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Education

- **Ph.D.**, National University of Singapore, Singapore. 2017.12.
- **Master**, Huazhong University of Science and Technology, China. 2014.03.
- **Bachelor**, Huazhong University of Science and Technology, China. 2011.06.

Academic Appointments

- **Professor**. School of Economics & Management, Nanjing University of Science & Technology. 2019.08 ~ present.
- **Research Fellow**. Department of Civil & Environmental Engineering, National University of Singapore. 2018.01 ~ 2019.08.
- **Research Assistant**. Department of Civil & Environmental Engineering, National University of Singapore. 2014.03 ~ 2017.12.
- **Research Assistant**. Department of Civil & Environmental Engineering, Hong Kong Polytechnic University. 2012.10 ~ 2012.12.

Research Interests

- Logistics & Freight Transportation Optimization
- Urban Transport Economics & Analysis
- Maritime Shipping Operation Management

Awards & Prizes

- **OCDI Takeuchi Yoshio Logistics Award** in the Sixth International Conference on Transportation and Logistics (T-LOG 2016). 2016.09.
- **The First Prize of Student Paper Competition Award** in the 2015 International Conference on Logistics and Maritime Systems (LOGMS 2015). 2015.09
- **Excellent Master Thesis Award** of Hubei Province of China. 2015.06
- Excellent University Graduates. Huazhong University of Science and Technology, China. 2014.03 & 2011.06
- National Scholarship. Ministry of Education of China. 2013.10.

Publications

Journal Papers

Published or accepted:

- [1] **Wang, Y.**, & Meng, Q., Jia, P., Optimal port call adjustment for liner container shipping routes. *Transportation Research Part B: Methodological*, 128, 107-128,
- [2] **Wang, Y.**, & Meng, Q., (2019) Semi-liner shipping service design. *Transportation Science*. Accepted.
- [3] **Wang, Y.**, & Meng, Q., (2019) Integrated method for forecasting container slot booking in intercontinental liner shipping service. *Flexible Services and Manufacturing Journal*. 31(3), 653-674.
- [4] Zhao, H., Meng, Q., & **Wang, Y.**, Exploratory data analysis for the cancellation of container slot booking in container liner shipping: a case study of Asia-North America service. *Transportation Research Part C*. Accepted.

- [5] Meng, Q., Zhao H., **Wang, Y.**, (2019). Revenue management for container liner shipping services: Critical review and future research directions. *Transportation Research Part E: Logistics and Transportation Review* 128, 280-292.
- [6] **Wang, Y.**, Meng, Q., & Kuang, H., (2019). Intercontinental liner shipping service design. *Transportation Science*. 53(2). 344-364.
- [7] Tan, Z., **Wang, Y.**, Meng, Q., & Liu Z., (2018) Joint ship arrival schedule design and sailing speed determination for an inland shipping route with uncertain dam transit time. *Transportation Science*. 52(6). 1570-1588.
- [8] **Wang, Y.**, Meng, Q., & Kuang, H., (2018). Jointly optimizing ship sailing speed and bunker purchase in liner shipping with distribution-free stochastic bunker prices. *Transportation Research Part C*, 89, 35-52.
- [9] **Wang, Y.**, Meng, Q., & Tan, Z., (2018). Short-term liner shipping bunker procurement problem with swap contracts. *Maritime Policy & Management*, 42(2), 211-238.
- [10] Li, Z. C., **Wang, Y.** (2018). Analysis of multimodal two-dimensional urban system equilibrium for cordon toll pricing and bus service design. *Transportation Research Part B: Methodological*, 111, 244-265.
- [11] Zhao, K., Jin, J. G., **Wang, Y.**, & Lee, D. H. (2018). Optimizing the link directions of personal rapid transit network. *IEEE Transactions on Intelligent Transportation Systems*, 19(10), 3414-3419.
- [12] Meng, Q., Du, Y., & **Wang, Y.** (2016). Shipping log data based container ship fuel efficiency modeling. *Transportation Research Part B: Methodological*, 83, 207-229.
- [13] **Wang, Y.**, Meng, Q., & Du, Y. (2015). Liner container seasonal shipping revenue management. *Transportation Research Part B: Methodological*, 82, 141-161.
- [14] Meng, Q., **Wang, Y.**, & Du, Y. (2015). Bunker Procurement Planning for Container Liner Shipping Companies: Multistage Stochastic Programming Approach. *Transportation Research Record: Journal of the Transportation Research Board*, (2479), 60-68.
- [15] Du, Y., Meng, Q., & **Wang, Y.** (2015). Budgeting fuel consumption of container ship over round-trip voyage through robust optimization. *Transportation Research Record: Journal of the Transportation Research Board*, (2477), 68-75.
- [16] Li, Z. C., **Wang, Y. D.**, Lam, W. H., Sumalee, A., & Choi, K. (2014). Design of sustainable cordon toll pricing schemes in a monocentric city. *Networks and Spatial Economics*, 14(2), 133-158.
- [17] Li, Z. C., Chen, Y. J., **Wang, Y. D.**, Lam, W. H., & Wong, S. C. (2013). Optimal density of radial major roads in a two-dimensional monocentric city with endogenous residential distribution and housing prices. *Regional Science and Urban Economics*, 43(6), 927-937.

