

Divyarthi Mohan

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CURRENT POSITION

Tel Aviv University
POSTDOCTORAL FELLOW, supervised by Michal Feldman

AUGUST 2021 - Current

EDUCATION

- 2016 - 2021 **Princeton University**
PhD in COMPUTER SCIENCE
Advisor: S. Matthew Weinberg
*Thesis: Simplicity and Optimality in Algorithmic Economics:
Multi-Item Auctions and Social Learning*
- 2014 - 2016 **Institute of Mathematical Sciences, Chennai**
Master of Science in THEORETICAL COMPUTER SCIENCE
Advisor: Sayan Bhattacharya
Thesis: An Improved Dynamic Algorithm for Maximum b-Matching
- 2011 - 2014 **Indian Statistical Institute, Bangalore**
Bachelor of Mathematics (*Honours*)
First Class with Distinction

RESEARCH

I am broadly interested in Algorithms and Algorithmic Game Theory. My current research interests include Algorithmic Mechanism Design, Opinion Dynamics in Social Networks, and Online Algorithms.

PUBLICATIONS & MANUSCRIPTS

Asynchronous Majority Dynamics in Preferential Attachment Trees
with Maryam Bahrani, Nicole Immorlica, S. Matthew Weinberg
International Colloquium on Automata, Languages and Programming (ICALP 2020).

Approximation Schemes for a Unit-Demand Buyer with Independent Items via Symmetries
with Pravesh Kothari, Ariel Schwartzman, Sahil Singla, S. Matthew Weinberg
Symposium on Foundations of Computer Science (FOCS 2019).

Improved Algorithm for Dynamic b-Matching
with Sayan Bhattacharya, Manoj Gupta
European Symposium on Algorithm (ESA 2017).

Communicating with Anecdotes
with Nika Haghtalab, Nicole Immorlica, Brendan Lucier, Markus Mobius
In Submission.

Simple Mechanisms for Welfare Maximization in Rich Advertising Auctions
with Gagan Aggarwal, Kshipra Bhawalkar, Aranyank Mehta, Alexandros Psomas
In Submission.

Interdependent Public Projects

with Avi Cohen, Michal Feldman, Inbal Talgam-Cohen

In Submission.

AWARDS

Siebel Scholar, Class of 2021

Thomas and Stacey Siebel Foundation

SEAS Award for Excellence, 2019

School of Engineering and Applied Science, Princeton University

Graduate Student Teaching Award, 2018

Department of Computer Science, Princeton University

INTERNSHIPS & LONG-TERM VISITS

SUMMER 2020 **Google**, Mountain View

Research Intern

Mentor: Kshipra Bhawalkar

Project: Rich Ad Auctions

SEP - OCT 2019 **Simons Institute for the Theory of Computing**, Berkeley

Visiting Graduate Student

Program: Online and Matching-Based Market Design

SUMMER 2019 **Microsoft Research**, New England

Research Intern

Mentors: Nicole Immorlica and Brendan Lucier

Project: Social Learning via Anecdotes

INVITED TALKS

Simplicity and Optimality in Multi-Item Auctions

CMU Theory Lunch Seminar

JAN 2022

Georgia Tech ACO Student Seminar

JAN 2022

Tel Aviv University Algorithms Seminar

DEC 2021

The Israel Algorithmic Game Theory Seminar

NOV 2021

Rutgers CS Theory Seminar

NOV 2021

Purdue CS Theory Seminar

OCT 2021

Simplicity and Optimality in Multi-Item Auctions & Strategic Communication

Harvard EconCS Seminar

NOV 2021

Approximation Schemes for Revenue Maximization via Symmetries

Young Researcher Workshop on Economics and Computation, Tel Aviv

JAN 2020

TEACHING

SPRING 2018 Economics and Computation (COS 445)
Teaching Assistant

FALL 2017 Advanced Algorithm Design (COS 521)
Teaching Assistant

SERVICE

Program Committee WINE 2021, EC 2022, ESA 2022

Conference Reviewer ITCS, SODA, WINE, EC, ESA, ICALP, STOC

Journal Reviewer Artificial Intelligence

LEADERSHIP

2020 & 2019 **Graduate College Housing Committee**, Princeton
Facilities Chair

2017 - 2018 **Association of South Asians at Princeton**
Events and Social Chair

2017 - 2021 **Research Inclusion Social Event**
Department of Computer Science, Princeton
Member and Volunteer

EC 2020 **AGT Mentoring Workshop**
Conference on Economics and Computation (EC)
Student Mentor

WINE 2021 **Mentorship Program**
Conference on Web and Internet Economics (WINE)
Mentor