

Professor Georgia Perakis- Curriculum Vitae
January 2024

William F. Pounds Professor of Operations Management and Operations
Research/Statistics, MIT Sloan School of Management

PERSONAL

Place of birth: Greece

Languages: Greek- fluent, English- fluent, French -intermediate

Citizenship: U.S.

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Wikipedia: https://en.wikipedia.org/wiki/Georgia_Perakis

Google Scholar: <https://scholar.google.com/citations?user=SUwM5jUAAAAJ&hl=en>

EDUCATION

University of Athens - B.S. in Mathematics, 1987

Brown University - M.S. in Applied Mathematics, 1988

Brown University - Ph.D. in Applied Mathematics, 1993

DOCTORAL THESIS

Advisor: Thomas L. Magnanti

Thesis: “Geometric, interior point and classical methods for solving finite dimensional variational inequality problems”

PRINCIPAL RESEARCH INTERESTS

Retail Pricing, Revenue Management, Inventory Control and Supply Chains:

- Dynamic pricing, Revenue Management and inventory management for online and offline settings
- Promotion planning
- Supply Chain Management
- Machine Learning and Demand Prediction in the Retail space

Healthcare:

- Machine Learning and Optimization in Health (for example, managing the opioid crisis, length of stay in an ED department, scheduling the echo and MRI machine appointments in a hospital)
- Healthy food issues as they relate to Food Deserts and Farm Supply Chains
- On-Demand Healthcare

Energy and Sustainability:

- Electricity markets
- Adoption of new technologies (Electric Vehicle and Solar Panel Incentives)
- Electric Vehicle Charging and Discharging to the Electric Grid

Transportation:

- Dynamic and Static Traffic Assignment Problems. Route Guidance, Air Traffic Control and Management

Competition:

- In Transportation, Oligopolistic Pricing and Revenue Management, Competitive Supply Chains, Air Traffic Management.

Mathematical Programming and Machine Learning:

- Machine Learning through an Optimization Lens

- Robust and Data Driven Optimization in Transportation, Pricing, Revenue Management, Supply Chains
- Variational Inequality Problems, Fixed Point Problems, Equilibrium Problems, Nonlinear Optimization
- Applications of Static and Dynamic Optimization in Transportation, Pricing, Revenue Management, Supply Chains and Air Traffic Management.

MIT SLOAN FACULTY IN THE SAME FIELD

Arnie Barnett	Professor
Dimitris Bertsimas	Professor
Vivek Farias	Professor
Charlie Fine	Professor
Daniel Freund	Assistant Professor
Robert Freund	Professor
David Gamarnik	Professor
Negin Golrezaei	Assistant Professor
Steve Graves	Professor
Swati Gupta	Assistant Professor
Alexandre Jacquillat	Assistant Professor
Jonas Jonasson	Assistant Professor
Retsef Levi	Professor
Thodoris Lykouris	Assistant Professor
Rahul Mazumder	Assistant Professor
James Orlin	Professor
Chara Podimata	Assistant Professor
Andy Sun	Professor
Nikos Trichakis	Associate Professor
Roy Welsch	Professor
Yanchong (Karen) Zheng	Associate Professor

NON-MIT APPOINTMENTS

Brown University

Visiting Assistant Professor, Applied Math Department - 1993 – 1995

Columbia University

Visiting Associate Professor - *Spring 2006 (Sabbatical leave from MIT 2005-2006)*

Columbia University

Visiting Professor - *Spring 2014 (Sabbatical leave from MIT 2013-2014)*

MIT APPOINTMENTS

Associate Dean of SERC (Social and Ethical Responsibility in Computing)

MIT Schwartzman College of Computing and MIT Sloan, *September 2022-present*

William F. Pounds Professor of Management Science

MIT Sloan School of Management, *September 2009-present*

Professor of Operations Research

MIT Sloan School of Management, *July 2009-September 2009*

Associate Professor of Operations Research

MIT Sloan School of Management, *July 2006-June 2009.*

J. Spencer Standish Career Development Associate Professor

MIT Sloan School of Management, *July 2004-September 2006*

Sloan Career Development Associate Professor

MIT Sloan School of Management, *September 2002-September 2004*

Associate Professor

MIT Sloan School of Management, *July 2002-September 2002*

Assistant Professor

MIT Sloan School of Management, *July 1998-July 2002*

Postdoctoral Associate

Operations Research Center, *MIT, 1995-June 1998*

DISTINCTIONS and AWARDS

- **INFORMS Fellow:** selected to be an *INFORMS Fellow* for Lifetime Achievement, Class 2016.
- **MSOM Society Distinguished Fellow:** selected to be an *MSOM Society Distinguished Fellow* for Lifetime Achievement in the area of Operations, Class 2021.
- **William F. Pounds Chair:** September 2009 -present.
- **Sloan Career Development Chair** (July 2002-July 2004) and **J. Spencer Standish Chair** (July 2004-June 2007).
- **PECASE Award (Presidential Early Career Award):** awarded by the office of the President of the United States for Science and Technology and the **CAREER Award, NSF.** Period 2000-2005.
- **Award for the Advancement of Women in OR/MS:** awarded once a year by the INFORMS WOMS Sociate at the INFORMS Annual Conference, Fall 2022.
- **First Place** at the 2021 Operations Research Center Best Student Paper Competition of my PhD student O. Skali-Lami for our joint paper “XS-Trees: A Tree Sampling Framework for Interpretable Tree Ensembles”.
- **First Place** for the ICSS Best Paper Award in the Service Science Conference for the work on COVID-19, August 2021.
- **2019 Best Paper Published in Management Science in Operations Management** from the *MSOM Society of INFORMS* for the paper entitled “The Impact of Demand Uncertainty on Consumer Subsidies for Green Technology Adoption” co-authored with M. Cohen and R. Lobel. (This award honors the best paper published in the prior three years in Management Science in the area of OM.)
- **First Prize** in the 2023 *Operations Research Center Best Student Paper Award* for the work with my student L. Thayaparan and Oracle on optimizing over tree ensembles.
- **First prize** in the 2019 *Best Student Paper Competition at the POM Supply Chain Section*, for the paper with L. Baardman, S. Borjian, T. Cohen-Hillel and K. Panchamgam.
- **First Place:** *3rd Applied Research Challenge* for work with J&J, (paper with L. Baardman, I. Levin and D. Singhvi) *POMS Conference* May 2018.
- **First prize** in the 2018 *Best Student Paper Competition at the POM Supply Chain Section* for her paper with L. Baardman, I. Levin and D. Singhvi.
- **First place** in the 2018 *INFORMS Service Science Section Best Paper Award Competition* for her paper with Tamar Cohen-Hillel and Kiran Panchamgam.
- **First place** in the *INFORMS Service Science Section Best Paper Award Competition* for her paper with P. Harsha and A. Papush, Fall 2017.
- **First prize** in the *INFORMS Service Science Section Best Paper Award Competition* for her paper with L. Baardman, M. Cohen, K. Panchamgam, D. Segev, Fall 2016.
- **First prize** in the *Best Application of Theory Award at the Northeast Decision Sciences Institute 2015 conference* in Cambridge, MA, for her paper with M. Cohen, Z. Leung, K. Panchamgam and A. Smith entitled: “Promotion Planning through an Optimization Lens; From Theory to Practice”.
- **First prize** in the *Best Student Paper Competition at the POM Supply Chain Section*, May 2015 for her paper entitled “Competition and Externalities in Green Technology Adoption”, (with M. Cohen and C. Thraves).
- **First prize** in the *Best Application of Theory Award at the Northeast Decision Sciences Institute 2015 conference* in Cambridge, MA, for her paper with M. Cohen, Z. Leung, K. Panchamgam and A. Smith entitled: “Promotion Planning through an Optimization Lens; From Theory to Practice”.
- **First prize** in the *Best Student Paper Competition at the POM Supply Chain Section*, May 2015 for her paper entitled “Competition and Externalities in Green Technology Adoption”, (with M. Cohen and C. Thraves).
- **First Place** with LGO Program at the *UPS George Smith Prize, INFORMS Practice Conference*, Boston, Spring 2014

- **First prize** in the Best Student Paper Competition at the INFORMS Service Science Section for her paper with M. Cohen, Z. Leung, K. Panchamgam and A. Smith entitled: “The Impact of Optimization on Promotion Planning”, (awarded at the INFORMS conference Fall 2014).
- **First Place** with LGO Program at the *UPS George Smith Prize, INFORMS Practice Conference*, Boston, Spring 2014.
- **First Prize** in the *2012 Best Paper Award of the INFORMS Service Science Section*, for the paper entitled “Business Analytics for Flexible Resource Allocation under Random Emergencies” co-authored with her PhD student Joline Uichanco and LGO student Sid Balwani and industry collaborators.
- Listed among the seven **favorite professors** of EMBA's in 2019 from *Poets & Quants*.
- **Teacher of the Year Award** at *MIT Sloan Spring 2017 (awarded to the best teacher in MIT Sloan School, nominated by the students,)* 2016-2017
- **Jamieson Prize**, Excellence in Teaching, *MIT Sloan*, Spring 2014.
- **Samuel M. Seegal Award 2012**, for inspiring students for achieving excellence.
- **Graduate Student Council Teaching Award**: May 2002, given each year to one professor from each school at *MIT*, for excellence in teaching a graduate level course.
- **Plenary Speaker** at the ISMP Conference, August 2022.
- **Plenary Speaker** at the POM International Conference in Hong Kong, January 2022.
- **Plenary Speaker** at the International Conference on Operations Research September 2021.
- **Plenary Speaker** at the CORS Conference, June 2021.
- **Plenary Speaker** at the MSOM Annual Conference, June 2021.
- **Plenary Speaker** at the International Operations Research Conference, September 2021.
- **Plenary Speaker** at the data science and business analytics conference organized by the College of Business, Shanghai University of Finance and Economics, December 2021.
- **Invited Tutorial Speaker** at the *INFORMS Business Analytics Conference*, Spring 2016 and at the *INFORMS Conference*, Fall 2015.
- **Plenary Speaker** for the *MOPTA Conference (Modeling and Optimization: Theory and Applications, annual international conference in Optimization held in Canada)*, held this year at University of Guelph, Ontario Canada, August 2008.
- **Second Place (Honorable Mention)** in the *2021 4th MSOM Practice-Based Competition* for my work with the Wayfair (paper with Ankit Mangal, Stefan Poninghaus from Wayfair as well as from MIT Divya Singhvi and Omar Skali Lami) MSOM Conference, June 2021.
- **Second place** in the *2021 INFORMS Doing Good with Good OR Competition* for the work with her students on COVID-19 prediction, prevalence and vaccine distribution.
- **Second Place**: in the 2021 in the *INFORMS Service Science Section Best Student Paper Award* for the paper on the Multi-Peak SEIRD Model for COVID-19.
- **Second Place (Honorable Mention)** in the *2019 3rd MSOM Practice-Based Competition* for my work with the Oracle Retail Business Unit (paper with L. Baardman, S. Borjian, T. Cohen-Hillel and Kiran Panchamgam) MSOM Conference, June 2019.
- **Second place** in the *2019 INFORMS Service Science Best Paper Award* for her paper with H. Bastani, P. Harsha and D. Singhvi.
- **Second Prize** in the *2011 Best Paper Award of the INFORMS Service Science Section*, for the paper entitled “Congestion Pricing for Service Industries” co-authored with her PhD student Wei Sun.
- **Honorable Mention** in the 2023 Best Paper published in the M&SOM journal award; “Distribution Free Pricing” with M. Hu and X. Chen
- **Honorable Mention** in the 2023 *POM College of Supply Chain Best Student Paper Award* for the work with my student L. Thayaparan and Oracle on optimizing over tree ensembles.
- **Honorable Mention** in the 2023 *MSOM Society Best Student Paper Award* for the work with my student L. Thayaparan and Oracle on optimizing over tree ensembles.
- **Honorable Mention** in the 2022 Best Paper published in the M&SOM journal award; “A Data-Driven Approach to Personalized Bundle Pricing and Recommendation” with M. Ettl, P. Harsha and A. Papush.
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- **Honorable Mention** in the *2022 RMP Section Best Student Paper Award* for the work with my student L. Thayaparan and Oracle on optimizing over tree ensembles.

- **Honorable Mention** in the 2022 *M&SOM* journal best paper award.
- **Honorable Mention** in the 2021 *Best Paper Award in the Public Section OR Section (PSOR)* for the work on COVID-19 prediction, prevalence and vaccine distribution at the INFORMS Conference.
- **Honorable Mention** for the paper entitled "The Impact of Demand Uncertainty on Consumer Subsidies for Green Technology Adoption" (co-authored with M. Cohen and R. Lobel) in the 2019 *ENRE (Energy, Natural Resources, and the Environment Section of INFORMS)* for the *Best Publication Award on the topic of Environment and Sustainability*.
- **Honorable mention** in the 2019 *Best Student Paper Competition at the POM Supply Chain Section* for her paper with H. Bastani, P. Harsha and D. Singhvi.
- **Honorable mention** in the 2019 *Best Student Paper Competition at the POM Supply Chain Section* for her paper with Melvyn Sim, Qinshen Tang, and Peng Xiong.
- **Honorable mention** at the 2018 *POM HK* best student paper competition for her paper with Melvyn Sim, Qinshen Tang, and Peng Xiong.
- **Honorable mention** Anna Papush (who graduated May 2018) for her PhD thesis from the *INFORMS Revenue Management & Pricing Section*, Fall 2018.
- **Honorable Mention** in the 2007 *Best Paper Award of the Transportation Science & Logistics Society of INFORMS*, for her paper co-authored with her former PhD student (currently on the faculty at the Anderson School of Business in UCLA), entitled: "An Analytical Model for Traffic Delays and the Dynamic User Equilibrium Problem", *Operations Research*, 54(6): 1151-1171. November-December 2006.
- **Finalist** in the 2019 *INFORMS Service Science Best Paper Award* for her paper with L. Baardman, S. Borjian, T. Cohen-Hillel, and K. Panchamgam.
- **Finalist** in the 2019 *INFORMS Social Media Analytics Section, Best Student Paper Award* for her paper with L. Baardman, S. Borjian, T. Cohen-Hillel, and K. Panchamgam.
- Her students Lennart Baardman and Elaheh Fata were **finalists** for 2019 *INFORMS IBM Service Science Best Student Paper Award* for a paper also joint with A. Pani and herself.
- Her student Elisabeth Paulson was a **finalist for 2019 INFORMS IBM Service Science Best Student Paper Award** for a paper joint with R. Levi and herself.
- **Finalist in the 2019 3rd MSOM Practice-Based Competition** for her work with Stubhub (paper with M. Alley, M. Biggs, R. Hariss, C. Herman and M. Li) *MSOM Conference*, June 2019.
- **Finalist** for the 2019 *JD.com practice based competition at POM* for her paper with L. Baardman, S. Borjian, T. Cohen-Hillel and Kiran Panchamgam.
- **Finalist** for the 2019 *CBOM Best Student Paper Competition at POM*, for her paper with T. Cohen-Hillel and Kiran Panchamgam.
- **Finalist** in the 2018 *INFORMS Service Science Section Best Student Paper Competition*, for her paper with L. Baardman, I. Levin and D. Singhvi.
- Her PhD students Lennart Baardman and Elaheh Fata were **finalists** for the *Nicholson Best student competition* for their joint paper, at *INFORMS*, Fall 2018.
- Her paper with M. Biggs was **finalist** at *INFORMS Service Science Section Best Paper Award Competition*, Fall 2017.
- Her paper with C. Thraves, was **finalist** at *INFORMS Service Science Section Best Paper Award Competition*, Fall 2016.
- **Finalist** at the *INFORMS Service Science Section Best Student Paper Award Competition*, for her paper with S. Gupta, Fall 2016.
- **Finalist** at the *INFORMS Best Case Competition* for the case she wrote on the Analytics of Promotion Planning with M. Cohen, Fall 2016.
- **Finalist** in the *Practice Award of the INFORMS Revenue Management and Pricing Section*, with my work on Promotion Planning with the Oracle Retail Business Unit (presented at Columbia University) June 2015.
- **Finalists** with LGO Program at the *UPS George Smith Prize, INFORMS Practice Conference*, San Antonio Texas, Spring 2013.
- **Adobe Faculty Award**, Fall 2017, Fall 2018.
- **Wayfair Faculty Award**, Fall 2018.
- **IBM Faculty Award** twice, in 2015-16 and in 2016-17.
- **Nice NSF Awards**: 1993-1996, 1996-1999, 2000-2005, 2006-2009, 2007-2011, 2008-2011, 2008-2011, 2012-2016, 2016-2019 (see also Project Experience-Grants Section)