Submitted:

- [18] Wang, Y., Meng, Q., Optimizing freight rate of spot market containers with uncertainties in shipping demand and available ship capacity. Submitted to *Transportation Research Part B*.
- [19] Lu, Z., **Wang, Y.**, & Meng, Q., Optimal route location and distance-based toll determination of a build-operate-transfer highway with multi-type vehicles. In preparation.
- [20] Zhao, H., **Wang, Y.**, Meng, Q., Estimating the probability of container slot cancellations in liner shipping. Submitted to *Transportation Research Part C*.

Conference Papers

- [21] **Wang, Y.**, & Zhao, H., (2018). Prototype for the Analysis of Container Slot Booking Data. The International Conference on Transportation and Logistics (T-LOG) 2018. Dalian, China
- [22] **Wang, Y.**, & Meng, Q. (2017). Slot booking data based liner container shipping demand forecasting for intercontinental shipping service. Transportation Research Board (TRB) 96th Annual Meeting. Washington, USA.
- [23] **Wang, Y.**, & Meng, Q. (2016) Bunkering problem with bunker price uncertainty. The Sixth International Conference on Transportation and Logistics (T-LOG) 2016. Hsinchu, Taiwan.
(**OCDI Takeuchi Yoshio Logistics Award for T-LOG**)
- [24] **Wang, Y.** & Meng, Q. (2015). Optimal hedging for liner bunker procurement. The 2015 International Conference on Logistics and Maritime Systems (LOGMS 2015). Hong Kong.
(**Best student paper award for LOGMS**).

- [25] Meng, Q., & **Wang, Y.**, Du, Y. (2015). Bunker procurement planning for container liner shipping companies: a multi-stage stochastic programming approach. Transportation Research Board (TRB) 94th Annual Meeting. Washington, USA.
- [26] Du., Y., Meng, Q., & **Wang, Y.** (2015). Budgeting Fuel Consumption of Container Ship over Round-Trip Voyage through Robust Optimization. Transportation Research Board (TRB) 94th Annual Meeting. Washington, USA.
- [27] **Wang, Y.** (2013). Optimal Cordon Toll Pricing Scheme in a Radial Monocentric City. Proceedings of the 18th international conference of Hong Kong society for transportation studies (HKSTS18). Hong Kong.

Research Grants/Projects

- **NOL Fellowship Grant Project**
Joint research project with Haulio: Container haulage problems: model development, effective algorithm design and applications. *National University of Singapore*. Singapore.
 - Project Duration: 2019 ~ 2021
 - **Role: Co-PI.**
- **NOL Fellowship Grant Project**
Joint project with American President Lines (APL): Liner Shipping Container Slot Booking Patterns and Their Applications to the Shipping Revenue Management. *National University of Singapore*. Singapore.
 - Project Duration: 2017.02 ~ 2019.07.
 - Role: Key team member. Focus on data analysis, building demand forecasting models (**integrated into APL's internal decision support system**) and developing revenue management strategies.
- **NOL Fellowship Grant Project**
Joint project with APL: Big Shipping Log Data Driven Ship Fuel Efficiency Analysis and Management: Model Building & Software Development. *National University of Singapore*. Singapore.
 - Project Duration: 2015.01 ~ 2016.12.
 - Role: Key team member. Focus on data analysis, model building, and software development
- **National Key Social Science Foundation Grant of China (中国社会科学基金重大项目)**
Investigation and Evaluation on Vulnerabilities of Urban Transit System. PI: Zhi-Chun Li. 2013. Huazhong University of Science and Technology, Wuhan, China.
 - Role: participant in the data collection and modeling building.

Academic Services & Activities

- **Invited reviewer for journals**
 - Transportation Research Part B (**Outstanding reviewer award**)
 - Transportation Research Part E (**Outstanding reviewer award**)
 - Flexible Services and Manufacturing Journal
 - Journal of Transportation Engineering Part A
 - Computers & Operations Research
 - IEEE Transactions on Intelligent Transportation Systems
- **Invited seminars**
 - Optimal Design for Intercontinental Liner Container Shipping Service Design. 2018.09. School of Civil and Environmental Engineering. Nanyang Technological University.
 - Liner Shipping Bunkering Problem with Bunker Price Uncertainty. 2016.09.01. Centre for Maritime Studies (CMS). National University of Singapore
 - Integrated bunker price predicting and bunker procurement planning model for container liner shipping companies. 2015.03.03. Centre for Maritime Studies (CMS), National University of Singapore

Teaching & Mentoring Experience

- **Teaching Assistant.**
 - National University of Singapore. 2017.01 ~ 2018.05. Courses taught:
 - Transport and Freight Terminal Management
 - Operations & Management of Infrastructure Systems
 - Project Management
 - Huazhong University of Science and Technology. 2011.09 ~ 2012.06. Courses taught:
 - Computer Programming Language
 - Operations Research
- **Tutor for Final Year Projects.** Students advised:
 - Teo Ying Kiat. 2017.08 ~ 2018.03
 - Topic: Container shipping revenue management
 - Wong Lue Wei Marco Ataru and Li Siwan. 2016.08 ~ 2017.03
 - Topic: Forecasting of container slot booking & cancellation
 - Zhong Nishan. 2015. 08 ~ 2016.03
 - Topic: Containership fuel consumption modelling & optimization
- **Graduate Student Instructor.** Student advised:
 - Zhao Hui. 2016.08 ~ present.

Teaching Competence

Courses include but not limited to

- Transportation System Modelling & Optimization
- Transportation Planning
- Traffic Flow Theory
- Intelligent Transportation Systems
- Logistics and Freight Transportation