L. Jeff Hong, Ph.D.

Fudan Distinguished Professor
School of Management & School of Data Science
Fudan University
530 Siyuan Building, 670 Guoshun Road, Yangpu, Shanghai 200433
http://jeffhongliu.github.io

Updated: June 12, 2020

Research Interests

Stochastic simulation, stochastic optimization, machine learning and artificial intelligence, production and supply chain management, financial risk management, healthcare management

Education

Ph.D. (June 2004), M.S. (June 2002), Industrial Engineering and Management Sciences, Northwestern University.

M.S. (June 2001), Applied Mathematics, University of Cincinnati.

B.E. (July 1999), Industrial Engineering, and B.E. (July 1999), Automotive Engineering, Tsinghua University, China.

Experience

Department of Management Science, School of Management & School of Data Science, Fudan University

- Fudan Distinguished Professor (2018 – present)
- Hongyi Chair Professor (2018 – present)

Department of Management Sciences and Department of Economics and Finance, College of Business, City University of Hong Kong

- Chair Professor of Management Sciences (2014 – 2017)
- Endowed Chair Professor of Management Sciences (2017 – 2018)

Department of Industrial Engineering and Logistics Management, Hong Kong University of Science and Technology

- Professor (2011 – 2014), Associate Professor (2009 – 2011), Assistant Professor (2004 – 2009)
- Director (2013 – 2014), M.Sc. Program in Engineering Enterprise Management
- Founder and Director (2011 – 2014), Financial Engineering Laboratory
- Associate Director (2010 – 2014), Logistics and Supply Chain Management Institute

Department of Decision Sciences, NUS Business School, National University of Singapore

- Visiting Professor (January – March 2012)

Department of Management Science, School of Management, Fudan University

- Visiting Professor (September – December 2011)

Awards and Honors

Excellent Paper Award, *Journal of Operations Research Society of China*, 2020
Outstanding Research Award, Operations Research Society of China, 2014
Best Teacher Award, M.Sc. Program in Engineering Enterprise Management, HKUST, 2014

Meritorious Service Award, *Operations Research*, 2013, 2008
Outstanding Simulation Publication Award, INFORMS Simulation Society, 2012
Visiting Siyuan Chair Professorship, Nanjing University, 2010-2013
Visiting Senior Financial Economist, Shanghai Stock Exchange, 2010
IIE Transactions Best Paper Award – Operations Engineering, 2009
The School of Engineering Distinguished Teaching Award, HKUST, 2008
INFORMS Junior Faculty Interest Group Paper Competition, Second Prize, 2007
Arthur P. Hurter Award for Outstanding Academic Excellence, Northwestern University, 2002

Editorial Service

Area Editor (2018 – present), *Operations Research*
Associate Editor (2018 – present), *Management Science*
Associate Editor (2007 – present), *ACM Transactions on Modeling and Computer Simulation*
Associate Editor (2008 – 2017), *Operations Research*
Associate Editor (2006 – 2017), *Naval Research Logistics*

Guest Editor, *Annals of Operations Research* on Service Science (ICSS2009), Vol. 192, 2012
Guest Editor, *ACM Transactions on Modeling and Computer Simulation* Special Issue on Emerging Methodologies and Applications in Stochastic Simulation, Volume 24 Issue 4, 2014

Journal Papers

J1. Hong, L. J., Z. Huang, and H. Lam. Learning-based robust optimization: Procedures and statistical guarantee. *Management Science*, forthcoming.

J2. Hong, L. J., C. Li, and J. Luo. Technical note: Finite-time regret analysis of Kiefer-Wolfowitz stochastic approximation algorithm and nonparametric multi-product dynamic pricing with unknown demand. *Naval Research Logistics*, forthcoming.

J3. Jiang, G., L. J. Hong, and B. L. Nelson. 2020. Online risk monitoring using offline simulation. *INFORMS Journal on Computing*, 32:356-375.

J4. Fan, W., L. J. Hong, and X. Zhang. 2020. Robust selection of the best. *Management Science*, 66:.190-208.

J5. Hong, L. J. and G. Jiang. 2019. Offline simulation online application: A new framework of simulation-based decision making. *Asia-Pacific Journal of Operational Research*, 36:1-22.

J6. Yun, X., L. J. Hong, G. Jiang, and S. Wang. 2019. On gamma estimation via matrix kriging. *Naval Research Logistics*, 66:393-410.