- **MIT Energy Initiative Seed Fund and Fellowship:** awarded to PhD students for research, 2011-2013
- **Charles Reed Faculty Initiative Award:** 2000-2001 for innovative research by the Institute,
- **UTRC Award:** *New York University Transportation Research Consortium and DOT*, 2005-2006
- **UTC Award:** *New England University Transportation Research Consortium*, 2000-2001.
- **E-Business Vision Fund Award:** 2000-2001 (through the E-Business Center)
- **Annual Prize in Mathematics, in memory of Stella Dafermos:** *Brown University*, 1991
- **Applied Mathematics Fellowship:** *Brown University*, 1987-1988.
- **Fellowship, Greek National Science Foundation:** for undergraduate students, 1984
- **Third Place, Greek National Mathematical Olympiad:** for high school students, 1983
- **Third Place, Greek National Mathematical Olympiad:** for high school students, 1982

PROJECT EXPERIENCE- GRANTS

- **Research grant** from J-Clinic with Koch Institute (2022-present)
- **Research grant** from General Motors (2021-2024).
- **Research grant** from J-Clinic (2021-2022).
- **Series of Research Grants** from the MIT-IBM Alliance (2020-present on end-to-end learning, 2022-present on time series and ML).
- **Research grant** from Liberty Mutual (2022-24).
- **Series of research grants** from HSI (2019-present) for research on the opioid crisis and managing Emergency Departments, understanding weekend capacity.
- **Series of Research Grants** from Oracle ERO (External Research Office) (Jan 2012- May 2014, August 2014-December 2015, December 2015-December 2016, June 2017-December 2018, Sept 2019-January 2021, July 2021- January 2023). This has been a successful collaboration on research with the Oracle Retail Science group on relevant research problems on pricing and demand prediction.
- **Research grant** from MIT-Quest (2020-21) on COVID-19.
- **Research grant** from Inditex (Zara), Fall 2018-2020.
- **Fellowship** established by Inditex (Zara) to support our ongoing research collaboration.
- **Fellowship** established by Khun Win/Khun Oo/BJC/BigC to the ORC.
- **Research grant** from Myntra (Fall 2017-2019). Research on returns and returns to origin.
- **Adobe faculty awards**, 2017, 2018.
- **Wayfair faculty award**, 2018.
- **Principal Investigator in NSF Award** "A Data-Driven and Real-time Approach to Personalized Bundle Recommendation and Pricing; from Theory to Practice", CMMI-1563343, 2016-2020.
- **Research grant** from the Accenture-MIT Alliance (Fall 2015-May 2017). Research with J&J on demand forecasting for new products.
- **Research grant** from CMPC (Fall 2017-2018) Research on contracts and supply chain.
- **Research grant** from Thenamaris (research with a big shipping company on how to combine predictive and descriptive models in order to optimally deploy ships from the right port over the right route and at the same predict demand of cargo over the world).
- **Research grant** from British satellite company: Inmarsat (Summer 2013-Spring 2015): research on pricing for satellite services.
- **Research grant** from the Accenture-MIT Alliance (Fall 2013-Summer 2014) on the impact of social media to pricing (with Shop.CA).
- **Seed Funding** from the MITEI (MIT Energy Initiative) 2011-2013 (also one of my PhD students Maxime Cohen, working in this project, received a fellowship from MITEI and is a Shell Fellow).
- **Research grant** from Nationalgrid (Sept 2012 – Aug 2013). This project has the goal to understand and predict how storms like Irene will impact utilities (like Nationalgrid) in the northeast and what type of emergencies crews and other preparations they could do in advance as the storm approaches.
- **Principal Investigator** in NSF Award "Tractable Markdown Optimization for an E-Tailer", 2012-2016, 1162034 ~CMMI.
- **Principal Investigator** in NSF Award on "Price of Anarchy and Applications", 2008-2011, 0758061 -CMMI.

- **Principle Investigator** in NSF Award on “Alleviating Travel Delay Uncertainties in Traffic Assignment and Traffic Equilibrium”, 2008-2011, 0824674-CMMI.
- **Co-Principle Investigator**, together with C. Barnhart, D. Bertsimas, A. Odoni and C. Caramanis, EFRI, National Science Foundation, “The National Air-Transportation System as a Re-configurable Engineered System”.
- **Co-Principal Investigator** in NSF Award on “Robust Optimization and Applications”, 2006-2009 0556106-CMMI.
- **Principal Investigator** PECASE Award 9984339-DMI and Career Award-NSF, 2000-2005.
- **Co-principal investigator**, NSF grant 9312971-DDM, for the period 1993-1996 on “Complexity Theory for Variational Inequalities and Mathematical Programs”.
- **Co-principal investigator**, NSF grant 9634736-DMI, for the period 1996-1999 on “Computing Equilibria: Averaging Methods for Fixed Points and Variational Inequalities”.
- **IPU grant** with R. Levi from MIT-Singapore Alliance Program II, 2005-2010.
- **Principal Investigator** in University Transportation Research (UTC and UTRC) Awards, 2000-2001, 2005-2006.
- **Principal Investigator** in Charles Reed Faculty Initiative Fund Award, 2000-2002.
- **Co-principal investigator** e-Business Vision Fund Award, 2001 (through the E-Business Center).
- **Participation as a Faculty Associate** at the MIT-Singapore Alliance Program, 1999-2004.
- **Participation with Draper Labs** in a Project on Autonomous Vehicles and Path Planning, 1998-2000.
- **Participated** at a project for the European Community on Air Traffic Flow Management, 1996.

MIT SUBJECTS TAUGHT

- Spring 2024, Spring 2023, Spring 2022, Spring 2021, Spring 2020, Spring 2019, Spring 2018, Spring 2017, Spring 2016, Spring 2015, Spring 2013, two sections of the course 15.730, “Data, Models and Decisions”, for the Executive MBA program at the Sloan School of Management, MIT.
- Fall 2021, Fall 2019, Fall 2018, Fall 2017, Teaching off load Leadership and Integrative Management for EMBA, week intensive module.
- Fall 2020, Fall 2019, Fall 2018, Session in EMBA Orientation.
- Spring 2022, Fall 2021, Spring 2021, Fall 2020, Spring 2020, Fall 2019, Spring 2019, Spring 2018, Fall 2017, Lectures in EMBA Preview Workshop Weekend.
- Fall 2016, 15.060, “Data, Models and Decisions”, Sloan School of Management, MIT (lead faculty).
- Fall 2015, 15.099, “Readings in Optimization” – Applications of Operations Research in Choice and Assortment Problems.
- Fall 2014, 15.099, “Readings in Optimization – Applications of Operations Research in Social Networks” (with Tauhid Zaman).
- Spring 2012, Co-taught with R. Freund the course 15.730, “Data, Models and Decisions”, for the Executive MBA program at the Sloan School of Management, MIT.
- Fall 2011, Fall 2010, Fall 2009, 2008, 2006, Fall 2004, Fall 2003, Fall 2001, Fall 2000, Fall 1999, Fall 1998 (taught two sections each semester), 15.060, “Data, Models and Decisions”, Sloan School of Management, MIT (lead faculty for the Fall 2001, Fall 2003, Fall 2006, Fall 2008).
- Fall 2011, Fall 2010 – Ethics Module during SIP period.
- Spring 2010, Spring 2008, Spring 2002, Spring 2000, 15.084J/6.252J, “Nonlinear Programming”, Sloan School of Management, MIT.
- Spring 2009, 15.099, “Readings in Optimization – Applications of Operations Research in Electricity Markets”.
- Fall 2007, 15.081, “Introduction to Mathematical Programming”.
- Spring 2005, Spring 2004, Spring 2003, 15.071, “Decision Technologies for Managers” (co-taught with A. Barnett).
- Fall 2003, Fall 2001, Fall 2000, co-taught with D. Bertsimas, 15.093, “Optimization Methods”, Sloan School of Management, MIT (distant education class, also part of the Singapore-MIT-Alliance program).

- Spring 2003, 15.094, “Systems Optimization”, gave several guest lectures, (distant education class, also part of the Singapore-MIT-Alliance program), (R. Freund primary instructor).
- Fall 2007, 15.099, “Readings in Optimization – Game Theory in Operations”.
- Fall 2006, 15.099, “Readings in Optimization –Pricing and Revenue Management”.
- Spring 2005, 15.099, “Readings in Optimization –Price of Anarchy and Applications”.
- Spring 2003, 15.099, “Readings in Optimization – Robust Optimization and Applications”.
- Spring 2002, 15.098, "Special Seminar in Applied Probability; Online Auctions", (with D. Bertsimas and J. Gallien).
- Spring 2001, 15.099, “Readings in Optimization – Applications of Optimization in Problems of Dynamic Nature”, Sloan School of Management, MIT.
- Spring 2000, 15.099, “Readings in Optimization – Revenue Management”, Sloan School of Management, MIT.

MIT ACTIVITIES & LEADERSHIP POSITIONS

- 1) **Associate Dean of SERC (Social and Ethical Responsibility in Computing)**, MIT Schwartzman College of Computing and MIT Sloan, *September 2022-present*
- 2) **Co-Director of the Operations Research Center**, MIT, July 2019-present.
- 3) **Member in the Leadership Council and Faculty Promotions Subcommittee in the Schwartzman College of Computing Council**, representing MIT Sloan, January 2020 - present.
- 4) Presented at 2023 **Corporation Development Committee (CDC)** Annual Meeting Luncheon, Fall 2023.
- 5) **Faculty Director of EMBA program**, and **Chair of EMBA Faculty Committee**, MIT Sloan, July 2017-August 2022.
- 6) **Member of the Sloan Fellows Faculty Committee**, MIT, September 2017-2022.
- 7) **Member of the MBAn Faculty Committee**, MIT, September 2017-2022.
- 8) **Member of the MIT Working Group on Space**, Fall 2022.
- 9) **Member of the MIT Working Group on Disclosures**, Summer 2020-Summer 2021.
- 10) **Member of the MIT Working P-CRSP Working Group** for renovation and space planning, 2021-22.
- 11) **Member of the MIT Committee on Killian Awardee selection**, 2020-21.
- 12) **Faculty Policy MIT Institute Committee**, Fall 2017- Spring 2020.
- 13) **Member of the Committee for a Blended Program**, MIT Sloan, 2019.
- 14) **Faculty Director, Certificate of Analytics**, MIT Sloan, September 2016-June 2019 and **Chair of the Committee for creating Analytics Certificate** at MIT Sloan 2016-17.
- 15) **Gender Equity Committee**, MIT Sloan, 2007-2020.
- 16) **Member of the Faculty Editorial Working Group**, MIT Sloan, Jan 2019-December 2019.
- 17) **Member of the MIT CWSEM Working Group**, Spring and Summer 2019.
- 18) **Search Committee Member for Assistant Professor in Operations Research and Statistics**, MS Area, MIT, 2011-2022.
- 19) **Search Committee Member for Assistant Professor in Operations Management**, MS Area, MIT, 2006-2007, 2009-2022.
- 20) **Search Committee Member for Assistant Professor in Operations Management joint with the Schwartzman College of Computing**, MIT, 2020-21.
- 21) **Operations Management Group representative of the promotion committee**: Negin Golrezaei to AWOT, Fall 2022.
- 22) **Operations Management Group representative of the reappointment committee**: Negin Golrezaei, Spring 2020, Spring 2022.
- 23) **Mentor to junior faculty in the Operations Management Group**: Negin Golrezaei, Fall 2018-present.
- 24) **Mentor to junior faculty in the Operations Management Group**: Swati Gupta, Fall 2022-present.
- 25) **Mentor to junior faculty in the Operations Management Group**: Chara Podimata, Fall 2022-present.
- 26) **Mentor to now senior faculty in the Operations Management Group**: Karen Zheng, Fall 2011-present.

- 27) **Mentor to now senior in the Operations Management Group:** Nikos Trichakis, Summer 2016-present.
- 28) **Committee member to review AWOT of Dean Eckles (Marketing Group),** Fall 2017, Fall 2018.
- 29) **Committee member for the promotion of Tony Ke (Marketing Group),** Spring 2019.
- 30) **Committee member to Full Professor, AWIT, AWOT cases of Nemit Shroff,** Spring 2018-Fall 2021.
- 31) **Spoke at the Kickoff of the Annual Sloan Fund for EMBA Class 2017** (Dec 2016), at the *Kickoff of the Annual Sloan Fund for EMBA Class 2018* (Jan 2018). Gave a presentation at the Dean's Circle January 2018.
- 32) **Member of MBA Policy Committee, MIT,** 2016-17.
- 33) **Head of the Operations Management Group, MIT Sloan,** July 2011-July 2017.
- 34) **Head of Search Committee for hiring in Operations Management at MIT Sloan,** 2011-2012, 2015-2017.
- 35) **Head of Search Committee for hiring in Operations Research and Statistics at MIT Sloan,** 2010-2015.
- 36) **Head of the Operations Research and Statistics Group, MIT Sloan,** July 2010-2011.
- 37) **Co-Chair of the Committee on Graduate Student Officers Roundtable** (with Christine Ortiz and Leslie Kolodziejski) 2015-16, 2016-17.
- 38) **Member of Search Committee for Director of the Technology Licensing Office at MIT** (Winter and Spring 2016).
- 39) **Representative member from Sloan on the Institute CoN Committee (Institute Committee on Nominations),** 2012-2013, 2014-2015, 2015-2016 (break due to Sabbatical in 2013-2014).
- 40) **Faculty Co-director, Leaders for Global Operations Program (LGO),** July 2009-July 2015.
- 41) **Co-Chair with David Simchi-Levi of Search Committee for the new Executive Director of LGO** (Don Rosenfield's replacement), Fall 2013.
- 42) **Member of MIT Innovation Committee,** Nov-2013-2014.
- 43) **Member of MIT Sloan School Committee for Online Strategy of the School, SOLARIS** (Chair A. Lo) 2014-2015.
- 44) **Committee on International Initiatives,** 2014-2015.
- 45) **Committee member to review the reappointment of Juanjuan Zhang as** (i) Assistant Professor, Spring 2008, Spring 2010, (ii) committee for promotion to Associate Professor without tenure, Fall 2010, committee for tenure case, 2012-2013, (iii) committee for Full Professor, Spring 2015.
- 46) **Committee member to review the case for Full Professor of Kate Kellogg,** Spring 2015.
- 47) **Chair of committee for consideration of Professor J. Santos as Professor of Practice at the GEM group at MIT Sloan,** Spring-Fall 2012.
- 48) **Committee member to review the reappointment of Elena Obukhova as Assistant Professor,** Spring 2009 and Spring 2011, Spring 2012.
- 49) **Committee for awarding the Edgerton prize to a junior faculty at the Institute,** Spring 2008, Spring 2012.
- 50) **Committee member for adjunct professor case of Zeynep Ton,** Spring 2012.
- 51) **Executive Personnel Committee, MIT Sloan,** 2009-2010, 2011-2012, 2012-2013.
- 52) **MIT Sloan Core Review Committee,** 2010-2011.
- 53) **MIT Task Force** appointed by the Provost, 2010-2011.
- 54) **Co-Chair** (with D. Berechman) of **Committee on Values Committee** 2006-August 2010.
- 55) **Member of Faculty Committee on Values,** 2010-2011.
- 56) **Sloan PhD Committee Member,** Spring 2010.
- 57) **Associate Director for LGO and SDM programs** 2009-2010.
- 58) **OR/Statistics group co-head** (with A. Schulz), *Management Science Area,* July 2008-July 2009.
- 59) **Chair of Committee on Reviewing the Operations Research Center PhD Program,** Fall 2008- Spring 2009.
- 60) **Chair of Committee for the Operations Management Track** for the *Operations Research Center,* Fall 2009.

