

LEANN THAYAPARAN

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ACADEMIC POSITIONS

JOHNS HOPKINS UNIVERSITY

Baltimore, MD

Carey School of Business, Business Analytics and Operations Management

Assistant Professor

2024-present

EDUCATION

MASSACHUSETTS INSTITUTE OF TECHNOLOGY

Cambridge, MA

Doctor of Philosophy in Operations Research

2019-2024

GPA: 5.0/5.0

Advisor: Georgia Perakis

Masters of Business Analytics

2018-2019

GPA: 4.9/5.0

Awarded MIT Sloan School of Management Dean's Fellowship for outstanding academic record, personal achievements and professional promise.

PRINCETON UNIVERSITY

Princeton, NJ

Bachelors of Science and Engineering in Operations Research and Financial Engineering 2012-2016

GPA: 3.8/4.0

Graduated with High Honors

Received Certificate in Engineering and Management Systems

Thesis: An Analysis of Television Show Viewership Growth through SIR Models - used classic epidemiology models to predict the spread of television viewership by applying principles of social contagion.

PUBLICATIONS

PUBLISHED ¹

1. Bennouna, M. A., Nze-Ndong, D., Perakis, G., Singhvi, D., Skali Lami, O., Spantidakis, I., Thayaparan, L., and Tsiourvas, A., 2023, **COVID-19: Prediction, Prevalence, and the Operations of Vaccine Allocation**, published at *Manufacturing and Service Operations Management*. ICSS Best Conference Paper Award 2021 (Institute for Operations Research and the Management Sciences)
Finalist of the Doing Good with Good OR Competition 2021 (Institute for Operations Research and the Management Sciences)
Finalist of the Public Sector Operations Research Best Paper Competition 2021 (Institute for Operations Research and the Management Sciences)
2. Baardman, L., Cristian, R., Perakis, G., Singhvi, D., Skali Lami, D. and Thayaparan, L., 2022 **The Role of Optimization in Some Recent Advances in Data-driven Decision-making**, published at *Mathematical Programming*.

¹authors are ordered alphabetically by last name

3. Perakis, G., Singhvi, D., Skali Lami, O. and Thayaparan, L., 2022, **COVID-19: A Multiwave SIR-based Model for Learning Waves**, published at *Production and Operations Management*.
Runner-up of the Marshall Fisher Best Platforms Paper Award by the POM Journal 2026
Second Place in Service Science Best Student Paper Award 2021 (Institute for Operations Research and the Management Sciences)
Accepted at the Healthcare Operations SIG Meeting 2021.
4. Cramer, E.Y., Ray, E., Lopez, V., Bracher, J., Brennen, A., Rivadeneira, A., Gerding, A., Gneiting, T., House, K., Huang, Y., Thayaparan, L., and others, 2022, **Evaluation of Individual and Ensemble Probabilistic Forecasts of COVID-19 Mortality in the United States**, published at *Proceedings of the National Academy of Sciences*.

SUBMITTED AND WORK IN PROGRESS

5. Perakis, G., Thayaparan, L., and Wang, S., collaborators from General Motors, 2026, **The Role of Electric Vehicle Driver Behavior in Moving to Zero Emissions**, major revision at *Operations Research*.
Second Place in POMS College of Sustainable Operations Student Paper Competition 2024
6. Perakis, G., Thayaparan, L., and Wang, S., collaborators from Oracle, 2026, **UMOTEM: Upper Bounding Method for Optimizing over Tree Ensemble Models**, major revision at *Management Science*.
Honorary Mention in the MSOM Student Paper Competition 2023
ORC Best Student Paper 2023
Finalist of the POMS College of Supply Chain Management Best Student Paper Competition 2023
Finalist of the Jeff McGill Student Paper Award 2022 (Institute for Operations Research and the Management Sciences)
7. Kaps, C., Palley, T. and Thayaparan, L., 2026, **Charging Fast and Slow: Quantifying the Real-Life Value Of EV Charging For Users, OEMs, and The Grid**, submitted to *Management Science*.
8. Deep, V., Sharma, N. and Thayaparan, L., 2026, **Scaling EV Access Through Responsible Enforcement in Asset-Backed Lending**, submitted to *Manufacturing and Service Operations Management*.
9. Sharma, N. and Thayaparan, L., 2026, **Modeling Borrower Intent: Optimizing Commercial EV Loan Management with Driver Data**, work in progress.
10. Perakis, G., Thayaparan, L. and Wang, S., 2026, **Robust Predict and Optimize Solutions for Tree Ensemble Objectives**, work in progress.