J7. Shen, H., L. J. Hong, and X. Zhang. 2018. Enhancing stochastic kriging for queueing simulation with stylized models. *IISE Transactions*, 50:943–958.

J8. Fang, J. and L. J. Hong. 2018. A simulation-based estimation method for bias reduction *IISE Transactions*, 50:14-26.

J9. Hong, L. J. and G. Jiang. 2017. Gradient and Hessian of joint probability functions with applications on chance constrained programs. *Journal of Operations Research Society of China*, 5:431-455.

J10. Hong, L. J., S. Juneja, and G. Liu. 2017. Kernel smoothing for nested estimation with application to portfolio risk measurement. *Operations Research*, 65:657-673.

J11. Fan, W., L. J. Hong, and B. L. Nelson. 2016. Indifference-zone-free selection of the best. *Operations Research*, 64:1499-1514.

J12. Luo, J., L. J. Hong, B. L. Nelson, and Y. Wu. 2015. Fully sequential procedures for large-scale ranking-and-selection problems in parallel computing environments. *Operations Research*, 63:1177-1194.

J13. Hong, L. J., X. Xu, and S. H. Zhang. 2015. Capacity reservation for time-sensitive service providers: An application in seaport management. *European Journal of Operational Research*, 245:470-479.

J14. Hong, L. J., J. Luo, and B. L. Nelson. 2015. Chance constrained selection of the best. *INFORMS Journal on Computing*, 27:317-334.

J15. Sun, L., L. J. Hong, and Z. Hu. 2014. Balancing exploitation and exploration in discrete optimization via simulation through a Gaussian process-based search. *Operations Research*, 62:1416-1438.

J16. Hong, L. J. Z. Hu, and G. Liu. 2014. Monte Carlo methods for value-at-risk and conditional value-at-risk: A review. *ACM Transactions on Modeling and Computer Simulation*, 24:22/1-22/37.

J17. Hong, L. J., S. Juneja, and J. Luo. 2014. Estimating sensitivities of portfolio credit risk using Monte Carlo. *INFORMS Journal on Computing*, 26:848-856.

J18. Hong, L. J., Z. Hu, and L. Zhang. 2014. Conditional value-at-risk approximation to value-at-risk constrained programs: A remedy via Monte Carlo. *INFORMS Journal on Computing*, 26:385-400.

J19. Xu, J., B. L. Nelson, and L. J. Hong. 2013. An adaptive hyperbox algorithm for high-dimensional discrete optimization via simulation problems. *INFORMS Journal on Computing*, 25:133-146.

J20. Hu, Z., L. J. Hong, and L. Zhang. 2013. A smooth Monte Carlo approximation to joint chance-constrained programs. *IIE Transactions*, 45:716-735.

J21. Chang, K.-H., L. J. Hong, and H. Wan. 2013. Stochastic trust-region response-surface method (STRONG) – A new response surface framework for simulation optimization. *INFORMS Journal on Computing*, 25:230-243.

J22. Hu, Z., Cao, J., and L. J. Hong. 2012. Robust simulation of global warming policies using the DICE model. *Management Science*, 58:2190-2206.

J23. Zhang, J., L. J. Hong, and R. Q. Zhang. 2012. Fighting strategies in a market with counterfeits. *Annals of Operations Research*, 192:49-66.

J24. Hong, L. J., Y. Yang, and L. Zhang. 2011. Sequential convex approximations to joint chance constrained programs: A Monte Carlo approach. *Operations Research*, 59:617-630.

J25. Liu, G. and L. J. Hong. 2011. Kernel estimation of the Greeks of financial options. *Operations Research*, 59:96-108.

J26. Hong, L. J., B. L. Nelson, and J. Xu. 2010. Speeding up COMPASS for high-dimensional discrete optimization via simulation. *Operations Research Letters*, 38:550-555.

J27. Sun, L. and L. J. Hong. 2010. Asymptotic representations for importance-sampling estimators of value-at-risk and conditional value-at-risk. *Operations Research Letters*, 38:246-251.

J28. Hong, L. J. and G. Liu. 2010. Pathwise estimation of probability sensitivities through terminating and steady-state simulations. *Operations Research*, 58:357-370.

J29. Xu, J., B. L. Nelson and L. J. Hong. 2010. Industrial Strength COMPASS: A comprehensive algorithm and software for optimization via simulation. *ACM Transactions on Modeling and Computer Simulation*, 20: 3/1-3/29.