- 61) **Search Committee co-chair** (with A. Schulz) **for Assistant Professor in Statistics**, *MS Area*, 2008-2009.
- 62) **Search Committee for a faculty position in Transportation across the Institute**, Spring 2009.
- 63) **Search Committee for Assistant Professor in Accounting**, *EFA Area*, 2006-2007.
- 64) **Search committee for a faculty position in Computational Engineering at the Institute**, Spring 2004.
- 65) **Committee member to review the reappointment of Michelle Hanlon**, Outside Appointment Target of Opportunity as Associate Professor with tenure, Spring 2009.
- 66) **Committee member for promotion of Michelle Hanlon** from Associate to Full Professor at *MIT Sloan*, Fall 2011.
- 67) **Committee to review the reappointment of Jeremie Gallien** as Associate Professor without tenure, Spring 2008.
- 68) **Committee member to review the reappointment of Mark Mortensen** as Assistant Professor, Spring 2007.
- 69) **Committee member to review Diane Burton** for reappointment as Assistant Professor, Spring 2002.
- 70) **Institute Committee on Operations Research**, June 1998-Fall 2001.
- 71) **Five times member of the committee for awarding the Merit Scholarship Awards** to the *second year MBA classes* of Spring 2000-Spring 2004.
- 72) **Five times Faculty Advisor for a cohort (~55 students) of the incoming MBA class**, Fall 2000, Fall 2001, Fall 2003, Fall 2004, Fall 2006.
- 73) **Admissions committee for the PhD program at the Operations Research Center**, 2003-2004, 2007-2010.
- 74) **Admissions committee for the Master's program CDO**, Spring 2009.
- 75) **INFORMS MIT Student Chapter Faculty Advisor** Summer 1998-Summer 2001.
- 76) **Faculty Advisor for the Operations Research Center IAP Activities**, *IAP* 2000.
- 77) **Faculty Advisor for organizing the Operations Research Seminar Series**, Fall 2001, Spring 2002, Fall 2004, Spring 2005, Fall 2006, Spring 2007, Fall 2011, Fall 2012.
- 78) **Coordinator of Qualifying Examination on Mathematical Programming** for the *Operations Research Center*, 1998 - 1999, 2000 - 2001, 2010-2011.
- 79) **Member** of the *Operations Research Center*.
- 80) **Faculty Associate** at the *Singapore-MIT Alliance Program* 1998-2010.
- 81) **Member** of the *CDO Program*.
- 82) **Served on several Thesis Committees of Doctoral Candidates and General Examination Committees** at the *Operations Research Center, the Sloan School as well as the School of Engineering*.

PROFESSIONAL ACTIVITIES & LEADERSHIP

- 1) **Editor in Chief** *M&SOM journal*, Jan 2021-present.
- 2) **Department Editor** for the journal *Service Science*, Jan 2019-December 2020.
- 3) **America's Editor in Chief** (with Ian Yeoman as global Editor in Chief) for the journal *Revenue Management and Pricing*, Fall 2003-2010.
- 4) **Area Editor in the area of Supply Chain Management and Services** for the journal *Networks and Spatial Economics*, summer 2003-2010.
- 5) **Area Editor in Pricing and Revenue Management** for *Encyclopedia in Operations Research*, 2008-2011.
- 6) **Visiting Committee Member** to review *Harvard Business School* for accreditation, Fall 2023.
- 7) **Chair** for the *Best Student Paper in Supply Chain of the POM Supply Chain College*, Spring 2019.
- 8) **Co-Chair** of *INFORMS 2018, for Plenary and Keynote Speeches*, 2018.
- 9) **Chair of the Revenue Management and Pricing Section** of *INFORMS*, 2001-2003.
- 10) **Vice President of Communications and Meetings** for the *INFORMS MSOM Society*, 2009-2010.
- 11) **Member of the Committee for the selection** of *INFORMS of INFORMS Fellows*, 2017-2020.

- 12) **Member of the Board of the Revenue Management and Pricing Section** of *INFORMS*, 2003-2005.
- 13) **Member** of the *INFORMS Council* 2003.
- 14) **Member** of the *INFORMS* Committee on Sections and Societies, 2021-present.
- 15) **Member** of the review committee of the editor in chief of the *Service Science* journal, Spring 2021.
- 16) **Chair of the RMP Best Dissertation Award**, *INFORMS*, 2017
- 17) **Chair for the TSL Best Dissertation Award**, for the *INFORMS TSL Society*, 2009.
- 18) **Chair for the George Nicholson Competition for Best Student Paper in Operations Research and Management Science** by *INFORMS*, 2008.
- 19) **Member of the INFORMS Committee for the UPS George Smith Prize**, for selecting the Best Academic Program in Analytics that had an impact in training students in Analytics in practice, 2014-2016.
- 20) **Member of committee for selection of editor in chief** of the *M&SOM* journal (2008-09).
- 21) **Member of committee for renewal of editor in chief** of the *Operations Research* journal (2014-15).
- 22) **Member of committee for renewal of editor in chief** of the *Service Science* journal (2021).
- 23) **Associate Editor** for the journal *Management Science*, 2008-present.
- 24) **Associate Editor** for the journal *Management Science*, 1998-2003.
- 25) **Associate Editor** for the journal *Operations Research*, January 2006-December 2020.
- 26) **Senior Editor** for the journal *POM (Production and Operations Management)*, 2009-December 2020.
- 27) **Associate Editor** of the journal *M&SOM*, Jan 2019-Dec 2020.
- 28) **Associate Editor** of the *INFORMS Journal on Optimization*, Fall 2017-Dec 2020.
- 29) **Associate Editor** for the journal *Naval Logistics Research*, 2003-2017.
- 30) **Associate Editor** for the Special Issue of *Management Science on Online Auctions*, 2003.
- 31) **Senior Editor** for the *Journal of Flexible Services and Manufacturing*, 2006-2010.
- 32) **Guest Associate Editor** for the journal *Operations Research*, 2005-2006.
- 33) **Editorial Board** for the journal *M&SOM*, 2004-2005.
- 34) **Advisory Editorial Board** of the journal *Transportation Research B*, 2004-2007.
- 35) **Advisory Editorial Board** of the journal *Transportation Research C*, 2005-present.
- 36) **Committee to evaluate the MSOM conference format**, Summer 2008.
- 37) **Committee** of the 2008 and 2010 *MSOM conferences*.
- 38) **Judge** for the 2004, 2006, 2007, 2008, 2010 *MSOM Best Student Paper Competition*.
- 39) **Judge** in *Nicholson Best Student Paper Competition in Operations Research*, 2007.
- 40) **Judge** in *Nicholson Best Student Paper Competition in Operations Research*, 2015 and 2016.
- 41) **Judge** for the *TSL INFORMS Section, Best Dissertation Award*, 2007, 2008.
- 42) **Judge** for the *JFIG (Junior Faculty Interest Group) INFORMS Section, Best Paper Award*, 2007, 2011, 2018, 2021.
- 43) **Judge for the Data Mining Informs Competition**, Fall 2018.
- 44) **Co-organizer of the INFORMS Revenue Management and Pricing Conference**, at Columbia University, June 2003, June 2006, and at Sloan, MIT, June 2004, June 2005.
- 45) **Organizing committee of the INFORMS Revenue Management and Pricing Conference**, Barcelona, June 2007, Montreal, June 2008, June 2018.
- 46) **Main Organizer of the MSOM conference at MIT Sloan School**, June 2009.
- 47) **Organizing Committee MSOM conference**, Technion Israel June 2010.
- 48) **Co-organizer** with D. Simchi-Levi of **"The Second MIT Symposium in Operations Research: "Procurement and Pricing Strategies to improve Supply Chain Performance"** May 30, *Sloan School, MIT*, 2003.
- 49) **Co-chair** with Xin Chen of the **Cluster on Logistics and Transportation**, *ISMP Conference*, Chicago 2009.
- 50) **Co-chair** with Marco Luebbecke of the **Cluster on Logistics and Transportation**, *ISMP Conference*, Berlin, Germany, August 2012.
- 51) **Organizer of the Invited and Sponsored Clusters in "Revenue Management – Pricing"**, for the *INFORMS conference* in Spring 2000, Fall 2001, Fall 2006 and Fall 2007.

- 52) **Organizer and chair of sessions in Revenue Management, Pricing, Transportation, Optimization and Supply Chain**, at Conferences such as *INFORMS, EURO-INFORMS, IFORS, CORS- INFORMS, ISMP Conferences, IEEE Conference on Intelligent Transportation Systems, TRISTAN*.
- 53) Served several times as a **panelist** for the *NSF Operations Research, Service Enterprise, and Production Systems Programs*.
- 54) **Reviewer** for *NSF proposals in Mathematical Sciences, Operations Research, Service Enterprise*.
- 55) **Reviewer** for journals such as *Management Science, Operations Research, Mathematics of Operations Research, Mathematical Programming, JOTA, Networks, Transportation Science, Transportation Research B and C*.

PROFESSIONAL SOCIETY MEMBERSHIPS

American Mathematical Society (*AMS*)
 Institute for Operations Research and Management Science (*INFORMS*)
 Mathematical Programming Society (*MPS*)
 Society of Industrial and Applied Mathematics (*SIAM*)
 INFORMS Pricing and Revenue Management Section
 INFORMS MSOM Society
 INFORMS AMS (Applied Probability Society)
 INFORMS Transportation and Logistics Society (*TSL*)
 INFORMS Optimization Society
 INFORMS Service Science Section
 INFORMS Women in Operations Research and Management Science Section (*WORMS*).

THESIS SUPERVISION

Graduated Ph.D. Students

1. **Elaine Chew, PhD**, *Graduated January 2000*, (co-advisor Jeanne Bamberger) (research on: Operations Research Models for Music Tonality). Professor of Digital Media. Queens Mary, University of London, School of Electronic Engineering and Computer Science. Senior Centre National de la Recherche Scientifique (CNRS) researcher and pianist at the Institut de Recherche et Coordination Acoustique/Musique (IRCAM) in Paris, France.
2. **Soulaymane Kachani, PhD**, *graduated June 2002* (research on: Dynamic Models in Transportation as well as Dynamic Pricing). Professor of Practice Department of Industrial Engineering and Operations Research, Vice Dean in the School of Engineering and Vice Provost, Columbia University.
3. **Jeff Hawkins, PhD**, *graduated June 2003* (co-advisor D. Bertsimas) (research on: Internet Auctions). Goldman Sachs.
4. **Anshul Sood, PhD**, *graduated June 2004* (research on: Pricing and Revenue Management under Competition). Investment Analyst, ExodusPoint Capital Management, LP, New York.
5. **Marina Zaretsky, PhD**, *graduated July 2004* (research on: Variational Inequalities and Competitive Supply Chain Management), Barclays Investment Bank.
6. **Michele Aghassi, PhD**, *graduated August 2005* (co-advised with main advisor D. Bertsimas) (research: Variational Inequalities and Robust Network Design). AQR Capital.
7. **Elodie Adida, PhD**, *graduated May 2006* (research on dynamic pricing and fluid models). Full Professor at the University of Riverside, California.
8. **Guillaume Roels, PhD**, *graduated May 2006* (research in transportation and supply chain management), initial placement UCLA, Full Professor INSEAD, Operations Management group.
9. **Carine Simon, PhD**, *graduated August 2007* (research on competitive dynamic pricing with demand learning), Liberty Mutual 2007-2018. Senior Lecturer at Bentley College.
10. **Jonathan Kluberg, PhD**, *graduated May 2011* (research on price of anarchy and the effects of deregulation in electricity markets), Investment Analyst at HighVista Strategies.
11. **Ruben Lobel, PhD**, *graduated March 2012* (research on dynamic pricing and solar panel technology applications), initial placement Wharton Business School, currently Data Scientist at Airbnb.

12. **Wei Sun, PhD**, *graduated August 2012* (research on congestion pricing as well as contracts in supply chains), Research Staff at IBM Research, Watson.
13. **Philip Keller** (co-advisor R. Levi), **PhD**, *graduated May 2013* (research on choice demand modeling in pricing), Facebook.
14. **Joline Ann Villaranda Uichanco** (co-advisor R. Levi), **PhD**, *graduated August 2013* (research on the data-driven newsvendor problem), Associate Professor with tenure at Ross Business School, University of Michigan.
15. **Mattheu Monsch** (co-advisor V. Farias), **PhD**, *graduated August 2013* (research on dynamic games and revenue management), Google, California.
16. **Zachary Leung, PhD**, *graduated August 2014* (research on markdown pricing with strategic consumers), Assistant Professor at City University of Hong Kong.
17. **Gonzalo Romero** (co-advisor R. Levi), **PhD**, *graduated August 2014* (research on the data-driven models in transportation), Assistant Professor at the Rotman School of Business at University of Toronto.
18. **Maxime Cohen, PhD**, *graduated August 2015* (research on pricing for promotions as well as new products and research on subsidies for green technologies), Postdoc Google 2015-16, initial placement at NYU Stern 2016-19. Full Professor McGill University 2019-present.
19. **Charles Thraves, PhD**, *graduated May 2017* (research on pricing and research on subsidies for green technologies), Assistant Professor, University of Chile.
20. **Anna Papush, PhD**, *graduation January 2018* (research on bundle pricing with personalized information), Analyst, Portfolio Management, Core, Acadian Asset Management, LLC.
21. **Daniel Chen** (co-advisor R. Levi), **PhD**, *graduated August 2018* (research on the data driven operations problems), Research Scientist at High Performance Computing, Singapore, and also at Amazon.
22. **Lennart Baardman, PhD**, *graduated May 2019* (research on analytics in pricing, promotion planning and online advertising). Assistant Professor Ross School of Business, University of Michigan, 2019-present.
23. **Max Biggs, PhD**, *graduated August 2019* (research on optimization, demand prediction and machine learning). Postdoc IBM Research 2019-20. Assistant Professor Darden School, University of Virginia, 2020-present.
24. **Rim Hariss**, (co-advisor Karen Zheng), **PhD**, *graduated August 2019* (research on analytics in optimization with machine learning as well as pricing and rewards programs and how price signals quality of a product in retail). Assistant Professor McGill University, 2020-present.
25. **Tamar Cohen-Hillel, PhD**, *graduated August 2020* (research on analytics in pricing). Postdoc at Amazon 2020-2021. Assistant Professor University of British Columbia (UBC) 2021-present.
26. **Divya Singhvi, PhD**, *graduated August 2020* (research on analytics in pricing with limited demand information, machine learning, MABs, returns in retail and supply chain). Resident in AI postdoctoral associate IBM Research 2020-2021. Assistant Professor NYU Stern 2021-present.
27. **Elaheh Fata**, (co-advisor David Simchi-Levi), **PhD**, *graduated August 2020* (research on online advertising). Postdoc at Columbia University 2020-2021. Assistant Professor Queens University 2021-present.
28. **Elisabeth Paulson**, (co-advisor Retsef Levi), **PhD**, *graduated 2021* (research on issues around food and agriculture as they relate to supply chains), Postdoc at Stanford University 2021-2022. Assistant Professor at Harvard Business School, 2022-present.
29. **Omar Skali-Lami, PhD**, *graduated Spring 2022* (research on machine learning in healthcare and online retail), Senior Data Scientist at QuantumBlack, AI by McKinsey.
30. **John Spantidakis, PhD** *graduated summer 2022* (research on approximation algorithms for pricing applications, and supply chains), Research Scientist at Amazon.