HONORS AND AWARDS

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- 2026: Runner-up of the Marshall Fisher Best Platforms Paper Award by the POM Journal
 - 2024: Honorable Mention in the George B. Dantzig Dissertation Award
 - 2024: Second Place in POMS College of Sustainable Operations Student Paper Competition
 - 2023: Honorary Mention in the MSOM Student Paper Competition

- 2023: Winner of MIT ORC Best Student Paper Award
- 2023: Finalist of the POMS College of Supply Chain Management Best Student Paper Competition
- 2022: Finalist of the Jeff McGill Student Paper Award
- 2021: Winner of the ICSS Best Conference Paper Award
- 2021: Finalist of the Doing Good with Good OR Competition
- 2021: Finalist of the Public Sector Operations Research Best Paper Competition
- 2021: Second Place in Service Science Best Student Paper Award

INVITED TALKS

Deep, V., Sharma, N. and Thayaparan, L., 2026, **Scaling EV Access Through Responsible Enforcement in Asset-Backed Lending**
 Rotman School of Management, University in Toronto, 2026

Perakis, G., Thayaparan, L. and Wang, S., Co-authors from GM, **The Role of Electric Vehicle Driver Behavior in Moving to Zero Emissions.**

Martin J. Whitman School of Management, Syracuse University, 2025

College of Engineering, Cornell University, 2024

Babson College, 2024

Fu Foundation School of Engineering and Applied Science, Columbia University, 2024

Yale School of Management, Yale University, 2024

Berkeley College of Engineering, University of California Berkeley, 2024

Harvard Business School, Harvard University, 2024

Rotman School of Management, University in Toronto, 2024

Isenberg School of Management, University of Massachusetts Amherst, 2023

Robert H. Smith School of Business, University of Maryland, College Park, 2023

Carey Business School, Johns Hopkins University, 2023

Jones Graduate School of Business, Rice University, 2023

Questrom School of Business, Boston University, 2023

Kelley School of Business, Indiana University, 2023

Cameron School of Business, University of North Carolina at Wilmington, 2023

Martin J. Whitman School of Management, Syracuse University, 2023

Desautels Faculty of Management, McGill University, 2023

Operations Research Center, Massachusetts Institute of Technology, 2023

Sauder School of Business, University of British Columbia, 2023

CONFERENCE PRESENTATIONS

Deep, V., Sharma, N. and Thayaparan, L., **Scaling EV Access Through Responsible Enforcement in Asset-Backed Lending.**

2026 Manufacturing & Services Operation Management Conference in Boston, MA

2025 INFORMS Annual Conference in Atlanta, GA

Perakis, G., Thayaparan, L. and Wang, S., Co-authors from GM, **The Role of Electric Vehicle Driver Behavior in Moving to Zero Emissions.**

2025 POMS Annual Conference in Atlanta, GA

2024 Manufacturing & Services Operation Management Conference in Minneapolis, MN

2024 POMS Annual Conference in Minneapolis, MN

2023 INFORMS Annual Conference in Phoenix, AZ

2023 Manufacturing & Services Operation Management Conference in Montreal, Canada
2023 Operations & Logistics Division Seminar, University of British Columbia
2023 POMS Annual Conference in Orlando, FL
2023 Early-Career Sustainable OM Workshop in Amherst, MA
2022 INFORMS Annual Conference in Indianapolis, IN

Perakis, G., Thayaparan, L., and Wang, S., Co-authors from Oracle, **UMOTEM: Upper Bounding Method for Optimizing over Tree Ensemble Models.**

2023 INFORMS Annual Conference in Phoenix, AZ
2023 POMS Annual Conference in Orlando, FL
2022 INFORMS Annual Conference in Indianapolis, IN
2022 Young Researchers Workshop Cornell ORIE
2022 Manufacturing & Services Operation Management Conference in Munich, Germany
2022 POMS Annual Conference, virtual
2021 INFORMS Annual Conference, virtual
2021 Revenue Management & Pricing Conference, virtual

Perakis, G., Singhvi, D., Skali Lami, O. and Thayaparan, L., **COVID-19: A Multiwave SIR-based Model for Learning Waves.**