J30. Fu, M. C., L. J. Hong and J. Q. Hu. 2009. Conditional Monte Carlo estimation of quantile sensitivities. *Management Science*, 55: 2019-2027.

J31. Liu, G. and L. J. Hong. 2009. Revisit of stochastic mesh method for pricing American options. *Operations Research Letters*, 37:411-414.

J32. Liu, G and L. J. Hong. 2009. Kernel estimation of quantile sensitivities. *Naval Research Logistics*, 56: 511-525.

J33. Hong, L. J. and G. Liu. 2009. Simulating sensitivities of conditional value-at-risk. *Management Science*, 55: 281-293.

J34. Hong, L. J. 2009. Estimating quantile sensitivities. *Operations Research*, 57: 118-130.

J35. Hong, L. J. and B. L. Nelson. 2007. Selecting the best system when systems are revealed sequentially. *IIE Transactions*, 39:723-734.

J36. Hong, L. J. and B. L. Nelson. 2007. A framework of locally convergent random search algorithms for discrete optimization via simulation. *ACM Transactions on Modeling and Computer Simulation*, 17: 19/1-19/22.

J37. Pichitlamken, J., B. L. Nelson, and L. J. Hong. 2006. A sequential procedure for neighborhood selection-of-the-best in optimization via simulation. *European Journal of Operational Research*, 173:283-298.

J38. Hong, L. J. 2006. Fully sequential indifference-zone selection procedures with variance dependent sampling. *Naval Research Logistics*, 53:464-476.

J39. Hong, L. J. and B. L. Nelson. 2006. Discrete optimization via simulation using COMPASS. *Operations Research*, 54:115-129.

J40. Hong, L. J. and B. L. Nelson. 2005. The tradeoff between sampling and switching: New sequential procedures for indifference-zone selection. *IIE Transactions*, 37:623-634.

Refereed Conference Proceedings

P1. Jiang, W. X., B. L. Nelson, and L. J. Hong. 2019. Estimating sensitivity to input model variance. *Proceedings of the 2019 Winter Simulation Conference*, pp. 3705-3716.

P2. Zhong, Y. and L. J. Hong. 2018. Fully sequential ranking and selection procedures with PAC guarantee. *Proceedings of the 2018 Winter Simulation Conference*, pp. 1898-1908.

P3. Sun, W., Z. Hu, and L. J. Hong. 2018. Gaussian mixture model-based random search for continuous optimization via simulation. *Proceedings of the 2018 Winter Simulation Conference*, pp. 2003-2014.

P4. Zhong, Y. and L. J. Hong. 2017. A new framework of designing sequential ranking-and-selection procedures. *Proceedings of the 2017 Winter Simulation Conference*, pp. 2237 - 2244.

P5. Shen, H., L. J. Hong, and X. Zhang. 2017. Ranking and selection with covariates. *Proceedings of the 2017 Winter Simulation Conference*, pp. 2137 - 2148.

P6. Hong, L. J., Z. Huang, and H. Lam. 2016. Approximating data-driven joint chance constrained programs via uncertainty set construction. *Proceedings of the 2016 Winter Simulation Conference*, pp. 389-400.

P7. Jiang, G., L. J. Hong, and B. L. Nelson. 2016. A simulation analytics approach to dynamic risk monitoring. *Proceedings of the 2016 Winter Simulation Conference*, pp. 437-447.

P8. Hong, L. J., J. Luo, and Y. Zhong. 2016. Speeding up pairwise comparisons for large scale ranking and selection. *Proceedings of the 2016 Winter Simulation Conference*, pp. 749-757.

P9. Hong, L. J. and H. Lam. 2015. A statistical perspective on linear programs with uncertain parameters. *Proceedings of the 2015 Winter Simulation Conference*, pp. 3690 - 3701.

P10. Song, E., B. L. Nelson, and L. J. Hong. 2015. Input uncertainty and indifference-zone ranking and selection. *Proceedings of the 2015 Winter Simulation Conference*, pp. 414 - 424.

P11. Hu, Z. and L. J. Hong. 2015. Robust simulation of stochastic systems with input uncertainties modeled by statistical divergences. *Proceedings of the 2015 Winter Simulation Conference*, pp. 643 - 654.