Graduated M.S. Students

- 1) **Scott McKeever, Masters**, *graduated May 2000* (research on: Autonomous Vehicles and Path Planning).
- 2) **Marc Coumeri**, (co-advisor D. Bertsimas) **Masters**, *graduated Summer 2000* (research on: Pricing and Revenue Management).
- 3) **Lin Guochun, Masters**, *SMA Program, graduated May 2002* (research on: Dynamic Traffic Equilibrium).
- 4) **Michael Yee, Masters**, *graduated August 2003* (research on: Network Equilibrium Problems in Static and Dynamic Environments).
- 5) **Phan Tien Dung**, (co-advisor J. Sun), **Masters**, *graduated Summer 2004* (research on: Quadratically Constrained Convex Quadratic Programs).
- 6) **Wei Sun, Masters**, *graduated Summer 2006, CDO program*, (research on Price of Anarchy for Bertrand Oligopolies).
- 7) **Kevin Zhang, Masters**, *graduated Summer 2006, CDO program*, (research on Pricing with Adjustable Robust Optimization).
- 8) **Joline Ann Villaranda Uichanco**, (co-advisor R. Levi), **Masters**, *August 2007, CDO program*. Graduation August 2007 (research on a data driven approach for the newsvendor and the price-setting newsvendor problem).
- 9) **Yun Lu**, (co-advisor D. Bertsimas) **MS student**, *graduated August 2007, CDO program*. (research on robust network design).
- 10) **Tingting Rao**, (co-advisor R. Levi), *graduated August 2008 CDO program* (research on the multi-period joint dynamic pricing and inventory control problem for many products with joint capacities).
- 11) **Thibault Le Guen, ORC, Masters**, *graduated August 2008* (research on data driven pricing).
- 12) **Koon Soon (Justin) Teo**, *graduated Summer 2009, CDO program*. (research on loss of profit due to lack of coordination in competitive supply chains).
- 13) **Anupam Mazumdar**, *graduated Summer 2009, CDO program* (Iterative Algorithms for a Joint Pricing and Inventory Control Problem with Nonlinear Demand Functions).
- 14) **Daizhuo Chen**, *graduated Summer 2010, CDO program* (Modeling Travel Time Uncertainty in Traffic Networks).
- 15) **Thai Dung Nguyen**, (co-advisor D. Bertsimas), *graduated Summer 2010, CDO program* (Application of Robust and Inverse Optimization in Transportation).
- 16) **Jingxi Wang**, *graduated Summer 2010, CDO program* (A Decentralized Incentive Mechanism for Company-Wide Energy Consumption Reduction).
- 17) **Derrick Ongchin, LGO**, *graduated May 2011* (research with Cisco on the health of inventory policies).
- 18) **Soji Awe, LGO**, *graduated May 2011* (research with Boeing on the build-up of the 777 engine).
- 19) **Sid Balwani, LGO**, *graduated May 2012* (research with Nationalgrid).
- 20) **Rachel Avril, LGO**, *graduated May 2013* (research with Zara).
- 21) **Brent Yoder, LGO**, *graduated May 2013* (research with Nationalgrid).
- 22) **Nori Ogura, LGO**, *graduated May 2013* (research with Nationalgrid).
- 23) **Sean Whipple, LGO**, *graduated May 2014* (research with Nationalgrid on weather impact on the utilities assets and how to mitigate the impact).
- 24) **Ryan Doss, LGO**, *graduated May 2014* (research with Nationalgrid).
- 25) **Bradley Gesner, LGO**, *graduated May 2014* (research with Nationalgrid on their supply chain).
- 26) **Jose Manuel Garcia, LGO**, *graduated May 2014* (research with Zara on predicting trends and special events).
- 27) **Arvind Simhardi, LGO**, *graduated May 2015* (internship with Nationalgrid).
- 28) **Richard Mullen, LGO**, *graduated May 2015* (internship with PG&E).
- 29) **Evelyne Kong, LGO**, *graduated May 2015* (internship with Inditex on demand prediction and interaction among items on the floor).
- 30) **Ludovica Rizzo Masters ORC**, *graduated May 2015* (research on the impact of social media on pricing).

- 31) **Wichinpong Sinchaisry (Park), CDO**, *graduated January 2016* (co-advisor Karen Zheng), (research on pricing incorporating behavioral attributes of consumers).
- 32) **Lillian Meyer, LGO**, *graduated May 2016* (internship with PG&E).
- 33) **Greg Eschelbach, LGO**, *graduated May 2016* (internship with PG&E).
- 34) **Adam Chao, LGO**, *graduated May 2016* (internship with PG&E).
- 35) **Michael McMillan, LGO**, *graduated May 2016* (internship with Inditex).
- 36) **Jacquelyn Mohl, LGO**, *graduated May 2016* (internship with Nationalgrid).
- 37) **Kippy Ingram, LGO**, *graduated May 2016* (internship with Nationalgrid).
- 38) **Sandy Yuan, LGO**, *graduated May 2017* (internship with Nationalgrid).
- 39) **Boyan Kelchev, LGO**, *graduated May 2017* (internship with PG&E).
- 40) **James Coles, LGO**, *graduated May 2017* (internship with Inditex/Zara).
- 41) **Mohamed Kurdi, LGO**, *graduated May 2017* (internship with PG&E).
- 42) **Steven Link, LGO**, *graduated 2018* (internship at PG&E).
- 43) **Wade McElroy, LGO**, *graduated 2018* (internship at PG&E).
- 44) **Max Tuttmann, LGO**, *graduated 2018* (internship at PG&E).
- 45) **Scott Foster, LGO**, *graduated 2018* (internship at Zara).
- 46) **Lila Friedly, LGO**, *graduated 2018* (internship at Zara).
- 47) **Jeremy Hare, LGO**, *graduated 2018* (internship at Nationalgrid).
- 48) **Shai Dekel, LGO**, *graduated 2018* (internship at Nationalgrid).
- 49) **Megan Rose McCleneghan, LGO**, *graduated 2019* (research with PGE).
- 50) **Manuel Martinez Puppo, LGO**, *graduated 2019* (research with Zara).
- 51) **Ali Said ElSeddik, LGO**, *graduation 2020* (research with Nationalgrid).
- 52) **Monica Harnoto, LGO**, *graduation 2020* (research with Nationalgrid).
- 53) **Trevor J. Thompson, LGO**, *graduation 2021* (research with Nationalgrid).
- 54) **Lampros Tsontzos, LGO**, *graduation 2022* (research with Zara).
- 55) **Alexandra Hardin, LGO**, *graduation 2022* (research with Nationalgrid).
- 56) **Christina Michaels, LGO**, *graduation 2022* (research with Nationalgrid).
- 57) **Clemente Ocejo, MEng EECS**, *graduation 2022* (research on neural network and time series and its application with Boston Scientific).
- 58) **Paolo Luciano, LGO**, *graduation 2023* (research with Zara).
- 59) **Josh Weisberg, LGO**, *graduation 2023* (research with Nissan).

Current Doctoral Students

- 1) **Leann Pearl Geetha Thayaparan, fifth year PhD student ORC**, *expected graduation 2024* (research on predictive models in the area of pricing).
- 2) **Asterios Tsiourvas, fourth year PhD student ORC**, *expected graduation 2025* (research on Machine Learning and Optimization in the area of healthcare and supply chains).
- 3) **Rares Cristian, fourth year PhD student ORC**, *expected graduation 2025* (research on Machine Learning and Optimization in the area of supply chains).
- 4) **Angela Lin, third year PhD student ORC**, *expected graduation 2026* (research on Machine Learning and Optimization in the area of healthcare).
- 5) **Emily Zhang, third year PhD student ORC**, (co-advised with Retsef Levi), *expected graduation 2026* (research on promotions to reduce food waste).
- 6) **Manuel Moran Pelaez, third year PhD student ORC**, *expected graduation 2025* (research on analytics in retail).
- 7) **Joyce Luo, second year PhD student ORC**, *expected graduation 2027* (research on healthcare).
- 8) **Alkiviadis Mertzios, second year PhD student ORC**, *expected graduation 2027* (research on machine learning and time series with applications in supply chains and healthcare).
- 9) **William Zhang, second year PhD student ORC**, (co-advised with Saurabh Amin from CEE and ORC) *expected graduation 2027* (research on machine learning with applications in insurance and supply chains).

- 10) **Xuening Wang, first year PhD student ORC**, *expected graduation 2028 (research on optimization and learning for pricing)*.

Current Masters Students

- 1) Michael Lowell Hensgen, **MEng in EECS** *expected graduation May 2024* (research with IBM and Boston Scientific on machine learning).
- 2) Davy Qi, **LGO**, *expected graduation 2024* (research with Zara).
- 3) Matthew Robins, **LGO**, *expected graduation 2024* (research with Nike).

Current MBAn Students

- 1) Shanti Sanchez Barbero, **MBAn student RA 2023-24**, graduation August 2024.
- 2) Theo Dawson, **MBAn student RA 2023-24**, graduation August 2024.
- 3) Meredith Gao, **MBAn student RA 2023-24**, graduation August 2024.
- 4) Matea Gjika, **MBAn student RA 2023-24**, graduation August 2024.
- 5) Jeremy Michael, **MBAn student RA 2023-24**, graduation August 2024.
- 6) Maxime Wolfe, **MBAn student RA RA 2023-24**, graduation August 2024.
- 7) Xidan Xu, **MBAn student RA RA Spring 2024**, graduation August 2024.

Current UROP Students

- 1) Stacey Wang **UROP, Mathematical Economics, undergrad**, 2021-24.
- 2) Amanda Paredes Rioboo, **UROP, Computer Science, undergrad**, 2023-24.
- 3) Abhinav Goel, **UROP, Computer Science, undergrad**, 2023-24.
- 4) Alice Yu, **UROP, Computer Science, undergrad**, 2023-24.

Other Student Supervision

Amine Mohammed Bennouna, PhD, (main advisor Bart Van Parys), *expected graduation 2024* (research on prescriptive predictive models in the area of reinforcement learning).

Daniel Schoess Masters student, visiting from ETH, March-October 2023.

Capstone advisor of Estella Dentinger and Brittany Nguyen, **MBAn students** (project with Macy's), graduated August 2023.

Capstone advisor of Yifei Long and Claire Guan, **MBAn students** (project with Wayfair), graduated August 2023.

Capstone advisor of Gibson Russell and Dayna Wilmot, **MBAn students** (project with General Motors), graduated August 2022.

Capstone advisor of Caroline Dogherty and Kyle Maulden, **MBAn students** (project with General Motors), graduated August 2022.

Capstone advisor of Jessi Zhou and Rocky Ziang Xie, **MBAn students** (project with Wayfair), graduated August 2022.

Capstone advisor of Simon Weil and Arnaud Sarfati, **MBAn students** (project with Wayfair), graduated August 2021.

Capstone advisor of Matthew Garbecki and Jorge Alejandro Quintanilla, **MBAn students** (project with GroupM), graduated August 2021.

Capstone advisor of Garfield Jin and Tim Li, **MBAn students** (project with GM), graduated August 2021.

Capstone advisor of Kexin (Isabelle) Zhang and Jiewen (Ada) Wang **MBAn students** (project with Zara), graduated August 2020.

Capstone advisor of Allison Borenstein and Jiong Wei Lua, **MBAn students** (project with Wayfair), graduated August 2020.

Capstone advisor of Ahmed Aamrani and Dao Ming Lee, **MBAn students** (project with Nordstrom), graduated August 2020.

Capstone advisor of Lisa Walz and Rachel Holmer, **MBAn students** (project with Wayfair), graduated August 2019.

Capstone advisor of Zhe Yi (Gabriel) Chua, Meng (Anita) Zhang, **MBAn students** (project with Stubhub), graduated August 2019.

Capstone advisor of Zhechao Huang, Zhelun Wang **MBA students** (project with Stubhub), graduated August 2019.

Capstone advisor of Michael Li and Charles Herman, **MBA students** (project with Stubhub), graduated August 2018.

Capstone advisor of Matthijs Taselaar and Matthieu Humeau, **MBA students** (project with Stubhub), graduated August 2017.

Abhranil Chakrabarti, **MBA student RA 2022-23**, graduation August 2023.

Bihbabasu Das, **MBA student RA 2022-23**, graduation August 2023.

Gavin Findlay, **MBA student RA 2022-23**, graduation August 2023.

Julia Gilbertat Mayol, **MBA student RA 2022-23**, graduation August 2023.

Duanchen Liu, **MBA student RA Fall 2022**, graduation August 2023.

Oscar Nino Courbit, **MBA student RA 2022-23**, graduation August 2023.

Hermine Tranie, **MBA student RA 2022-23**, graduation August 2023.

Hamza Zerhouni, **MBA student RA 2022-23**, graduation August 2023.

Ian Tongs, **MBA student RA 2021-22**, graduation August 2022.

Chloe Pariente, **MBA student RA 2021-22**, graduation August 2022.

Arpit Jain, **MBA student RA 2021-22**, graduation August 2022.

Imane Farhat, **MBA student RA 2020-21**, graduation August 2021.

Matthew Garbecki, **MBA student RA 2020-21**, graduation August 2021.

Kiran Gite, **MBA student RA 2020-21**, graduation August 2021.

Pierre Louis Bourlon, **MBA student RA 2020**, graduation August 2021.

Shane Weisberg, **MBA student RA 2020-21**, graduation August 2021.

Rebecca Hsiang-Yun Schubertruegmer, **MBA student RA 2020-21**, graduation, August 2021.

Carrie Fowle, **MBA student RA 2019-20**, graduation August 2020.

Raphaelle Dupont, **MBA student RA 2019-20**, graduation August 2020.