2022 POMS Annual Conference in Orlando, FL
2021 INFORMS Annual Conference, virtual
2021 INFORMS Healthcare Conference, virtual
2021 SIG Manufacturing & Services Operation Management Conference, virtual

Cohen-Hillel, T., Perakis, G., Spantidakis, I., and Thayaparan, L., **The SAFE Method for Feature Reduction and Prediction.**

2020 INFORMS Annual Conference, virtual

GRANTS AND PATENTS

Grants

Co-wrote research proposal for industry collaborator General Motors. Received funding for three years of a doctoral student and a masters student

Co-wrote research proposal for industry collaborator Oracle Retail, submitted to the External Research Office, which reviews grants and makes funding decisions. Received funding for two years of a doctoral student

Patents

US 20230096633 A1 - "Optimized tree ensemble based demand model" (L. Thayaparan, K. Pan-chamgam, S. Borjian, G. Perakis) Invention disclosure filed September 2021

TEACHING EXPERIENCE

JOHNS HOPKINS CAREY Data Analytics for MS, BU.510.650

· Fall 2024-2025, Professor

JOHNS HOPKINS CAREY Innovation Field Project for MBAs, BU.929.816

· Spring 2025-2026, Professor

MIT SLOAN Data, Models and Decisions for Executive MBAs, 15.730

- Spring 2023, EMBA tutor
- Spring 2023, Material Development
- Spring 2022, Teaching Assistant, Rating: 6.6/7
- Spring 2021, Teaching Assistant, Rating: 6.5/7
- Spring 2020, EMBA tutor

MIT SLOAN Analytics Capstone for Masters of Business Analytics, 15.089

- Advisor to Masters' Capstone Project in collaboration with Macy's, Spring/Summer 2023, project title: *I'm Just Browsing: Predicting the Value of Prospective*
- Advisor to Masters' Capstone Project in collaboration with Wayfair, Spring/Summer 2023, project title: *Beyond the Match: Enhancing Product Matching with Model Calibration*
- Advisor to Masters' Capstone Project in collaboration with General Motors, Spring/Summer 2022, project title: *Personalized Marketing Strategies for OnStar Customers*
- Advisor to Masters' Capstone Project in collaboration with General Motors, Spring/Summer 2022, project title: *Enabling Electric Vehicle Adoption: Identifying Charging Station Malfunctions*
- Advisor to Masters' Capstone Project in collaboration with General Motors, Spring/Summer 2021, project title: *Electric Vehicle as an Energy Reservoir: Vehicle-to-Grid (V2G)*

PROFESSIONAL SERVICE

School Service

- Operations Management Seminar Series Organizer, 2024-Present

Professional Service

- Co-Chair, Conference in Celebration of Georgia Perakis 2026
- Session Chair, INFORMS Annual Meeting 2025
- Moderator, Washington Operations Workshop: AI in Supply Chains 2025

Reviewer

Management Science, Operations Research, Manufacturing & Service Operations Management, Transportation Science and Production and Operations Management

PROFESSIONAL EXPERIENCE

GENERAL MOTORS

Austin, TX

Intern, Advanced Analytics Center of Expertise

2019

- Aggregated raw driver data into an intuitive and robust "congestion score" to track traffic flow in real time
- Built an ensemble forecasting model to predict traffic congestion a day, hour and ten minutes in advance using boosted trees and vector autoregression
- Demonstrated that the congestion forecasting model performed out of sample with an R2 of 0.71, a significant improvement over the previous baseline of 0.38

MIT SLOAN / ACCENTURE / MORNINGSTAR

Cambridge, MA

Project on financial impact of innovation in asset management

Fall 2018

- Built innovation scores for 26 asset management firms to capture firm investment in emerging technology based on 8 years of Factiva media data

- Explored correlation between innovation scores and financial growth to understand how innovative culture affects performance; determined no predictive relationship
- Presented analysis to managing directors at Accenture and Morningstar

MCKINSEY & COMPANY

Boston, MA

Senior Analytics Fellow, Operations Advanced Analytics

2016-2018

- Developed and executed a customer-segmentation marketing personalization strategy using insights from a linear optimization model with an expected \$400K growth in profit; presented results to the client's CMO and VP team
- Refined an algorithm in SQL to predict a customer's next purchase based on their transaction history and presented analysis to educate the client's management team on the power and potential of predictive tools
- Designed and implemented New Hire Training for McKinsey's Operations Advanced Analytics practice