P12. Fan, W. and L. J. Hong. 2014. A frequentist selection-of-the-best procedure without indifference zone. *Proceedings of the 2014 Winter Simulation Conference*, pp. 3737-3748.

P13. Zhang, X., L. J. Hong, and J. Zhang. 2014. Scaling and modeling of call center arrivals. *Proceedings of the 2014 Winter Simulation Conference*, pp. 476-485.

P14. Fan, W., L. J. Hong, and X. Zhang. 2013. Robust selection of the best. *Proceedings of the 2013 Winter Simulation Conference*, pp. 868-876.

P15. Fang, J. and L. J. Hong. 2013. Linking estimation and performance evaluation through simulation. *Proceedings of the 2013 Winter Simulation Conference*, pp. 766-777.

P16. Hong, L. J. and G. Liu. 2011. Monte Carlo estimation of value-at-risk, conditional value-at-risk and their sensitivities. *Proceedings of the 2011 Winter Simulation Conference*, pp. 95-107. (invited advanced tutorial talk)

P17. Luo, J. and L. J. Hong. 2011. Large-scale ranking and selection using cloud computing. *Proceedings of the 2011 Winter Simulation Conference*, pp. 4051-4061.

P18. Sun, L., L. J. Hong and Z. Hu. 2011. Optimization via simulation using Gaussian process-based search. *Proceedings of the 2011 Winter Simulation Conference*, forthcoming.

P19. Hu, Z., J. Cao, and L. J. Hong. 2010. Robust simulation of environmental policies. *Proceedings of the 2010 Winter Simulation Conference*, pp.1295-1305.

P20. Hong, L. J. and B. L. Nelson. 2009. A brief introduction to optimization via simulation. *Proceedings of the 2009 Winter Simulation Conference*, pp.75-85. (invited introductory tutorial talk).

P21. Hong, L. J. and S. Juneja. 2009. Estimating expectations of nonlinear functions. *Proceedings of the 2009 Winter Simulation Conference*, pp.1223-1236.

P22. Sun, L. and L. J. Hong. 2009. The asymptotic expansions of value-at-risk and conditional value-at-risk. *Proceedings of the 2009 Winter Simulation Conference*, pp.415-422.

P23. Liu, G. and L. J. Hong. 2008. Revisit of stochastic mesh method for pricing American options. *Proceedings of the 2008 Winter Simulation Conference*, pp.594-601.

P24. Liu, G. and L. J. Hong. 2007. Kernel estimation of quantile sensitivity. *Proceedings of the 2007 Winter Simulation Conference*, pp. 941-948.

P25. Chen, N. and L. J. Hong. 2007. Monte-Carlo method in financial engineering. *Proceedings of the 2007 Winter Simulation Conference*, pp. 919-931. (invited advanced tutorial talk)

P26. Chang, K. H., L. J. Hong, and H. Wan. 2007. Stochastic trust region gradient-free method: A new response-surface-based algorithm for simulation optimization. *Proceedings of the 2007 Winter Simulation Conference*, pp. 346-354.

P27. Wang, K. L., N. M. Tsang, H. W. Tsui, W. Y. Sze, L. J. Hong, and C. Y. Lee. 2006. Analyzing capacity competition among the airports in the Pearl River Delta. *2006 Annual Conference of Institute of Industrial Engineers (Hong Kong).*

P28. Hong, L. J. 2005. Discrete optimization via simulation using coordinate search. *Proceedings of the 2005 Winter Simulation Conference*, pp. 803-810.

P29. Hong, L. J. and B. L. Nelson. 2003. An indifference-zone selection procedure with minimum switching and sequential sampling. *Proceedings of the 2003 Winter Simulation Conference*, pp. 474-480.

P30. Hong, L. J., B. C. Shultes, and S. Anand. 2001. Robust evaluation of flatness and straightness tolerance using simulated annealing. *Transactions of NAMRI/SME*, 29:553-560.

Research Funding

R1. "A simulation analytics approach to dynamic risk measurement" (**PI**), Hong Kong Research Grant Council, General Research Fund, Project No. 11504017, 2017-2019, HK$451,982.

R2. "Combining stylized models and simulation models for metamodeling and simulation optimization with applications in queueing systems" (**PI**), Hong Kong Research Grant Council, General Research Fund, Project No. 11270116, 2016-2019, HK$482,605.