Pierre-Henri Ramirez, **MBA student RA Fall 2019 and Spring 2020**, graduation August 2020.

Jiong Wei Lua, **MBA student RA Spring and Summer 2020**, graduation August 2020.

Luis Honsel, **MBA student RA Fall 2019**, graduation August 2020.

Jiewen Wang, **MBA student RA 2019-20**, graduation August 2020.

Stacey Wang **UROP, Mathematical Economics, undergrad**, 2021-2023.

Divya Shyamal **UROP, Math with CS, undergrad**, 2022.

Alice Zhang, **UROP, Wellesley Math, undergrad**, 2022.

William Zhao, **UROP, Math undergrad**, 2021.

Ali Sinan Kaya, **UROP, Math undergrad**, 2021.

Guanpeng (Andy) Xu, **UROP, Math undergrad**, 2021.

Ben Radovitzky, **UROP, Math undergrad**, 2021.

Daniel Leon Jimenez, **UROP, Math undergrad**, 2021.

Natalia Suarez, **UROP, EECS-Econ undergrad**, 2020.

Janice Yang, **UROP, EECS undergrad**, 2020.

Matthew Nay, **UROP, Sloan undergrad**, 2020.

Clemente Ocejo Elizondo, **UROP, EECS undergrad**, 2019, 2020.

Carson J. Smith, **UROP, EECS undergrad**, 2019, 2020.

Lilia Stazei, **UROP, EECS undergrad**, 2019, 2020.

Margaret Redfield, **UROP, Sloan, undergrad**, 2019, 2020.

Theresa Lo, **UROP, Sloan, undergrad**, 2019.

Leanne Pearl Geetha Thayaparan, **MBA student RA**, graduation August 2019.

Antoine Roncoroni, **MBA student RA Fall 2018**, graduation August 2019.

Jonah Aaron Adler, **MBA student RA Spring 2019**, graduation August 2019.

Stephen Chen, **MBA student RA Spring 2019**, graduation August 2019.

Kenza Sbai, **MBA student RA 2017-18**, graduated August 2018.

Faye Grace Cheng, **MBA student**, graduated May 2018.

Daniel Salomon Lavie, **MBA student**, graduated May 2018.

Peter Tran, **EECS Major, UROP Student**, Summer 2018.

Sooji Kang, student at Wellesley College, **UROP Student**, Summer 2018.
 Danielle Fang, EECS Major, **UROP Student**, Summer 2018.
 Yaakov Heiman, EECS Major, **UROP Student**, Summer 2018.
 Elisabeth Aurelio, EECS Major, **UROP Student**, Fall 2017, Spring 2018.
 Liam Fenlon, EECS Major, **UROP Student**, Spring 2018.
 Sarah Wang, EECS Major, **UROP Student**, Spring 2018.
 Nick O'Connell, EECS Major, **UROP Student**, Spring 2018.
 Julian Alverio, EECS Major, **UROP Student**, Spring 2017 and IAP 2018.
 Jeff Chow, EECS Major, **UROP Student**, Fall 2017.
 Stephanie Hu, EECS Major, **UROP Student**, Fall 2017.
 Sarah Caso, EECS Major, **UROP Student**, Summer 2017.
 Anne K. Kelley, EECS and Mathematics Major, **UROP Student**, Fall 2016-January 2017.
 Caroline Pench, EECS Major **UROP Student**, Fall 2016-Spring 2017.
 Rachel Burns, Mathematics Major **UROP Student**, Fall 2016-Spring 2017.
 Nahom Marie, Department of Brain and Cognitive Science, **UROP student**, Summer and Fall 2016.
 Ali Soylemezoglu, EECS, **UROP student**, 2014-2016.
 Xubo Sun, EECS, **UROP student**, 2014-2016 (also participated through our project at the **SuperUROP Program**)
 Jeremy Kalas, EECS, **UROP student**, 2014-2016.
 Han Ren, **visiting PhD student from UCL**, Fall 2017.
 Shaudi Hosseini, **UROP student**, 2005-2006.
 Host of Celine Gerard, visiting student MIT Belgium Alliance, Summer 2016.
 Host of Dr Feng Haolin, Lingnan (2013) University, Visiting MIT Sloan as part of the Sloan-China Initiative.
 Co-hosted Mr. Wang Wei, Visiting Scientist at Sloan from Fudan University, as part of the Sloan-China Initiative.
 Hosted Dr Sun Jing from Tchinghua University, as part of the Sloan-China Initiative.
 Hosted Dr. Daoli Zhu Visiting Scientist at Sloan from Fudan University, as part of the Sloan-China Initiative.
 Hosted Dr. Xiao Zhiguo, Visiting Scientist at Sloan from Fudan University, as part of the Sloan-China Initiative.
 Hosted Dr. Yang Zihui, Visiting Scientist at Sloan from Lingnan University, as part of the Sloan-China Initiative.
 Served as Faculty Advisor-Mentor to Laura Kang, Susan Martonosi and Margret Vilborg (PhD students, ORC).

PUBLICATIONS

Ph.D Thesis

“Geometric, interior point and classical methods for solving finite dimensional variational inequality problems” *Brown University*, 1993

Refereed Journal Articles (Published & Accepted)

- 1) A unifying geometric solution framework and complexity analysis for variational inequalities, (with T.L. Magnanti), *Mathematical Programming*, 71, 3, 327-352, 1995.
- 2) The orthogonality theorem and the strong-f-monotonicity condition for variational inequality algorithms, (with T.L. Magnanti), *SIAM Journal on Optimization*, 7, 1, 248-273, 1997.
- 3) Averaging schemes for variational inequalities and systems of equations, (with T.L. Magnanti), *Mathematics of Operations Research*, 22, 3, 568-587, 1997.
- 4) A new algebraic geometry integer programming algorithm, (with D. Bertsimas and S. Tayur), *Management Science*, 46, 7, 999-1008, 2000.
- 5) Applications of Fluid Modeling in Distribution Systems, (with S. Kachani), referred chapter in volume on *Innovations in Financial and Economic Networks*, 214-236, 2003.

- 6) Solving variational inequality and fixed point problems by line searches and potential optimization, (with T.L. Magnanti), *Mathematical Programming*, Volume 101, Number 3, 435 – 461, 2004.
- 7) The “Price of Anarchy” when Costs are Non-separable and Asymmetric, in Integer Programming and Combinatorial Optimization, *Lecture Series in Computer Science*, editors D. Bienstock and G. Nemhauser, pp. 46-58, 2004.
- 8) A robust SQP method for mathematical programs with linear complementarity constraints, (with S. Jie and X. Liu), *Journal of Computational Optimization and Applications*, Vol. 34, pp. 5-33, 2006.
- 9) Fluid Dynamics Models and their Applications in Transportation and Pricing, (with S. Kachani), *European Journal of Operations Research*, Vol. 170, No. 1, pp. 496-517, 2006.
- 10) Competitive Multi-period Pricing for Perishable Products: A Robust Optimization Approach, (with A. Sood), *Mathematical Programming*, Vol. 107, No 1-2, pp. 295-335, June 2006.
- 11) A Robust Optimization Approach to Dynamic Pricing and Inventory Control with no Backorders, (with E. Adida), *Mathematical Programming*, Vol. 107, No 1-2, pp. 97-129, June 2006.
- 12) An Analytical Model for Traffic Delays and the Dynamic User-Equilibrium Problem, (with G. Roels), *Operations Research*, Vol. 54, No. 6, pp. 1151-1171. November-December 2006.
- 13) The Price of Anarchy when Costs are Non-separable and Asymmetric, *Mathematics of Operations Research*, Vol. 32, pp. 614-628, 2007.
- 14) Solving Asymmetric Variational Inequalities via Convex Optimization (with M. Aghassi and D. Bertsimas), *Operations Research Letters*, Vol. 34, No. 5, pp. 481-490, September 2006.
- 15) The Price of Anarchy in Supply Chains; Quantifying the Efficiency of Price-Only Contracts (with G. Roels), *Management Science*, Vol. 53, No. 8, pp. 1249-1268. August 2007.
- 16) A Nonlinear Fluid Model of Dynamic Pricing and Inventory Control with no Backorders, (with E. Adida), *Naval Research Logistics*, Vol. 54, No. 7, pp. 767 - 795, September 2007.
- 17) Regret in the Newsvendor Problem with Partial Information (with G. Roels), *Operations Research*, Vol. 56, No. 1, pp. 188-203, January-February 2008. Also related extended abstract:
The “Price of Information”; Inventory Management with Limited Information about Demand, (with G. Roels), extended abstract appeared in *MSOM Journal (Manufacturing and Service Operations Management)*, Vol. 8, No. 1, pp. 98-117, Winter 2006.
- 18) Multi-period Models with Capacities in Competitive Supply Chain, (with M. Zaretsky), *POM Journal (Production and Operations Management Society Journal (POM))*, Vol. 17, No. 4, July - August 2008.
- 19) Profit Loss in Differentiated Oligopolies (with A. Farahat), *Operations Research Letters*, 37 (1), p.43-46, 2009.
- 20) Optimal Bidding in Online Auctions, (with D. Bertsimas and J. Hawkins), *Journal of Revenue Management and Pricing*, 2009.
- 21) A Dynamic Travel Time Models for Spillback, (with S. Kachani), *Networks and Spatial Economics*, 9 (4), 595-618, November 2009.
- 22) Robust Controls for Network Revenue Management, (with G. Roels), *MSOM*, vol 12, issue 1, 56-76, 2010.
- 23) Dynamic Pricing and Inventory Control with no Backorders; Uncertainty and Competition, (with E. Adida), *Operations Research*, vol 58, issue 2, 289-302, 2010.
- 24) Dynamic pricing and inventory control: robust vs. stochastic uncertainty models; a computational study, (with E. Adida), *Annals of Operations Research*, 181 (1), 125-157, December 2010.

- 25) A Nonnegative Extension of the Affine Demand Function and Equilibrium Analysis for Multiproduct Price Competition, (with A. Farahat), *Operations Research Letters*, vol 38, issue 4, 280-286, 2010.
- 26) A Comparison of Bertrand and Cournot Profits in Oligopolies with Differentiated Products, (with A. Farahat), *Operations Research*, vol 59, issue 2, pgs 507-513, 2011.
- 27) On the efficiency of price competition, (with A. Farahat), *Operations Research Letters*, vol 39, issue 6, pgs 414–418, 2011.
- 28) Generalized quantity competition for multiple products and loss of efficiency, (with J. Kluberg), *Operations Research*, vol 60, issue 2, 335-350, 2012.
- 29) Price of Anarchy in Supply Chains with Partial Positive Externalities, (with W. Sun), *Operations Research Letters*, vol 40, issue 2, 78-83, 2012.
- 30) Efficient Formulations for Constrained Pricing under Attraction Demand Models, accepted in *Mathematical Programming Series A*, (with P. Keller and R. Levi), vol 145, pgs 223-261, 2014.
- 31) Improving Emergency Storm Planning using Machine Learning, (with V. Farias, M. Monsch, A. Papush, and S. Whipple from MIT and M. Angalakudati, J. Calzada, J. Gonynor, N. Raad, J. Schein, C. Warren, J. Williams from Nationalgrid), *Proceedings of the 2014 IEEE PES Transmission & Distribution Conference & Exposition*, vol. 11, issue 4, Dec. 2013.
- 32) Business Analytics for Flexible Resource Allocation under Random Emergencies (with J. Calzada, M. Angulakati, S. Balwani, B. Chatterjee, N. Raad, J. Uichanco), *Management Science*, Special Issue on Business Analytics, vol 60, issue 6, Pages 1552-1573, 2014.
- 33) Efficiency Analysis of Cournot Competition in Service Industries with Congestion, (with W. Sun), *Management Science*, vol 60, issue 11, Pages 2684-2700, 2014.
- 34) The Effect of Supplier Capacity on the Supply Chain Profit, (with E. Adida), *Annals of Operations Research*, vol 223, pgs 1-52, 2014.
- 35) A continuous knapsack problem with separable convex utilities: Approximation algorithms and applications, (with R. Levi and G. Romero), *Operations Research Letters*, vol. 42, issue 5, pgs 367-373, 2014.
- 36) The Impact of a Target on Newsvendor Decisions, (with L.G. Chen and Z. Long), *M&SOM*, vol 17, issue 1, pgs 78 – 86, 2015.
- 37) The Data Driven Newsvendor Problem – New Bounds and Insights, (with R. Levi and J.A. Villaranda Uichanco), *Operations Research*, vol 23, issue 6, pgs 1294 – 1306, December 2015.
- 38) The Impact of Consumer Subsidies for Green Technology Adoption (with M. Cohen and R. Lobel), *Management Science*, vol. 62, No 5, pg. 1235-1258, May 2016.
- 39) Non-Linear Pricing Competition with Private Capacity Information (with H. Nazerzadeh), *Operations Research*, pg. 329 – 340, February 2016.
- 40) On the Effectiveness of Uniform Subsidies in Increasing Market Consumption, (with R. Levi and G. Romero), *Management Science*, vol. 63, pgs 40-57, 2017.
- 41) The Impact of Linear Optimization in Promotion Planning (with M. Cohen, Z. Leung, K. Panchamgam, A. Smith), *Operations Research*, vol. 65, issue 2, pgs 446-468, 2017.
- 42) Consumer Subsidies with a Strategic Supplier: Commitment vs. Flexibility, (with J. Chemama, M. Cohen, R. Lobel), *Management Science*, vol 65, issue 2, February 2019.
- 43) Scheduling Promotion Vehicles to Boost Revenues: A Provably-Good Analytical Approach (with L. Baardman, M. Cohen, K. Panchamgam, D. Segev), *Management Science*, vol 65, issue 1, January 2019.
- 44) The MIT Leaders for Global Operations Program (with D. Rosenfield), *Informs Journal on Applied Analytics*, vol 48, issue 3, Spring 2018.
- 45) Dynamic Pricing through Sampling based Optimization, (with M. Cohen, R. Lobel), vol 27, issue 6, *POM*, pgs 1074-1088, June 2018.
- 46) Worst Case Performance Guarantee for Uniform Co-payments; (with R. Levi and G. Romero), *Operations Research*, vol. 67, issue 2, Spring 2019.
- 47) A Data-Driven Approach to Personalized Bundle Pricing and Recommendation (with A. Papush and P. Harsha), *M&SOM*, vol 22, issue 3, Published Online:19 July 2019.

