

Name: Dr XU Chi
Designation: Team Lead & Scientist III
Phone number: 63194457
Email: cxu@SIMTech.a-star.edu.sg
Programme: Manufacturing System Analyses (MSA) Team

Introduction:

Xu Chi received his B.Eng. (Hons) and Ph.D from Nanyang Technological University (NTU), Singapore. Before he joined SIMTech A*Star, he was working in Keppel Engineering as Electrical Engineer and in NTU as a research officer for RFID track and trace.

After joined SIMTech in 2009, Xu Chi has been working in the area of data analysis and information management for supply chain applications. Over the past ten years in SIMTech, he has developed various technologies for RFID track and trace and unstructured data analytics, which have been licensed to SMEs, LLEs, and MMCs such as LHT, NTUC Fairprice and Airbus in various industries such as aerospace, construction, transportation&logistics, and fast moving consumer goods (FMCG).

Xu Chi is currently leading Manufacturing System Analyses (MSA) Team and is responsible for the research direction as well as capabilities development of MSA team for operation analytics and system modelling & simulation. He is also the Industry Initiative Lead for Last Mile Logistics Management under the Manufacturing Productivity Technology Centre. As an Initiative lead, he actively engages the industry and develops solutions to drive industry adoption of data-driven logistic information management and planning.

Xu Chi was a recipient of the SIMTech Licensing Award in 2011 and 2019, SIMTech Best Industry Project Award in 2019, A*Star Borderless Award 2012 and MTI Borderless Award 2013 (as a member of SIMTech MPTC centre). He also holds the appointment as an Adjunct Assistant Professor of School of Computer Science and Engineering of Nanyang Technological University, Singapore.

Research Interest:

- 1) Machine learning and data mining for enterprise and supply chain applications
- 2) Information management for supply chain track and trace
- 3) Data-driven decision support for enterprise and supply chain applications

BioNotes:

PhD (Electrical & Electronic Engineering), BEng (Electrical & Electronic Engineering)

Publications:

1. Debdeep Paul, Chi Xu, and Zeng Jing, "Revenue optimized capacity management for integrators in air freight industry under uncertainty," 4th IEEE workshop on Big Data Analytics in Supply Chain and Transportation in IEEE International Conference on Big Data, Seattle, USA, December 10 - 13, 2018, accepted.
2. Tan Chin Sheng, Ng Zhong Jing, Chi Xu, "A GA-based method for sales order allocation in a MTS/ MTO supply chain," IEEM 2017, Dec 10-13, Singapore.
3. G. Ertek, C. Xu, and A. N. Zhang, "A framework for mining RFID data from schedule-based systems," IEEE Transactions on Systems, Man, and Cybernetics: Systems, vol. 47, no. 11, pp. 2967-2984, 2017.
4. Siwei Jiang, Chi Xu, Abhishek Gupta, Liang Feng, Yew-Soon Ong, Allan N. Zhang, and P. S. Tan, "Complex and intelligent systems in manufacturing," IEEE Potentials, July 2016, vol. 35, issue 4, pp. 23-28.
5. G. Ertek, B-G Choi, Chi Xu, D. Yang and B. Y. Ong , "Graph-based analysis of resource dependencies in project networks", IEEE Workshop on Big data Analytics in Manufacturing and Supply Chains in IEEE International Conference on Big Data, Santa Clara, CA, USA, Oct 29-Nov 01, 2015, pp. 2053-2059.
6. Dazhi Yang, G. Goh, Chi Xu, Allan Zhang, and Orkan Akcan, "Forecast UPC-Level FMCG demand, Part I: exploratory analysis and visualization," IEEE Workshop on Big data Analytics in Manufacturing and Supply Chains in IEEE International Conference on Big Data, Santa Clara, CA, USA, Oct 29-Nov 01, 2015, pp. 2016-2012.
7. Moath Jarrah, Bernard P. Zeigler, Chi Xu and Jie Zhang, "A multi-agent simulation framework to support agent interactions under different domains," the 18th Asia Pacific Symposium on Intelligent and Evolutionary Systems, (IES 2014), 2014, Singapore, Volume 1.
8. Chi Xu, Wei He, and Sun Jian Ping, "Quantitative payoff evaluation for track and trace system in supply chains," IEEE SMC 2014, San Diego, CA, USA, Oct 5-8, pp. 3317-3322.