R3. "Robust selection of the best through computer simulation experiments" (**PI**, Co-I: Xiaowei Zhang), Hong Kong Research Grant Council, General Research Fund, Project No. 16203214, 2014-2017, HK$692,894.

R4. "Accounting for parameter estimation errors in operations research models: A Monte Carlo simulation approach" (**PI**), Hong Kong Research Grant Council, General Research Fund, Project No. 613213, 2013-2016, HK$747,000.

R5. "A cloud computing approach to ranking and selection problems with a very large number of alternatives" (**PI**), Hong Kong Research Grant Council, General Research Fund, Project No. 613012, 2012-2015, HK$500,000.

R6. "Discrete optimization via simulation using stochastic kriging based random search algorithms" (**PI**), Hong Kong Research Grant Council, General Research Fund, Project No. 613011, 2011-2014, HK$627,000.

R7. "Promoting Hong Kong's Ocean Container Transport Logistics Network" (**Co-PI**; PI and PM: Chung-Yee Lee, other Co-PIs: Albert Ha, Qian Liu, Ho-Yin Mak, Xiangtong Qi, James Wang, Houmin Yan., Hongtao Zhang, Jiheng Zhang and Rachel Zhang) Hong Kong Research Grant Council, Theme-Based Research, First Round, 2011-2016, HK$ 13,000,000.

R8. "Combing simulation and optimization with applications in financial risk management" (**Hong Kong PI**; China PI: Jian-Qiang Hu, China Co-I: Xiaoling Sun and Shushang Zhu). Joint NSFC/RGC (Natural Science Foundation of China / Hong Kong Research Grant Council) Grant, Project No. N_HKUST626/10, 2010-2013, HK$577,300 (for Hong Kong team), RMB336,000 (for China team).

R9. “Exploring the linkage between smoothed perturbation analysis and the kernel method in pathwise sensitivity estimation with applications in credit risk management” (**PI**, Co-I: Michael C. Fu and Jian-Qiang Hu), Hong Kong Research Grant Council, General Research Fund, Project No. 613410, 2010-2013, HK$522,000.

R10. “The impacts of environmental policies on global supply chains” (**PI**, Co-I: Jing Cao, Chung-Yee Lee, Qing Li, Hoi-yin Mak), HKUST Research Project Competition, Project No. RPC10EG11, 2010-2012, HK$298,000.

R11. “Estimating sensitivities of risk measures” (**PI**), Hong Kong Research Grant Council, Competitive Earmarked Research Grant, Project No. 613907, 2007-2009, HK$391,591.

R12. “Continuous optimization via simulation using line search algorithms” (**PI**, Co-I: Xiangtong Qi), Hong Kong Research Grant Council, Competitive Earmarked Research Grant, Project No. 613706, 2006-2009, HK$534,000.

R13. “The impact of counterfeiting” (**Co-I**, PI: Rachel Q. Zhang), Hong Kong Research Grant Council, Competitive Earmarked Research Grant, Project No. 622406, 2006-2009, HK$534,000.

R14. “Dynamic grid search: A gradient-free framework for continuous optimization via simulation” (**PI**), Hong Kong Research Grant Council, Competitive Earmarked Research Grant, Project No. 613305, 2005-2008, HK$538,000.

R15. “A game of five: Competition and cooperation among the five airports in the Pearl River Delta” (**PI**, Co-I: R. Cheung, C.-Y. Lee, X. Qi and K. Zhu), HKUST University Grant Committee, High Impact Allocation Grant, HIA05/06.EG01, 2005-2008, HK$600,000.

R16. “Revised COMPASS for discrete optimization via simulation” (**PI**), Hong Kong Research Grant Council, Direct Allocation Grant, DAG04/05.EG04, 2005-2006, HK$100,000.

R17. “Simulation and Optimization Laboratory” (with Xiangtong Qi), HKUST Engineering School Equipment Fund, 2005, HK$638,000.

