Rouba Ibrahim

CONTACT INFORMATION	School of Management at University College London One Canada Square London E14 5AB, U.K. *E-mail:* rouba.ibrahim@ucl.ac.uk *Web:* http://www.roubaibrahim.com

ACADEMIC POSITIONS

University College London, School of Management

2012–2016	Assistant Professor
2016–2020	Associate Professor
2020–	Professor

EDUCATION

American University of Beirut

2002	B.S., Mathematics

Stony Brook University

2004	M.S., Applied Mathematics and Statistics

Columbia University

2010	Ph.D., Operations Research

RESEARCH INTERESTS

Methodology: Queueing theory; stochastic modelling; data analytics.
Application areas: Service operations; sharing economy; healthcare.

JOURNAL PUBLICATIONS

1. Ibrahim, R. and W. Whitt. Real-Time Delay Estimation Based on Delay History. *Manufacturing and Service Operations Management*, 11(3), 2009, pp. 397–415.

2. Ibrahim, R. and W. Whitt. Real-Time Delay Estimation in Overloaded Multiserver Queues with Abandonment. *Management Science*, 55(10), 2009, pp. 1729–1742.

3. Ibrahim, R. and W. Whitt. Real-Time Delay Estimation Based on Delay History with Time-Varying Arrivals. *Production and Operations Management*, 20(5), 2011, pp. 654–667.

4. Ibrahim, R. and W. Whitt. Wait-Time Predictors for Customer Service Systems with Time-Varying Demand and Capacity. *Operations Research*, 59(5), 2011, pp. 1106–1118.

5. Ibrahim, R. and P. L'Ecuyer. Forecasting Call Center Arrivals: Fixed-Effects, Mixed-Effects, and Bivariate Models. *Manufacturing and Service Operations Management*, 15(1), 2013, pp. 72–85.

6. Ibrahim, R., L'Ecuyer, P., Shen, H. and M. Thiongane. Inter-Dependent, Heterogeneous, and Time-Varying Service-Time Distributions in Call Centers. *The European Journal of Operational Research*, 250(2), 2016, pp. 480–492.

7. Ibrahim, R., Kucukyazici, B., Verter, V., Gendreau, M. and M. Bolstein. Designing Individualized Treatment: An Application to Anticoagulation Therapy. *Production and Operations Management*, 25(5), 2016, pp. 902–918.

8. Ibrahim, R., Armony, M. and A. Bassamboo. Does the Past Predict the Future? The Case of Delay Announcements in Service Systems. *Management Science*, 63(6), 2017, pp. 1762–1780.

9. Ibrahim, R. Managing Queueing Systems where Capacity is Random and Customers are Impatient. *Production and Operations Management*, 27(2), 2018, pp. 207–383.

10. Ibrahim, R. and S. Kim. Is Expert Input Valuable? The Case of Predicting Surgery Duration. *Seoul Journal of Business*, 25(2), 2019, pp. 1–34.

11. Dong, J. and R. Ibrahim. Managing Supply in the On-Demand Economy: Flexible Workers, Full-Time Employees, or Both? *Operations Research*, forthcoming.

12. Bassamboo, A. and R. Ibrahim. A General Framework to Compare Announcement Accuracy: Static vs. LES-based Announcement. *Management Science*, forthcoming.

13. Ibrahim, R., Kim, S. and J. Tong. Eliciting Human Judgment for Prediction Algorithms. *Management Science*, forthcoming.

INVITED PAPERS AND BOOK CHAPTERS

14. Ibrahim, R., Ye, H., L'Ecuyer, P. and H. Shen. Modeling and Forecasting Call Center Arrivals: A Literature Survey and a Case Study. *The International Journal of Forecasting*, 32(3), 2016, pp. 865–874.

15. Ibrahim, R. Sharing Delay Information in Service Systems: A Literature Survey. *Queueing Systems*, 89(1-2), 2018, pp. 49–79.

16. Ibrahim, R. On Queues with a Random Capacity: Theory and Application. In: Hu M. (eds) *Sharing Economy,* Springer Series in Supply Chain Management, 6, 2019, pp. 279-316.

REFEREED PROCEEDINGS

17. Ibrahim, R. and W. Whitt. Real-Time Delay Estimation in Call Centers. *Proceedings of the 40th Winter Simulation Conference*, 2008, pp. 2876–2883.

18. Ibrahim, R. and W. Whitt. Delay Predictors for Customer Service Systems with Time-Varying Parameters. *Proceedings of the Winter Simulation Conference*, 2010, pp. 2375–2386.