- 48) Detecting customer influence for targeted optimized promotions (with L. Baardman, S. Borjian, T. Cohen, K. Panchamgam), appeared in *M&SOM*, 2023.
- 49) Data Analytics in Operations Management: A Review (with V. Mistic), *M&SOM*, vol 22, issue 1, Jan-Feb. 2020.
- 50) An Efficient Algorithm for Dynamic Pricing Using a Graphical Representation, (with M. Cohen, S. Gupta, J. Kalas), *POM*, Appeared May 2020.
- 51) Optimal Contract Design for Joint ventures in the Healthcare Industry (with S. Cong, R. Levi and W. Sun), *POM*, Fall 2020.
- 52) Frontiers in Service Science: The Management of Data Analytics Services: New Challenges and Future Directions (with F. de Vericourt). *Service Science*, Vol 12 (4), 2021.
- 53) A Simple Rule for Pricing with Limited Knowledge of Demand (with C. Cohen and R. Pindyck), *Management Science*, Vol 67 (3), pgs 1329-1992, 2021.
- 54) Optimizing Promotions for Multiple Items in Supermarkets, (with M. Cohen, J. Kalas), *Management Science*, Vol 67 (4), pgs 1993-2656, 2021.
A shorter version also appeared in *Proceedings of the 2016 ACM Conference on Economics and Computation*.
- 55) Public Health Risks Arising from Food Supply Chains: Challenges and Opportunities, (with L. Chen, D. Guttieres, R. Levi, E. Paulson, N. Renegar and S. Springs), *Naval Research Logistics*, Vol 68 (8), pgs 1098-1112, 2021.
- 56) A Granular View of Emergency Department Length of Stay: Improving Predictive Power and Extracting Actionable Insights, (with M. Canellas, D. Pachamanova, O. Skali Lami, A. Tsiourvas) Vol 78 (4), S69, 2021.
- 57) Using Business Analytics to Upgrade Sales Promotions (with L. Baardman, M. Cohen, K. Panchamgam). *Management and Business Review* (MBR), Vol 1 (3), 54-63, 2021.
- 58) Distribution-Free Pricing, (with M. Hu and H. Chen), *M&SOM*, 24 (4), 1939-1958, 2022.
- 59) On a Variation of Two-part Tariff Pricing of Services; a Data Driven Approach, (with C. Thraves), appeared online in *M&SOM*, February 2022.
- 60) Consumer Surplus under Demand Uncertainty, (with C. Thraves and M. Cohen), *POM Vol 31 (2)*, pgs 478-494, 2022.
- 61) Learning Personalized Product Recommendations with Customer Disengagement, (with H. Bastani, P. Harsha and D. Singhvi), *M&SOM*, Vol 24 (4), 2010-2028, 2022.
- 62) Evaluation of individual and ensemble probabilistic forecasts of COVID-19 mortality in the United States, (with E. Cramer et al) *PNAS*, Vol 119 (No 15), April 2022.
- 63) A Brief History of the Internet and the World Wide Web. *Management and Business Review*, (with S. Kumar), Vol 2(1), 67-72, 2022.
- 64) Disparities in Emergency Department Wait Times for Female, Transgender Female, Black and Non-English-Speaking Patients (with M. Canellas, D. Pachamanova, O. Skali-Lami, A. Tsiourvas). *Annals of Emergency Medicine*, 80 (4), S39, Fall 2022.
- 65) High-Low Promotion Policies for Peak-End Demand Models, (with T. Cohen-Hillel and K. Panchamgam), *Management Science*, 69 (4), 2016-2050, 2023.
- 66) Constrained optimization of objective functions determined from random forests, (with M. Biggs and R. Hariss), *POM*, 32 (2), 397-415, 2023.
- 67) Pricing for Heterogeneous Products: Analytics of Ticket Reselling, (with M. Alley, M. Biggs, R. Hariss, C. Hermann, M. Li), *M&SOM*, 25 (2), 409-426, 2023, (finalist 3rd M&SOM Practiced Based Research Competition).
- 68) Care coordination for healthcare referrals under a shared-savings program, (with F. Bravo, R. Levi and G. Romero), *POM*, 32 (1), 180-206, 2023.
- 69) End-to-End Learning for Decision Optimization via Constraint-Enforcing Approximators for Linear Programs with Applications to Supply Chains (with R. Cristian, P. Harsha, B. Quanz and I. Spantidakis), appeared in *AAAI Refereed Conference in Artificial Intelligence Proceedings*, 37 (6), 7253-7260, 2023, (journal version also submitted for publication in *Management Science received Revise and Resubmit*).

- 70) The role of optimization in some recent advances in data-driven decision-making (with L Baardman, R Cristian, G Perakis, D Singhvi, O Skali Lami, L. Thayaparan) *Mathematical Programming* 200 (1), 1-35, 2023.
- 71) COVID-19: A Multipeak SIR Based Model: Learning Waves and Optimizing Interventions (with D. Singhvi, O. Skali Lami and L. Thayaparan), *POM*, 32 (5), 1471-1489, 2023.
- 72) COVID-19: Prediction, Prevalence and the Operations of Vaccine Allocation, (with A. Bennouna, J. Joseph, D. Nze Ndong, D. Singhvi, O. Skali Lami, I. Spantidakis, L. Thayaparan, A. Tsiourvas) *M&SOM*, 25 (3), 1013-1032, 2023. (Extended abstract appeared in the ICSS proceedings, August 2021).
- 73) Robust Pricing and Production with Information Partitioning and Adaptation, (with M. Sim, Q. Tang and P. Xiong), *Management Science*, 69 (3), 1398-1419, 2023.
- 74) Ancillary Services in Targeted Advertising: from Prediction to Prescription, (with A. Borenstein, A. Mangal, S. Poninghaus, D. Singhvi, O. Skali Lami, J.L. Wei), *M&SOM*, Published online at *M&SOM*, 2023 (finalist 4rth M&SOM Practiced Based Research Competition).
- 75) Dynamic Pricing with Unknown Non-Parametric Demand and Limited Price Changes, (with D. Singhvi), Accepted in *Operations Research*, 2023.

REFEREED BOOK CHAPTERS

- 76) Computing fixed points by averaging, (with T.L. Magnanti), "*Transportation and Network Analysis – Current Trends*". Refereed Chapter, editors P. Marcotte, M. Gendreau, Chapter 12, 181-198, 2001.
- 77) Dynamic Pricing; A Learning Approach, (with D. Bertsimas). Refereed Chapter in *Mathematical and Computational Models for Congestion Charging*, (editors D. Hearn and S. Lawphongpanich), Vol. 101, pp. 45-79, Book Series: Applied Optimization, Springer, June 2006.
- 78) Modeling the Transient Nature of Dynamic Pricing with Demand Learning in a Competitive Environment, (with C. Simon and S. Kachani). Refereed Chapter in *Network Science, Nonlinear Science and Infrastructure Science*, Chapter 11, pp. 223-267, (editor Terry Friesz), part of International Series in Operations Research and Management Science, Advancing the State of the Art, Springer, 2007.
- 79) Promotion Optimization in Retail (with M. Cohen). Refereed Chapter in edited book *Channel Strategies and Marketing Mix in a Connected World*, editors Saibal Ray, Shuya Yin, Springer, Appeared Jan. 2020.
- 80) The Promotion Planning Optimization Problem with Bounded Memory Demand Models, (with T. Cohen-Hillel). Refereed Chapter in the *Precision Retailing Book*, editor M. Cohen, Appeared Fall 2021.

SUBMITTED PAPERS (Currently Under Review)

- 81) A Granular View of Emergency Department Length of Stay: Improving Predictive Power and Extracting Real-Time, Actionable Insights (with M. Canellas, D. Pachamanova, A. Tsiourvas and O. Skali Lami), (Revised and Resubmitted), *Annals of Emergency Medicine*, (initial submission Fall 2022).
- 82) A Granular Approach to Optimal and Fair Patient Placement in Hospital Emergency Departments, with M. Canellas, D. Pachamanova, O. Skali Lami, A. Tsiourvas). *POM*, (Minor Revision), (initial submission Fall 2022).
- 83) Learning the Minimal Representation of a Dynamic System from Transition Data, (with A. Bennouna, D. Pachamanova, and O. Skali Lami), *Management Science*, (Minor Revision), (initial submission Winter 2022).
- 84) Bounded Memory Peak-end demand models can be surprisingly good, (with T. Cohen-Hillel and K. Panchamgam), submitted to *Operations Research*, (Major Revision), Spring 2024 (initial submission Spring 2023).
- 85) Optimal interventions for increasing healthy food consumption among low-income populations (with R. Levi and E. Paulson), *Management Science*, (Major Revision), (initial submission Summer 2020).

- 86) End-to-End Learning for Decision Optimization via Constraint-Enforcing Approximators (with R. Cristian, P. Harsha and B. Quanz). *Management Science*, (Revise and Resubmit), (initial submission December 2022).
- 87) Optimizing Objective Functions from Trained Neural Networks, (with A. Tsiourvas), submitted to *Management Science*, (Revise and Resubmit), Spring 2023.
- 88) Impact of Social Learning on Consumer Subsidies and Supplier Capacity for Green Technology Adoption (with Tingliang Chen and Hang Ren), submitted to *Management Science*, (Revise and Resubmit), Spring 2023.
- 89) UMOTEM: Upper Bounding Method for Optimizing Over Tree Ensemble Models (with S. Bourjeni, K. Panchangam, R. Schubertrugmer, L. Thayaparan). *Management Science*, (Revise and Resubmit), (initial submission December 2022).
- 90) Markdown Pricing with Quality Perception and Consumer Optimism: From Experiment to Theory, (with R. Hariss, W. Sinchaisri, Y. Zheng), (2nd round, Major Revision), *M&SOM*, (initial submission Spring 2019).
- 91) Tightness of prescriptive tree-based mixed integer optimization formulations, (with M. Biggs), submitted to *Mathematical Programming*, Fall 2023.
- 92) Fresh fruit and vegetable consumption: The Impact of Access and Value, (with R. Levi and E. Paulson), submitted to *POM*, (initial submission Spring 2022).
- 93) Leveraging Comparables for New Product Sales Forecasting (with L. Baardman, I. Levin and D. Singhvi), *Management Science*, (Revise and Resubmit), initial submission Spring 2020. (Extended abstract appeared in *POM*, 27(12), pgs 2339-2349, 2018).
- 94) Bounded Rationality in Strategic Interactions in a Supply Chain (with B. Kalkanci) (Revise and Resubmit), *POM*, (initial submission Fall 2022).
- 95) Learning Optimal Online Advertising Portfolios with Periodic Budgets, (with L. Baardman, E. Fata and A. Pani), *Operations Research*, (Revise and Resubmit), initial submission Spring 2019.
- 96) Reverse information sharing: Reducing costs in supply chains with yield uncertainty, (with Harsha, Jagmohan, Levi, Paulson, Perakis), *Management Science*, (Revise and Resubmit), (initial submission Fall 2020).
- 97) Learning Optimal Online Advertising Portfolios with Periodic Budgets, (with L. Baardman, E. Fata and A. Pani), *Operations Research*, (Revise and Resubmit), initial submission Spring 2019.

PAPERS CLOSE TO SUBMISSION

- 1) Reducing Food Waste through a Reservation System, (with E. Zhang and R. Levi), to be submitted to *Management Science*, Summer 2024.
- 2) A Discretization Framework for Robust Contextual Stochastic Optimization (with R. Cristian), to be submitted to *Operations Research* Spring 2024.
- 3) The Product Replacement Problem in Fast Fashion: Addressing Manager Behavior and Demand Uncertainty (with M. Moran Pelaez and T. Cohen-Hillel), to be submitted to *Management Science*, Spring 2024.
- 4) Interpretable Framework for Optimal Sepsis Treatment with Limited Resources (with A. Lin, L. Li, D. Pachamanova), to be submitted to *Management Science*, Spring 2024.
- 5) XS-Trees: A Tree Sampling Framework for Interpretable Tree Ensembles, (with D. Singhvi and O. Skali-Lami), to be submitted to *Journal of Machine Learning*, Spring 2024.
- 6) SAFE - Supervised Approach for Feature Engineering (with T. Cohen-Hillel, J. Spantidakis and L. Thayaparan), to be submitted to *Journal of Machine Learning*, Summer 2024.
- 7) Robust Methods for Hierarchical Time Series Forecasting in Operations (with PY Chen, A Mertzios, W Sun, A Tsiourvas, Y Zhu), to be submitted to *Operations Research*, Fall 2024.

OTHER WORKING PAPERS

- 1) A Decomposition Approach for Constrained Inventory Replenishment (with D. Singhvi and I. Spantidakis), in progress.

- 2) Dynamic Creative Optimization in Online Display Advertising, (with L. Beardman, E. Fata and A. Pani).
- 3) Sparse Solutions for the Unbounded Minimum Knapsack Problem with Procurement Applications, with R. Levi and G. Romero).
- 4) Robust Newsvendor Facing Mixed Demand, (with D. Chen and R. Levi).
- 5) Analytics-Driven Inspection Operations for Infrastructure Resilience, (with Saurabh Amin and Mathieu Dahan).
- 6) Competition and Externalities in Green Technology Adoption, (with M. Cohen and C. Thraves).
- 7) Submodular Batch Scheduling (with D. Chen and R. Levi).
- 8) Markdown Pricing for a Fashion e-Tailer; the Impact of Returning Customers, (with Z. Leung and P. Harsha).
- 9) Price Incentives for Online Retailers Using SocialMedia, (with M. Baghaie, M. Cohen, L. Rizzo and X. Sun).
- 10) First delivery gaps: A supply chain lever to reduce product returns in online retail (with M. Chaurasia, S. Pandey, H. D. Singhvi, H. Singh Rathore),
- 11) A Ranking Algorithm for Tramp Shipping in the Spot Market (with M. Biggs).
- 12) The Role of Vendor Funds in Promotion Planning, (with L. Beardman, K. Panchamgam).

PATENTS (FILED & ISSUED)

US Patent App. 14/030,287 - "Promotion Optimization Problem" invention disclosure filed September 2013 (M. Cohen, Z. Leung, K. Panchamgam and G. Perakis)

US Patent App. 14/942,225 - "Computerized Promotion Price Scheduling Utilizing Multiple Product Demand", invention disclosure filed Fall 2015 (M. Cohen, J. Kalas, K. Panchamgam and G. Perakis)

US Patent App. 15/080,759 - "Personalized Bundle Recommendation System and Method" invention disclosure submitted January 2016 (M. Ettl, A. Hampapur, P. Harsha, A. Papush and G. Perakis)

ORA170518-US-NP (O-441) - "Computer System and Method to Predict Customer Behavior Based on Inter-Customer Influences and to Control Distribution of Electronic Messages" disclosure submitted Summer 2017 (L. Beardman, S. Bourjani, T. Cohen, K. Panchamgam, G. Perakis)

US 20230096633 A1 "Optimized Tree Ensemble based Demand Model", Filed Fall 2021, (S. Bourjani, T. K. Panchamgam, G. Perakis, L. Thayaparan)

CASE DEVELOPMENT

"Eurotel 3G Case": Case developed for the Course Data Models and Decisions 15.060, with R. Freund and M. Shay. This is a case on the application of Regression Analysis to auctions.

"Money Tree Mortgage: Alternative Funding Evaluation Under Distress": Case developed and Taught in the Core MBA Course Data Models and Decisions 15.060 with Martins Blums (MBA 2010). This is a case applying all the tools we teach in the course, Regression, Simulation, Optimization and Decision Tree Analysis for the recent Credit Crisis in the Mortgage Industry.

"Hellas online; the IPTV Challenge", Case developed for the Core MBA Course Data Models and Decisions 15.060 with MBA former student Nikos Andrikogiannopoulos (MBA 2011). This case applies some of the tools we teach in the course, namely regression and nonlinear optimization to determine the new customers to target for IPTV for the Greek Company Hellas online. This case is based on a real setting in the company.

Case on "ALSTOM": Case developed for the Core MBA and EMBA Courses: Data Models and Decisions 15.060 with MBA student Mayank Kapoor (MBA 2012). This case applies optimization tools to optimize some of the operations at ALSTOM.