Industrial Experience

Huawei Technology, 2020 –
Coco-Cola (China), 2019 –
Bank of Import and Export of China, 2019 – 2020
yucezhe.com, 2014 – 2016
GOSS Institute of Research Management, 2013 – 2016
The Venetian Macau-Resort-Hotel, 2013
Shanghai Stock Exchange, 2010 – 2011
Jardine One Solution (Hong Kong), 2008
ENW Electronics (Hong Kong), 2007 – 2008
Hong Kong Air Cargo Terminal Limited (HACTL), 2004 – 2005
The Christ Hospital, Health Alliance (Cincinnati, OH), 2000
Tsinghua-Huacheng Automotive Research Institute (Beijing), 1999
Delphi Automotive Systems (Beijing), 1997 – 1999

Courses Taught

At Fudan University

MANA130390 *Financial Risk Management*, Fall 2019
DATA630012 *Big Data and Financial Risk Management*, Fall 2019

MAST612115/DOCT812115 *Professional English*, Spring 2019, 20

At City University of Hong Kong

EF5210 *Option Pricing*, Spring 2015, 16, 17 (for MSc Financial Engineering students)
FB8912 *Business Research Methods*, Fall 2014, 15 (for PhD students)
FB8003I *Methodology for Applied Business Research III*, Spring 2016, Fall 2016 (Executive program, for students in the IDBA program)
MS8955 *Contemporary Research Topics in Management Science*, Spring 2017 (for PhD students)
FB6711 *Data Analytics with Business Applications*, Spring 2017 (MBA elective, new course)

At Hong Kong University of Science and Technology

IELM2010 *Industrial Engineering and Modern Logistics*, Spring 2013, 14
IELM313 *System Simulation*, Spring 2005, 06, 07, 08, 09, 10
IELM320 *Facilities Layout and Material Handling*, Fall 2004, 05, 06, 07, 09, 10
IELM610 *Design and Analysis of Simulation Experiments*, Spring 06, Fall 08
EEMT512 *Operations/Production Management*, Fall 2006, 07, 08, 09, 10, 12, 13
EEMT516 *Transportation and Logistics Management*, Spring 2009
EEMT550 *Engineering Statistics and Simulation*, Spring 2011, Summer 12, Spring 13, 14

At Northwestern University

IEMS315 *Stochastic Models and Simulation*, Spring 2004

Research Postgraduate Supervision

- Guangwu Liu, Ph.D., June 2009, HKUST
  Placement after graduation: Assistant Professor, Department of Management Sciences, College of Business, City University of Hong Kong

- Lihua Sun, Ph.D., August 2010 (co-supervised by Ning Cai), HKUST
  Placement after graduation: Assistant Professor in the Department of Economics and Finance, School of Economics and Management, Tongji University

- Zhaolin Hu, Ph.D., August 2011, HKUST
  Winner of the 3rd Prize of *Prisker Doctoral Dissertation Award* from *Institute of Industrial Engineers*
  Placement after graduation: Assistant Professor, Department of Management Science and Engineering, School of Economics and Management, Tongji University

- Jun Luo, Ph.D., August 2013 (co-supervised by Jiheng Zhang), HKUST
  Placement after graduation: Assistant Professor, Department of Management Science, Antai School of Economics and Management, Shanghai Jiaotong University

- Jin Fang, Ph.D., August 2015 (co-supervised by Jiheng Zhang), HKUST
  Placement after graduation: Assistant Professor, Department of Production and Operations Management and Logistics, School of Management, Huazhong University of Science and Technology

- Weiwei Fan, Ph.D., August 2015 (co-supervised by Xiaowei Zhang), HKUST
  Placement after graduation: Assistant Professor, Department of Finance and Statistics, School of Management, University of Science and Technology of China

- Guangxin Jiang, Postdoc fellow. June 2017, City University of Hong Kong

Placement after graduation: Assistant Professor, Department of Management Science and Engineering, School of Management, Shanghai University

- Xin Yun, Ph.D., June 2018, City University of Hong Kong
  Placement after graduation: Postdoc fellow in Fudan-Princeton Postdoc Program

- Haihui Shen, Ph.D., July 2018, City University of Hong Kong
  Placement after graduation: Assistant Professor, Sino-China Logistics Institute, Shanghai Jiaotong University

- Ying Zhong, Ph.D., July 2019, City University of Hong Kong
  Placement after graduation: Assistant Professor, School of Management, University of Electronic Science and Technology of China

- Yi Yang, M.Phil., August 2008, HKUST
- Richard Wong, M.Phil., August 2010, HKUST
- Tao Yang, M.Phil., January 2013, HKUST
- Yang Wu, M.Phil., August 2013, HKUST
- Jicheng Xing, M.Phil., August 2014, HKUST
- Hongchi Lu, M.Phil., August 2014, HKUST
- Huanhuan Yang, M.Phil., August 2015, HKUST
- Le Yu, M.Phil., August 2015, HKUST

