine Learning Theory (84760144) Spring 2023
- Teaching Assistant: Mathematical Foundations of Machine Learning (44760153) Spring 2022
- Teaching Assistant: Linear Algebra (10421324) Fall 2021

At University of Science and Technology of China:

- Teaching Assistant: Mathematical Analysis B2 (MATH1007) Spring 2021

- Teaching Assistant: Mathematical Analysis B1 (MATH1006)
- Teaching Assistant: Linear Algebra (001519)

Fall 2020
Spring 2020

SELECTED AWARDS

- National Scholarship (Top **1%**) Oct. 2023
- Yau Mathematical Sciences Center Outstanding Graduate Scholarship, First Prize (Top **5%**) Sept. 2023
- Honorary Rank in USTC (Top **5%**) Jun. 2021
- Outstanding Graduate in USTC (Top **10%**) Jun. 2021
- Outstanding Undergraduate Thesis Award in USTC (Top **5%**) Jun. 2021
- Guo Moruo Scholarship (Top **1%**) Apr. 2021

PROFESSIONAL SERVICES

- **Reviewer for:**
 - *Operations Research*
 - *International Conference of Machine Learning (ICML 2022)*
 - *International Computing and Combinatorics Conference (COCOON 2022)*
- **Session Chair for:** *POMS-HK International Conference (2024)*

INVITED TALKS

- “A Minibatch-SGD-Based Learning Meta-Policy for Inventory Systems with Myopic Optimal Policy”
 - Tsinghua University, Prof. Yong Liang’s Group in School of Economics and Management, Apr. 2024
- “Learning in Lost-Sales Inventory Systems with Stochastic Lead Times and Random Supplies” *POMS-HK International Conference (2024)* Jan. 2024
- “Network Revenue Management with Demand Learning and Fair Resource-Consumption Balancing” *POMS-HK International Conference (2024)* Jan. 2024