Hamsa Bastani

Wharton School, University of Pennsylvania Operations, Information & Decisions (OID) Group 557 Jon M. Huntsman Hall hamsab@wharton.upenn.edu hamsabastani.github.io (215) 573-5365

Employment Assistant Professor, Wharton School, University of Pennsylvania

Operations, Information & Decisions (OID), 2018 – present

Herman Goldstine Postdoctoral Fellow, IBM Research

Math for AI, 2017-2018

Education Stanford University

Ph.D. in Electrical Engineering, 2012-2017

Harvard University

A.M. in Physics, 2011-2012

A.B. summa cum laude in Physics and Mathematics, 2008-2012

Working Papers

Adaptive Clinical Trial Designs with Surrogates: When Should We Bother?

(with Arielle Anderer and John Silberholz)

Meta Dynamic Pricing: Learning Across Experiments

(with David Simchi-Levi and Ruihao Zhu)

Spotlighted presentation in INFORMS RM&P Conference (2019)

Major Revision, Management Science

Do Policies with Limited Enforcement Reduce Harm? Evidence from Transshipment Bans

(with Joann de Zegher)

People's Choice Award, Early-Career Sustainable OM Workshop (2019)

Preliminary version in MSOM Sustainable SIG (2019)

Major Revision, Management Science

Predicting with Proxies

Preliminary version in IMA Data-Driven Supply Chain Mgmt Workshop (2018)

Major Revision, Management Science

Learning Personalized Product Recommendations with Customer Disengagement

(with Pavithra Harsha, Georgia Perakis and Divya Singhvi)

Honorable Mention, POMS Best Student Paper in Supply Chain (D. Singhvi, 2019)

Interpreting Predictive Models for Human-in-the-Loop Analytics

(with Osbert Bastani and Carolyn Kim)

Finalist, Pierskalla Award for Best Paper in Healthcare (2018)

Preliminary version in FATML Workshop (2017), MSOM Healthcare SIG (2019)

Mostly Exploration-Free Algorithms for Contextual Bandits

(with Mohsen Bayati and Khashayar Khosravi)

Major Revision, Management Science

Analysis of Medicare Pay-for-Performance Contracts

(with Mohsen Bayati, Mark Braverman, Ramki Gummadi and Ramesh Johari) Preliminary version in EC Mechanism Design for Social Good Workshop (2017)

Published Papers

Online Decision-Making with High-Dimensional Covariates

(with Mohsen Bayati)

1st Place, Pierskalla Award for Best Paper in Healthcare (2016)

1st Place, George Nicholson Student Paper Competition (2016)

1st Place, MSOM Student Paper Competition (2016)

1st Place, IBM Service Science Best Student Paper Award (2016)

Accepted in *Operations Research*

Evidence of Upcoding in Pay-for-Performance Programs

(with Joel Goh and Mohsen Bayati)

1st Place, Health Applications Society Best Student Paper Award (2015)

Management Science (2018)

Other Publications

Exploring the Causal Relationships between Initial Opioid Prescriptions and Outcomes

(with J. Zhang, V. Iyengar, D. Wei, B. Vinzamuri, A. Macalalad, A. Fischer, G.

Yuen-Reed, A. Mojsilović, and K. Varshney)

AMIA Workshop on Data Mining for Medical Informatics (2017)

Multiplex coherent anti-Stokes Raman scattering (MCARS) for chemically sensitive, label-free flow cytometry

(with C. Camp, S. Yegnanarayanan, A. Eftekhar, and A. Adibi)

Optics Express (2009)

Creating Optical Vortex Modes with a Single Cylinder Lens

(with M. Cohen and J. Noe) Proceedings of *SPIE* (2010)

Students

Arielle Anderer, Wharton OID Pia Ramchandani, Wharton OID

Kan Xu, Penn Econ

Khashayar Khosravi, Stanford EE (co-author, advised by M. Bayati) Park Sinchaisri, Wharton OID (co-author, advised by G. Allon) Divya Singhvi, MIT ORC (co-author, advised by G. Perakis) Ruihao Zhu, MIT IDSS (co-author, advised by D. Simchi-Levi)

Teaching

Wharton OID, University of Pennsylvania

Instructor, Introduction to Management Science (OIDD 321), 2018-2019

Graduate School of Business, Stanford University

TA, Business Intelligence from Big Data (OIT 367), 2016 TA, Data for Action (OIT 536), 2015