Case on “Nemo storm”: Case developed for the Core MBA and EMBA Courses: Data Models and Decisions 15.060 with MBA student Tal Izkovitz (MBA 2013), Diane Rucker (EMBA 2014), Jonathan Lehigh (Former Director of EMBA program). This case introduces decision analysis/trees tools in order to determine the right course of action for the school regarding classes before the Nemo storm. Used in class for EMBA Spring 2014 and Spring 2015.

Case on the “Analytics of Promotion Planning”: (Title: Case Study: Optimizing Promotions for Supermarkets using Data Analytics). This is a case I developed with my former PhD student Maxime Cohen based on our research on Promotions. The case is geared for Analytics offerings. I used it when I teach lectures in the two new courses in Analytics offered by the Operations Management Group as well as in DMD. My colleagues at MIT use it in DMD but also other colleagues around the country.

REFEREED PROCEEDINGS ARTICLES

- 1) Travel Times in Dynamic Transportation Networks; A Fluid Dynamics Approach, (with S. Kachani), Proceedings for TRISTAN IV, 335-340, 2001.
- 2) Second Order Fluid Dynamics Models for Travel Times in Dynamic Transportation Networks, (with S. Kachani), Proceedings of IEEE on Intelligent Transportation Systems, 251-256, August 2001.
- 3) A Fluid Model of Dynamic Pricing and Inventory Control for Distribution Systems, (with S. Kachani), Proceedings of Conference on Pricing Research, Cornell University, September 2002.
- 4) A Fluid Model for the Anticipatory Route Guidance Problem, (with J. Bottom and S. Kachani), Proceedings of 10th IFAC Symposium on Control in Transportation Systems, 145-150, August 2003.
- 5) User Equilibrium versus System Optimum in Transportation when Costs are Non-separable and Asymmetric, in refereed Proceedings for TRISTAN V, 2004.
- 6) Leveraging Traffic Flow Modeling and Game Theory for Pricing and Logistical Systems, (with S. Kachani), in refereed Proceedings for TRISTAN V, 2004.
- 7) An Analytical Model for Traffic Delays, (with G. Roels), in refereed Proceedings for TRISTAN V, 2004.
- 8) The Price of Anarchy in Supply Chains: Quantifying the Efficiency of Price-Only Contracts, (with G. Roels), Refereed Proceedings for the MSOM conference, June 2006.
- 9) The Anticipatory Route Guidance Problem: Formulations, Analysis and Computational Results (with J. Bottom and S. Kachani), in refereed Proceedings for TRISTAN VI, 2007.
- 10) Profit and Efficiency Loss Due to Price Competition in Markets with Differentiated Products, (with A. Farahat), in refereed Proceedings for MSOM, 2007.
- 11) Generalized Cournot competition for multiple products and Price of Anarchy, (with J. Kluberg), in refereed Proceedings for the MSOM Conference, Maryland, 2008.
- 12) A Comparison of Price and Quantity Competition in Oligopolies with Differentiated Products, (with A. Farahat), in refereed Proceedings for the MSOM Conference, Maryland, 2008.
- 13) Generalized Cournot competition for multiple products and Price of Anarchy, (with J. Kluberg), in Proceedings for the Forty-Sixth Annual Allerton Conference on Communication, Control, and Computing, September 30 – October 2, 2008 Allerton Retreat Center, Monticello, Illinois 2008.
- 14) A Pricing Contract to Reduce Congestion and Improve Efficiency in Airports (with W. Sun), MSOM Conference Refereed Proceedings, June 2009.
- 15) Network Dynamic Pricing through Scenario Based Optimization, (with R. Lobel), MSOM Conference Refereed Proceedings, June 2009.
- 16) Loss of welfare in deregulated markets: an oligopolistic Cournot competition model, (with J. Kluberg), MSOM Conference Refereed Proceedings, June 2009.
- 17) Congestion Pricing for Airport Efficiency, (with W. Sun), Conference Refereed Proceedings TRISTAN VII, June 2010.

- 18) The Data-Driven Newsvendor Problem: New Bounds and Insights, (with R. Levi and J. Uichanco), MSOM Conference Refereed Proceedings, Israel. June 2010.
- 19) Loss of Coordination in a Competitive Supply Chain with Endogenous Pricing, (with W. Sun), MSOM Conference Refereed Proceedings, Israel. June 2010.
- 20) Consumer Choice Model for Forecasting Demand and Designing Subsidies for Solar Technology, (with R. Lobel), MSOM Conference Refereed Proceedings, Israel. June 2010.
- 21) Tractable markdown optimization under uncertainty, (with P. Harsha), MSOM Conference Refereed Proceedings, Israel. June 2010.
- 22) Efficient Formulations for Constrained Pricing under Attraction Demand Models (with P. Keller and R. Levi), MSOM Conference Refereed Proceedings, Israel. June 2010.
- 23) Menu Pricing Competition and a Common Agency with Informed Principals (with H. Nazerzadeh), Proceedings 12th ACM Conference on Electronic Commerce (EC-2011), San Jose, CA, 371-372, June 2011.
- 24) Menu Pricing Competition when Suppliers' Capacities are Private Information (with H. Nazerzadeh), MSOM Conference Refereed Proceedings, Michigan, June 2011.
- 25) Dynamic Pricing and Equilibrium Outcomes, (with V. Farias and M. Monsch), MSOM Conference Refereed Proceedings, Michigan, June 2011.
- 26) Consumer Rebates for Solar Technology Adoption (with M. Cohen and R. Lobel), MSOM Conference Refereed Proceedings, Michigan, June 2011.
- 27) Markdown Pricing for a Fashion e-Tailer; the Impact of Returning Customers, (with Z. Leung and P. Harsha), MSOM Conference Refereed Proceedings, Michigan, June 2011.
- 28) First-order Spread Information for Minimax Regret Inventory Problems, (with R. Levi and J. Uichanco), MSOM Conference Refereed Proceedings, Michigan, June 2011.
- 29) Congestion Pricing for Service Industries, (with W. Sun), MSOM Conference Refereed Proceedings, Michigan, June 2011.
- 30) Designing Consumer Subsidies with Industry Response for Green Technology Adoption (with M. Cohen and R. Lobel), MSOM Conference Refereed Proceedings, NYC, June 2012.
- 31) Allocating Subsidies to Minimize a Commodity's Market Price A Network Design Approach (with G. Romero and R. Levi), MSOM Conference Refereed Proceedings, NYC, June 2012.
- 32) Efficiency analysis for service industries with nonlinear demand and congestion effects (with W. Sun), MSOM Conference Refereed Proceedings, NYC, June 2012.
- 33) Efficiency of joint-ventures in the healthcare industry, (with R. Levi, C. Shi and W. Sun), MSOM Conference Refereed Proceedings, NYC, June 2012.
- 34) Efficient scheduling of operations under uncertainty: the case of a US gas utility company, (with M. Angalakudati, S. Balwani, J. Calzada, B. Chatterjee, J. Uichanco, N. Raad), MSOM Conference Refereed Proceedings, NYC, June 2012.
- 35) Designing Subsidies with Industry Response Dynamics; Commitment vs Flexibility (with M. Cohen and R. Lobel), MSOM Conference Refereed Proceedings, NYC, June 2012.
- 36) The Impact of Optimization on Promotion Planning, Revenue Management, (with M. Cohen, Z. Leung, K. Panchamgam, A. Smith), MSOM Conference Refereed Proceedings, INSEAD France, July 2013.
- 37) Designing Subsidies with Industry Response: Commitment vs Flexibility, (with M. Cohen, J. Chemama, R. Lobel), MSOM Conference Refereed Proceedings, INSEAD France, July 2013.
- 38) The Effectiveness of Uniform Subsidies to Incentivize Demand, (with G. Romero and R. Levi), MSOM Conference Refereed Proceedings, INSEAD France, July 2013.
- 39) Bounded Rationality in Strategic Interactions (with B. Kalkanci), MSOM Conference Refereed Proceedings, INSEAD France, July 2013.
- 40) Business analytics for flexible scheduling of service operations under random emergencies, (with M. Angalakudati, S. Balwani, J. Calzada, B. Chatterjee, J. Uichanco, N. Raad), MSOM Conference Refereed Proceedings, INSEAD France, July 2013.

- 41) Promotion Optimization for Supermarkets, (with M. Cohen, Z. Leung, K. Panchamgam, A. Smith), Refereed Proceedings of Workshop at LBS on Collaborative Academic/Practitioner Workshop, July 2013.
- 42) Competition and Externalities in Green Technology Adoption, (with M. Cohen, C. Thraves), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 43) Pricing Contracts between Healthcare Systems, (with F. Bravo, R. Levi and G. Romero), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 44) Improving Emergency Storm Planning using Machine Learning, (with V. Farias, M. Monsch, A. Papush, and S. Whipple from MIT and M. Angalakudati, J. Calzada, J. Gonynor, N. Raad, J. Schein, C. Warren, J. Williams from Nationalgrid), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 45) Optimizing Purchasing and Handling Costs for Supply Chain Procurement, (with B. Genser, R. Levi and G. Romero), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 46) On the Effectiveness of Uniform Subsidies in Increasing Market Consumption, (with R. Levi and G. Romero), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 47) “Designing Subsidies with Industry Response Dynamics: Commitment vs. Flexibility”, (with J. Chemama, M. Cohen, R. Lobel), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 48) “Optimization models and insights for promotion planning” (with M. Cohen, K. Panchamgam, A. Smith), MSOM Conference Refereed Proceedings, Seattle, June 2014.
- 49) Competition and Externalities in Green Technology Adoption, (with M. Cohen, C. Thraves), SIG Conference Refereed Proceedings, Toronto, June 2015.
- 50) On the Worst-Case Performance of Uniform Subsidies in Market Consumption, (with R. Levi and G. Romero), MSOM Conference Refereed Proceedings, Toronto, June 2015.
- 51) When Graph Theory Meets Dynamic Pricing, (with M. Cohen, S. Gupta, J. Kalas), MSOM Conference Refereed Proceedings, Toronto, June 2015.
- 52) Pricing with Limited Knowledge of Demand (with M. Cohen and R. Pindyck), MSOM Conference Refereed Proceedings, Toronto, June 2015.
- 53) Markdown Management and Quality Perception: Theory and Experiment (with R. Hariss, W. Sinchaisri, K. Zheng), MSOM Conference Refereed Proceedings, Toronto, June 2015.
- 54) A Data-Driven Approach to Personalized Bundle Recommendations (with P. Harsha and A. Papush), MSOM Conference Refereed Proceedings, Toronto, June 2015.
- 55) Dynamic ship routing under limited foresight, (with M. Biggs), in refereed Proceedings for TRISTAN 2016.
- 56) Dynamic ship routing under limited foresight, (with M. Biggs), MSOM Conference Refereed Proceedings, New Zealand, June 2016.
- 57) On a Variation of Two-part Tariff Pricing of Services; a Data Driven Approach (with C. Thraves), MSOM Conference Refereed Proceedings, New Zealand, June 2016.
- 58) Scheduling Promotion Vehicles to Boost Revenues: A Provably-Good Analytical Approach (with L. Baardman, M. Cohen, K. Panchamgam, D. Segev), MSOM Conference Refereed Proceedings, New Zealand, June 2016.
- 59) Pricing with Limited Knowledge of Demand (with M. Cohen and R. Pindyck), Proceedings ACM Conference on Electronic Commerce (EC-2016), July 2016.
- 60) Pass-through constrained funds for promotion planning (with L. Baardman and K. Panchamgam), MSOM conference Refereed Proceedings, UNC, North Carolina, June 2017.
- 61) Less can be more in price experimentation, (with D. Singhvi), MSOM conference Refereed Proceedings, UNC, North Carolina, June 2017.
- 62) Leveraging Comparables for New Product Sales Forecasting, (with L. Baardman and D. Singhvi), MSOM conference Refereed Proceedings, UNC, North Carolina, June 2017.
- 63) Markdown Pricing with Quality Perception and Consumer Optimism: From Experiment to Theory, (with R. Hariss, W. Sinchaisri and Y. Zheng), MSOM conference Refereed Proceedings, UNC, North Carolina, June 2017.

- 64) Detecting customer to customer trends to optimize targeted promotions, (with L. Baardman, S. Borjani, T. Cohen and K. Panchamgam), MSOM conference Refereed Proceedings, UNC, North Carolina, June 2017.
- 65) A Discretization Framework for Robust Contextual Stochastic Optimization (with R. Cristian), under review at *ICLR*, results expected January 2024.

NON-REFEREED PROCEEDINGS

- 1) Solving Fixed Point and Variational Inequality Problems: Complexity, Convergence Conditions, and Averaging Methods, (with T.L. Magnanti), Proceedings of the 1995 NSF Design and Manufacturing Grantees Conference.
- 2) Averaging with well-behaved maps for finding fixed points, (with M. Epelman and T.L. Magnanti), Proceedings of the 1998 NSF Design and Manufacturing Grantees Conference.
- 3) From Frank-Wolfe to Steepest Descent; A descent framework for solving asymmetric variational inequalities, (with T.L. Magnanti), Proceedings of the 1999 NSF Design and Manufacturing Grantees Conference.
- 4) Second-Order Fluid Dynamic Models for Travel Times in Dynamic Transportation Networks, (with S. Kachani), Proceedings of the 1st Annual Symposium of the Singapore MIT Alliance Program, January 2001.
- 5) Dynamic Pricing in a Competitive Environment, (with A. Sood), Proceedings of the 2nd Annual Symposium of the Singapore MIT Alliance Program, January 2002.
- 6) Optimal Bidding in On-line Auctions, Proceedings of the 2nd Annual Symposium of the Singapore MIT Alliance Program, (with D. Bertsimas and J. Hawkins), January 2002.
- 7) A Simulation Approach for Determining Path Travel Times in Dynamic Transportation Networks, Proceedings of the 2nd Annual Symposium of the Singapore MIT Alliance Program, (with B.C. Khoo G. Lin and J. Paire) January 2002.
- 8) Dynamic Phenomena in Transportation and Related Systems, Proceedings of the 2002 NSF Design and Manufacturing Grantees Conference.
- 9) Fluid Dynamics Models for Traffic and Pricing, Proceedings of the 3rd Annual Symposium of the Singapore, MIT Alliance Program, (with S. Kachani) January 2003.
- 10) Competitive Multi-period Pricing with Fixed Inventories, Proceedings of the 4th Annual Symposium of the Singapore, MIT Alliance Program, (with A. Sood) January 2004.
- 11) Alleviating Travel Delay Uncertainties in Traffic Assignment and Traffic Equilibrium, Proceedings of the 2009 NSF Design and Manufacturing Grantees Conference, Hawaii, 2009.
- 12) Price of Anarchy and Its Applications, Proceedings of the 2009 NSF Design and Manufacturing Grantees Conference, Hawaii, 2009.
- 13) Price of Anarchy and its Applications, Proceedings of the 2011 NSF Design and Manufacturing Grantees Conference, Atlanta, 2011.
- 14) Alleviating Travel Delay Uncertainties in Traffic Assignment and Traffic Equilibrium, Proceedings of the 2011 NSF Design and Manufacturing Grantees Conference, Atlanta 2011.
- 15) Alleviating Travel Delay Uncertainties in Traffic Assignment and Traffic Equilibrium, Proceedings of the 2012 NSF Design and Manufacturing Grantees Conference, Boston 2012.