19. Ibrahim, R., L'Ecuyer, P., Regnard, N. and H. Shen. On the Modeling and Forecasting of Call Center Arrivals. *Proceedings of the Winter Simulation Conference*, 2012, pp. 23–35.

PROFESSIONAL ACTIVITIES

- **Associate editor**

2017–	*Management Science*
2018–	*Operations Research*
2018–	*IISE Transactions*
2019–	*Manufacturing and Service Operations Management*

- **Conference organizer**

2015	9th Young European Queueing Theorists workshop, Eurandom, Eindhoven, The Netherlands (with Fabio Cecchi and Florian Simatos)
2016	Applied Probability Society cluster, INFORMS, Nashville, USA (with David Goldberg)
2018	StochMod, conference of the EURO working group on stochastic modeling, Lancaster, U.K. (with Peter Jacko)
2018	Service Management SIG workshop, MSOM, University of Texas at Dallas, USA (with Ming Hu)
2020	MSOM Service Operations Track, INFORMS, Maryland, USA (with Jing Dong)

- **Society officer**

2015-2017	Applied Probability Society council (member)
2019-2020	MSOM Society (secretary/ treasurer)

- **Ad-hoc referee**

  Operations Research, Management Science, Manufacturing and Service Operations Management, Production and Operations Management (among others)

INVITED TALKS AT ACADEMIC INSTITUTIONS	2009	University of Montreal The George Washington University (School of Business) University of British Columbia (Sauder)
	2010	University of Michigan (Ross) University of Rochester (Simon)
	2012	University of Alberta (School of Business) University of Groningen (Faculty of Economics and Business) Erasmus University (Rotterdam School of Management) Vrije Universiteit Amsterdam (Mathematics) Delft University (Applied Mathematics) London Business School City University London (Cass) University College London (Management Science & Innovation)
	2013	Vrije Universiteit Amsterdam (Mathematics)
	2014	Eindhoven University of Technology (YEQT Workshop)
	2016	Durham University (Business School) Frankfurt School of Finance and Management Oxford University (Said) London Business School Northwestern University (Kellogg) University of Manchester (Mathematics)
	2017	Lancaster University (Management School) University of Edinburgh (Mathematics) Columbia University (IEOR, Applied Proability Day) University of Chicago (Booth) Indiana University (Kelley) University of Illinois at Urbana Champaign (College of Business) University of North Carolina at Chapel Hill (Kenan-Flagler, discussant at MSOM Service SIG)

	2018	MIT (Sloan) University of Texas at Austin (OR & IE) University of Southern California (Marshall) Stanford (GSB)
	2019	Imperial College London (Business School)
	2020	Birkbeck, University of London (Maths & Stats)
	2021	University of Toronto (Rotman) – scheduled University of Luxembourg (Economics & Management) – scheduled

AWARDS	2014	Distinguished service award from *Management Science*
	2015	Finalist (Honorable Mention) in JFIG paper competition of INFORMS for the paper "Managing Queueing Systems where Capacity is Random and Customers are Impatient"
	2017	Meritorious service award from *M&SOM* Distinguished service award from *Management Science*
	2018	Distinguished service award from *Management Science*

TEACHING

Stony Brook University
Precalculus (undergraduate)

Columbia University
Probability (undergraduate)

University College London
Mathematical Foundations of Management (undergraduate)
Stochastic Modelling (Ph.D.)

London Business School (as Guest Lecturer)
Operations Management (MBA, core course)

PATENTS   "Method for predicting call waiting times." 2012. US Patent 8,311,208 (with P. Tendick).

INTERNAL SERVICE (AT UCL)	2012–2013	Coordinator of the Management Science program (Mathematics track) Departmental representative for Integrated Engineering Program (IEP)
	2013	Internal examiner, PhD of Ioannis Fragkos
	2015–Present	Seminar series organizer
	2016	OM area reading group organizer
	2018	Internal examiner, PhD of Ryan Palmer
	2020	Internal examiner, PhD of Xiaojia Guo

PREVIOUS POSITIONS	2007	Deutsche Bank, summer associate, Global Markets
	2009	Avaya Research Labs, research scientist, Data Analysis department
	2010–2011	Bell Canada, consultant
	2010	University of Montreal, postdoctoral fellow (with P. L'Ecuyer)
	2011	McGill University, postdoctoral fellow (NSERC CREATE Program)