- Wenhao Li, Ph.D. student, started in 2016, City University of Hong Kong
- Xianyu Kuang, Ph.D. student, started in 2017, City University of Hong Kong
- Xiuxian Wang, Ph.D. student, started in 2017, City University of Hong Kong
- Tan Wang, Ph.D. student, started in 2019, School of Data Science, Fudan University
- Zaile Li, Ph.D. student, started in 2019, School of Management, Fudan University
- Nifei Lin, Ph.D. student, started in 2019, School of Management, Fudan University
- Shoudao Wang, M.S. student, started in 2019, School of Data Science, Fudan University
- Zi Zhuang, M.S. student, started in 2019, School of Data Science, Fudan University

Invited/Keynote Speeches

- Invited Speaker, "Data and modeling: Some thoughts on data-driven supply chain management", *Workshop on Digital Supply Chain*, Zhejiang University, December 2018
- Keynote Speaker, "Simulation analytics: Transforming simulation from a tool of design to a tool of control", *Annual Meeting of Society of Collaborative Innovation and Management Research*, Nanjing, May 2018
- Keynote Speaker, "Offline learning for online applications: A new framework for simulation", *10th EAI International Conference on Simulation Tools and Techniques*, Shenzhen, China, September 2017
- Keynote Speaker, "Learning and earning with varying cost", *ORSC Stochastic Service and Operations Management Annual Meeting*, Shanghai, China, June 2017
- Invited Speaker, "Variability scaling in healthcare demands", *University of Manchester Big Data Forum*, Big Data Institute, University of Manchester, Manchester, U.K., November 2016
- Invited Speaker, "Variability scaling in healthcare demands", *NSFC-CUHK Symposium on Big Data Driven Management & Decision Research*, organized by Natural Science Foundation of China and Chinese University of Hong Kong, Hong Kong, September 2016
- Invited Speaker, "How to conduct research in the field of management science and engineering",

Forum for Young Scholars in Management Science and Engineering, Changsha, December 2015

- Invited Speaker, "Simulation-based optimization: methods and applications", *The 10th Academic Meetings of the Operations Research Society of China*, Xuzhou, October 2014
- Keynote Speaker, "Linking parameter estimation and performance evaluation through simulation-based learning", *Mini-Workshop on Operations Management and Management Science*, Shanghai Jiaotong University, November 2013
- Invited Tutorial Speaker, "Marriage of Simulation and Optimization: Three Examples," *INFORMS International Conference*, June 2012
- Keynote Speaker, "Marriage of Simulation and Optimization: Three Examples," *The Ninth National Conference on Mathematical Programming*, April 2012
- Invited Tutorial Speaker (with Guangwu Liu), "Monte Carlo estimation of value-at-risk, conditional value-at-risk and their sensitivities," *The 2011 Winter Simulation Conference*, December 2011
- Keynote Speaker, "The exploration and exploitation tradeoff in discrete optimization via simulation," *National Science Foundation (NSF) Workshop on Simulation Optimization*, University of Maryland, May 2010
- Keynote Speaker, "Robust simulation of environmental policies when covariances among key uncertain parameters are ambiguous," *Exxon–Mobil Workshop on Stochastic Optimization*, National University of Singapore, April 2010
- Invited Tutorial Speaker (with Barry L. Nelson), "A brief introduction to optimization via simulation," *Winter Simulation Conference*, December 2009
- Invited Tutorial Speaker (with Nan Chen), "Monte-Carlo method in financial engineering," *Winter Simulation Conference*, December 2007