REPORTS

- 1) On the convergence of classical variational inequality algorithms, (with T.L. Magnanti), Technical Report, Operations Research Center, MIT, 1995.
- 2) A review of dynamic traffic assignment problems and connections to air transportation (with A. Odoni), Report for EEC, 1996.
- 3) Finding fixed points by averaging with well-behaved maps, (with M. Epelman and T.L. Magnanti), Technical Report, Operations Research Center, MIT, 1997.
- 4) Dynamic traffic flow network problems; a hydrodynamic theory approach, Technical Report, Operations Research Center, MIT, 1997.

- 5) On the efficient solution of variational inequalities; complexity and computational efficiency, (with M. Zaretsky), Technical Report, Operations Research Center, MIT 2002.
- 6) Competitive Multi-period Pricing for Perishable Products, (with A. Sood) Technical Report, Operations Research Center, 2003.
- 7) Consumer Choice Model for Forecasting Demand and Designing Subsidies for Solar Technology, (with R. Lobel), 2010.
- 8) Impact of Distributed Generation of Solar Photovoltaic (PV) Generation on the Massachusetts Transmission System, (Part I and Part II) (with Janny Dong, Per-Anders Lof, John W. Martin, Georgia Perakis, Ludovica Rizzo and Arvind Simhadri), 2016.

INVITED ORAL PRESENTATIONS

2010

- 1) Queen's Business School, Kingston, Ontario Canada, January 2010.
- 2) Chicago Booth Business School OM Seminar, University of Chicago, Spring 2010.
- 3) Ross School of Business OM Seminar, University of Michigan, Spring 2010.
- 4) Transportation@MIT Seminar Series, April 2010.
- 5) Behavioral and Quantitative Game Theory Conference, Newport Beach, California, May 2010.
- 6) "Mostly OM" Workshop, Tsinghua University, Beijing, China, May 2010.
- 7) *TRISTAN VII* Conference, Norway, June 2010.
- 8) Five presentations on papers I co-authored in the MSOM Conference, Israel. June 2010.
- 9) Five presentations on papers I co-authored in the INFORMS Annual Pricing and Revenue Management Conference, Ithaca Cornell, June 2010.
- 10) INFORMS Annual Pricing and Revenue Management Conference, Ithaca Cornell, June 2010.
- 11) UT Dallas Business School, Dallas, September 2010.
- 12) Joint DRO and IEOR Seminar Series at Columbia University, New York, October 2010.
- 13) Six presentations on papers I co-authored in the INFORMS Annual Conference, Austin Texas, November 2010.
- 14) UCLA Workshop IV: Robust Optimization, November 16, 2010.
- 15) Oracle Retail, November 2010.

2011

- 16) Texas A&M University, Invited Seminar Speaker, Spring 2011.
- 17) University of Irvine, Invited Seminar Speaker, Spring 2011.
- 18) University of Amherst, Spring 2011.
- 19) *12th ACM Conference on Electronic Commerce (EC-2011)*, San Jose, CA, June 2011.
- 20) Six presentations on papers I co-authored in the *MSOM Conference* Michigan, June 2011.
- 21) Four presentations on papers I co-authored in the Annual Conference of the *Inform's Section on Pricing and Revenue Management*, Columbia University, NYC, June 2011.
- 22) Thirteen presentations on papers I co-authored in the *Annual Inform's Conference* North Carolina, November 2011.

2012

- 23) Six presentations on papers I co-authored in the MSOM Conference, Columbia University, NYC, June 2012.
- 24) Conference, TU Berlin, Berlin, Germany, August 2012.
- 25) 21st International Symposium on Mathematical Programming (ISMP) Conference, TU Berlin, Berlin, Germany, August 2012.
- 26) 21st International Symposium on Mathematical Programming (ISMP) Conference, TU Berlin, Berlin, Germany, August 2012.
- 27) 21st International Symposium on Mathematical Programming (ISMP) Conference, TU Berlin, Berlin, Germany, August 2012.

- 28) Ten presentations on papers I co-authored in the Annual INFORMS Conference, Arizona, October 2012.
- 29) First MIT 'Building Networked Collaborations' conference, October 2012.
- 30) Seminar at NYU Stern, October 2012.
- 31) Seminar at BAMS group at Watson IBM Research, T. J. Watson NY, November 2012.
- 32) 2nd Workshop on Optimization: Computation, Theory and Modeling, December 2012.
- 33) Seminar at SUTD in Singapore, December 2012.

2013

- 34) MITEI Operating Committee, March 2013
- 35) MITEI Advisory Board, October 2013.
- 36) Workshop at LBS on Collaborative Academic/Practitioner Workshop, July 2013.
- 37) Two presentations on papers I co-authored in the Annual Conference of the *Informs Section on Pricing and Revenue Management*, GTech, Atlanta, June 2013.
- 38) Four presentations on papers I co-authored in the *MSOM Conference* and INSEAD France, July 2013.
- 39) Invited Lecturer at a Summer School at Zinal Switzerland, September 2013.
- 40) Eleven presentations on papers I co-authored in the Annual INFORMS Conference, Minneapolis, MN, October 2013.

2014

- 41) Seminar at University of Southern California, 2014.
- 42) Seminar at University of Florida, 2014.
- 43) Seminar at NYU Stern, 2014.
- 44) Seminar at Columbia University, 2014.
- 45) Seminar at UCLA, 2014.
- 46) Seminar at Lehigh University, 2014.
- 47) Seminar at IBM, 2014.
- 48) Seminar at Oracle Retail Science group, 2014.
- 49) Invited seminars at Operations Research Center, MIT, University of Toronto, 2014.
- 50) Seven presentations on papers I co-authored in the *MSOM Conference*, Seattle, June 2014.
- 51) Thirteen presentations on papers I co-authored in the Annual INFORMS Conference, San Francisco, November 2014.

2015

- 52) Seminar at Fuqua Duke University, 2015.
- 53) Seminar at University of Toronto, 2015.
- 54) Seminar at McDonough School at Georgetown University, 2015.
- 55) Seminar at OR Department in the School of Engineering at Georgia Tech University, 2015.
- 56) Seminar at University of Minnesota, Spring 2015.
- 57) Seminar at Stanford University GSB, Fall 2015.
- 58) Accenture Dialogue Series, May 2015.
- 59) *Annual Revenue Management and Pricing Conference*, Columbia University, June 2015.
- 60) *INFORMS Annual Revenue Management and Pricing Conference*, Columbia University, June 2015.
- 61) *SIG Conference*, Toronto, June 2015.
- 62) Five presentations on papers I co-authored in the *MSOM Conference*, Toronto, June 2015.
- 63) Three presentations on papers I co-authored in the *ISMP Conference*, Pittsburg, July 2015.
- 64) Seven presentations on papers I co-authored in the INFORMS conference in Philadelphia, Fall 2015.
- 65) Invited Speaker at the Supply Chain Analytics Workshop, Berkeley, Fall 2015.
- 66) Invited Tutorial Speaker at the INFORMS conference in Philadelphia, Fall 2015.

2016

- 67) Invited seminar presentation at the Business School in University of Texas Austin, February 2016.
- 68) Invited seminar presentation at the University of Montreal, March 2016.
- 69) Invited Semi-plenary Speaker at the Revenue Management Cluster in the INFORMS Business Analytics Practice conference, Orlando Florida, April 2016.
- 70) Invited seminar presentation at Google NYC, June 2016.
- 71) *MSOM Conference Refereed Proceedings*, New Zealand, and Tristan Conference June 2016.
- 72) Two presentations on papers I co-authored in the *MSOM Conference Refereed Proceedings*, New Zealand and RM Conference, June 2016.
- 73) EC Conference in July 2016.
- 74) Invited presentation (25 people around the world were only invited) at the Technion in Israel to honor Ronny Ben Tal (former dean) who is retiring, September 2016.
- 75) Invited seminar presentation at University of Illinois at Urbana Champagne, end of September 2016.
- 76) Invited seminar presentation at University of Michigan, Ross School of Business, October 2016.
- 77) Ten presentations on papers I co-authored in the Annual INFORMS conference in Nashville Tennessee, Fall 2016.
- 78) Invited seminar presentation at Boston College, School of Business, November 2016.
- 79) Spoke at the Kickoff of the Annual Sloan Fund for EMBA Class 2017 (Dec 2016).

2017

- 80) Invited seminar presentation at workshop organized in Hong-Kong, January 2017.
- 81) Invited Speaker at the Fashion Operations Conference, NYC, Spring 2017.
- 82) Invited seminar presentation, Boston University, Spring 2017.
- 83) Invited seminar presentation, London Business School, Spring 2017.
- 84) Invited seminar presentation, Dartmouth, Tuck, Spring 2017.
- 85) Invited seminar presentation, University of Utah, Spring 2017.
- 86) Invited seminar presentation, UCL, Spring 2017.
- 87) Invited seminar presentation, Adobe, Spring 2017.
- 88) Annual POM conference, Seattle, June 2017.
- 89) Invited Speaker to Alumni Reunion, MIT Sloan, June 2017.
- 90) Five presentations on papers I co-authored in the Annual MSOM conference, UNC, North Carolina, June 2017.
- 91) Invited external speaker to Amazon Research Summit, August 2017.
- 92) Eleven presentations on papers I co-authored in the Annual INFORMS conference in Houston Texas, Fall 2017.
- 93) Invited speaker, Yale Business School, Fall 2017.
- 94) Invited external speaker to ILP Madrid Symposium, Fundacion Ramon Areces, Madrid, Fall 2017.

2018

- 95) Spoke at the Kickoff of the Annual Sloan Fund for EMBA Class 2018 (January 2018).
- 96) Gave a presentation at the Dean's Circle (January 2018).
- 97) Invited speaker, Johns Hopkins, Carey School of Business, Spring 2018.
- 98) Invited speaker, Kellogg Business School, Spring 2018.
- 99) Invited speaker at the Oracle Industry Connect Symposium, Spring 2018.
- 100) Webinar to Oracle clients, Spring 2018
- 101) Three presentations on joint work from my students at the Revenue Management Conference, Toronto, June 2018.
- 102) Eight presentations on joint work from my students at the MSOM Conference, UT Dallas June 2018.
- 103) Invited speaker at the Marketplace Innovation Workshop (Toronto), June 2018.
- 104) Invited speaker, Peak-End Demand Models and their Impact on Hard Promotion Planning Problems, Cornell Tech, NYU, Spring 2018.

- 105) Organized Panel Session at HSI Conference, MIT Sloan, Fall 2018.
- 106) Organized Panel Session at Operations Research Center 65 year anniversary, Fall 2018.
- 107) Gave a presentation to MIT Sloan OER Staff, Fall 2018.
- 108) Webinar to Oracle Lab Seminar Series, Fall 2018.
- 109) Invited speaker, USC Marshall, Fall 2018.
- 110) Invited speaker at Adobe Symposium, , Fall 2018.
- 111) Invited speaker at IMA Workshop, Fall 2018.
- 112) Invited speaker, Workshop at the University of Arizona, Fall 2018.
- 113) Invited speaker, McGill Business School, Fall 2018.
- 114) Eighteen presentations on joint work from my students at the Informs Conference, Fall 2018.

2019

- 115) Plenary Speaker for the Management Science Workshop, University of Chile, Jan. 2019.
- 116) Was a speaker at the ILP Conference, March 2019.
- 117) Invited Seminar at the OM Group at Wharton, Spring 2019.
- 118) Invited Seminar at the OM Group at the Sheller School of Business, Georgia Tech, Spring 2019.
- 119) Ten talks on papers I was a co-author at the POM Conference, Washington DC, Spring 2019.
- 120) Spoke at a panel for junior faculty advising on their academic career.
- 121) Four talks on papers I was a co-author at the RMP Annual Conference, hosted by Stanford University, June 2019.
- 122) Four talks at the MSOM Annual Conference and one talk in the SIG workshop, Singapore, July 2019.
- 123) Plenary Speaker POM International Conference, UK, Fall 2019.
- 124) Twenty presentations on papers I co-authored in the Annual INFORMS Conference, Seattle, Fall 2019.
- 125) Invited Seminar at the OM Group at the Kenan-Flagler School of Business, UNC, Fall 2019
- 126) Invited Seminar at the TOM Group at HBS, Fall 2019.

2020

- 127) Invited Seminar at UIUC (University of Illinois Urbana Champagne), Gies College of Business, Fall 2020.
- 128) Invited Seminar at the University of Maryland, (Smith School of Business), Fall 2020.
- 129) Invited Research Presentations to the three Boards of MIT Management Sloan School of Business, Fall 2020.
- 130) Several presentations at the Annual INFORMS Conference held online, Fall 2020.

2021

- 131) Invited Seminar at CMU (Tepper), Spring 2021.
- 132) Invited Seminar at George Mason University, Spring 2021.
- 133) Invited Seminar at UIC (University of Illinois), Spring 2021.
- 134) Invited Speaker and Chicago Booth, June 2021.
- 135) Plenary Speaker at the CORS Conference, June 2021.
- 136) Plenary Speaker at the MSOM Annual Conference, June 2021.
- 137) Two talks at the ICSS (Service Science) Conference, July 2021.
- 138) Two talks at the INFORMS Healthcare Conference, July 2021.
- 139) Plenary Speaker at the International Operations Research Conference, September 2021.
- 140) Several talks at the INFORMS Annual Conference, Anaheim California, October 2021.
- 141) Panelist at the Doctoral Colloquium for Service Science, at the INFORMS Annual Conference, Anaheim California, October 2021.

- 142) Panelist at the Decision Science Conference, November 2021.
- 143) Invited speaker at seminar series by the Operations group at CUNY, November 2021.
- 144) Invited speaker at seminars series by the Operations group at Rotman School of Business in the University of Toronto, December 2021.
- 145) Plenary Speaker at the data science and business analytics conference organized by the College of Business, Shanghai University of Finance and Economics, December 2021.

2022

- 146) Plenary Speaker at the POM International Conference in Hong Kong, January 2022.
- 147) Plenary Speaker at the ISMP Symposium in Mathematical Programming, August 2022.
- 148) From Data to Impact, Podcast, 2022.
- 149) Invited Speaker at Jiatong University Seminar Series, Spring 2022.
- 150) Invited Speaker at the Operations Management Group Seminar Series at UT Dallas, March 2022.
- 151) Invited Speaker at the Operations Management Group Seminar Series at the Johnson School of Business, Cornell University, June 2022.
- 152) Invited Speaker at the Seminar Series of the Management Science Group at Queens University, September 2022.
- 153) Invited Speaker at the Operations Management Group Seminar Series at Stanford University, GSB, November 2022.
- 154) Several invited talks at the Annual INFORMS Conference, October 2022.
- 155) Invited Speaker at the Seminar Series of Hellenic Diaspora, November 2022.
- 156) Invited Speaker at the Operations Management Group Seminar Series, Business School, Boston College, December 2022.

2023

- 157) Invited Seminar at Brandeis, February 2023.
- 158) Invited speaker at Workshop on Healthcare at the University of Chicago, April 2023.
- 159) Invited seminar speaker at Cornell ORIE department, April 2023.
- 160) Several invited talks at the Annual POM Conference, April 2023.
- 161) Presentations at Sloan Visiting Committee, Spring 2023.
- 162) Invited Talk at AsuFest (workshop to honor of Asu Ozdaglar), June 2023.
- 163) Several invited talks at the MSOM Conference, June 2023.
- 164) Several invited talks at the Annual INFORMS Conference, October 2023.
- 165) Invited seminar speaker at Emory College, Business School, Operations Department, Fall 2023.