Harvard College

TA, Quantum Mechanics (Phys 143a), 2011 TA, Linear Algebra & Real Analysis (Math 25), 2009-2010

Invited Talks

MIT IDSS Data Science Lab, November 2019

UC Irvine Algorithms, Combinatorics & Optimization Center, October 2019

Wharton Empirical Research in OM Workshop, September 2019

Information & Learning Workshop, IESE, September 2019

ISOM Workshop, Goizueta Business School, Emory, August 2019

Healthcare SIG, MSOM Conference, June 2019

Healthcare & Service Operations Workshop, CUHK Shenzhen, June 2019

Naveen Jindal School of Management, UT Dallas, May 2019

Wharton OID, April 2019

IMA Data-Driven Supply Chain Mgmt (Applied) Workshop, December 2018

IMA Data-Driven Supply Chain Mgmt (Theory) Workshop, October 2018

Warren Center for Network & Data Sciences, U Penn, October 2018

IBM Research Math for AI, June 2018

IDinsight, May 2018

MIT ORC IAP Seminar on OR for Social Impact, January 2018

MIT IDSS Data Science Lab, December 2017

Judge Business School, University of Cambridge, July 2017

IBM Research Applied Probability Seminar, June 2017

Cornell Tech, March 2017

Stanford-Berkeley Health Economics Workshop, February 2017

Anderson School of Management, UCLA, February 2017

Fuqua School of Business, Duke, February 2017

Marshall School of Business, USC, February 2017

Northwestern IEMS, February 2017

Yale School of Management, February 2017

Harvard Business School, January 2017

Columbia IEOR / DRO, January 2017

Ross School of Business, University of Michigan, January 2017

INSEAD, January 2017

Kellogg School of Management, Northwestern, January 2017

Krannert School of Management, Purdue, January 2017

Chicago Booth OM, January 2017

Cornell ORIE, December 2016

Wharton OID, University of Pennsylvania, December 2016

Kelley School of Business, Indiana University, December 2016

London Business School, December 2016

Katz School of Business, University of Pittsburgh, December 2016

MIT Sloan OM, November 2016

Stanford GSB OIT, November 2016

Biostatistics Workshop, Stanford, October 2016

Med-X Conference, Stanford Medical School, September 2016

Healthcare SIG, MSOM Conference, July 2016

Cornell ORIE, December 2015

Cornell ORIE Young Scholars Workshop, October 2015

Wharton Empirical Research in OM Workshop, September 2014

Awards

People's Choice Award, Early-Career Sustainable OM Workshop, 2019

Finalist, Pierskalla Award for Best Paper in Healthcare, 2018

1st Place, Pierskalla Award for Best Paper in Healthcare, 2016

1st Place, George Nicholson Student Paper Competition, 2016

1st Place, MSOM Student Paper Competition, 2016

1st Place, IBM Service Science Best Student Paper Award, 2016

1st Place, Health Applications Society Best Student Paper Award, 2015

National Science Foundation Fellow, 2012-2017

Stanford Department Fellowship in Electrical Engineering, 2012-2013

Intel Science Talent Search Finalist, 2008

Professional Service

Program Committee, AAAI Conference on Artificial Intelligence, 2020

Judge, Elwood S. Buffa Doctoral Dissertation Award, 2019

Area Chair, Mechanism Design for Social Good Workshop, 2019

Committee Member, George Nicholson Student Paper Competition, 2019-2020

Judge, MSOM Student Paper Competition, 2019

Committee Member, Revenue Management & Pricing Conference, 2019

Judge, Healthcare Applications Society Student Paper Competition, 2019

Program Committee, EC Mechanism Design for Social Good Workshop, 2018

Judge, Healthcare SIG in MSOM Conference, 2018-2019

Meritorious Service Award for Management Science, 2018

Judge, Service Science Best Cluster Paper Award, 2017

Co-Chair, Pierskalla Award for Best Paper in Healthcare, 2017

Speaker, CMU YinzOR Student Conference, 2017

Reviewer for Management Science, Operations Research, M&SOM, Journal of

the Royal Statistical Society: Series B, and Annals of Statistics

Languages

English (native), Tamil (native), French (beginner)

and Skills R, Stata, LATEX, Matlab