Organizing Committee of Conferences

- Cluster Chair, *INFORMS Annual Meeting*, National Harbor, M.D., U.S.A., November 2020
- Chair, Organizing Committee, *The 4th Annual Workshop on Simulation Methodologies and Applications*, Online (Shanghai), China, June 2019
- Chair, Organizing Committee, *The 2019 Workshop on Stochastic Simulation*, Shenzhen, China, June 2019
- Chair, Organizing Committee, *The 2018 Workshop on Stochastic Simulation*, Beijing, China, June 2018
- Chair, Organizing Committee, *The 2017 Workshop on Stochastic Simulation*, Shanghai, China, June 2017
- Chair, Organizing Committee, *BIRS Workshop on Future Research Directions in Digital Simulation Methodology for the Next 10 Years (17w2670)*, Banff, Canada, April 2017
- Track Coordinator, The Simulation Optimization Track, *The 2016 Winter Simulation Conference*, Arlington, VA, U.S.A., December 2016
- Track Coordinator, The Simulation Optimization Track, *The 2013 Winter Simulation Conference*, Washington DC, U.S.A., December 2013
- Executive Chairman, *The First Goss Forum on Private Equity*, Hong Kong, October 2013
- Chair, Organizing Committee, *East Asian Simulation Workshop*, Hong Kong, August 2013
- Chair, Program Committee, *NSF Workshop on Computer Simulation*, Shanghai, China, July 2012
- Track Coordinator, The Risk Analysis Track, *The 2010 Winter Simulation Conference*, Baltimore, MD, U.S.A., December 2010
- Chair, Program Committee, *The First INFORMS International Conference on Service Science*, Hong Kong, August 2009
- Member, Program Committee, *The Second Production and Operations Management Society (Hong Kong) International Conference*, Hong Kong, January 2011

- Member, Program Committee, *the Sixth International Workshop on Risk Management*, Nanjing, China, October 2009
- Member, Program Committee, *the International Symposium on Combinatorics, Algorithms, Probabilistic and Experimental Methodologies*, Hangzhou, China, April 2007

Membership in Local Committees

- Deputy Director, Shanghai Big-Data Innovation Laboratory (Finance Area), 2019 – present
- Member, Advisory Committee for Provost, City University of Hong Kong, 2017 – 2018
- Member, University Committee for Chair Professors and Professors, City University of Hong Kong, 2016 – 2018
- Member, Department of Performance Assessment Committee, Department of Management Sciences, City University of Hong Kong, 2016 – 2018
- Member, Department Staffing Committee, Department of Management Sciences, City University of Hong Kong, 2016 – 2018
- Member, University Committee for Appointment and Personnel Reviews for Associate Professors, City University of Hong Kong, 2015 – 2016
- Member, Department Performance Assessment Committee, Department of Economics and Finance, City University of Hong Kong, 2015 – 2016
- Member, Quality Assurance Committee, City University of Hong Kong, 2014 – 2016
- Member, Department Executive Committee, Department of Economics and Finance, City University of Hong Kong, 2014 – 2016
- Member, Department Executive Committee, Department of Management Sciences, City University of Hong Kong, 2014 – present
- Member, Senate, City University of Hong Kong, 2014 – present
- Member, University Court, City University of Hong Kong, 2014 – present
- Member, Board of College of Business, City University of Hong Kong, 2014 – present
- Member, IELM Departmental Merit Salary Review Committee, HKUST, 2014
- Member, School of Engineering Substantiation and Promotion Committee, HKUST, 2013 – 2014
- Member, IELM Department Postgraduate Committee, HKUST, 2008 – 2014
- Member, MSc. EEM Program Committee, HKUST, 2008 – 2014
- Member, IELM Department Executive Committee, HKUST, 2009 – 2012
- Member, University Financial Engineering Task Force, HKUST, 2009 – 2011
- Founding faculty advisor, IIE Student Chapter at HKUST, 2009 – 2010
- Member, Engineering Task Force on International and Mainland Strategy, HKUST, 2009
- Member, IELM Department Undergraduate Committee, HKUST, 2004 – 2008
- Member, IELM Department Headship Search Committee, HKUST, 2006 – 2007

Membership in Professional Society

- President, INFORMS Simulation Society, 2020-2022
- Vice President/President-Elect, INFORMS Simulation Society, 2018-2020
- Member, Steering Committee, Operational Research Society of China, 2012 – present
- Member, Steering Committee, Mathematical Programming Society of China, 2010 – present
- Member, Outstanding Simulation Publication Award Committee, INFORMS Simulation Society, 2015 – 2017 (Serving as Committee Chair in 2016)
- Elected council member, INFORMS Simulation Society, 2014 – 2016
- Judge, INFORMS JFIG Paper Competition, 2010, 2012

- Member, Awards Committee, INFORMS Simulation Society, 2008 – 2010
- Newsletter Editor, INFORMS Simulation Society, 2006 – 2008
- Member, Communication Committee, INFORMS Simulation Society, 2006 – 2008
- Member, Institute for Operations Research and Management Science (INFORMS), INFORMS Simulation Society, and INFORMS Applied Probability Society