# Benjamin Scott Manning

2040 Market Street

Apt. 910

Philadelphia, PA 19103 Tel: +1 (603) 667 - 1213 Personal Website: benjaminmanning.io Github: benjamin-manning

Linkedin: benjamin-manning
E-mail: beman@sas.upenn.edu

# RESEARCH INTERESTS

Computational Social Sciences; Machine Learning; Causal Inference; Behavioral Science;

### **EDUCATION**

### Harvard University

Aug 2019 - May 2021

- Master in Public Policy at the Harvard Kennedy School  $\,$
- Certificate in Management, Leadership, & Decision Sciences
- Thesis: Interactive Voice Response Systems for Low-Literate Farmers [pdf]

### Washington University in St. Louis

Aug 2013 - May 2017

- Bachelor of Arts in Applied Mathematics, Minor in Writing
- Reichman University (IDC Herzliya) Study Abroad in Israel (2014)

### RESEARCH EXPERIENCE

### University of Pennsylvania – Researcher

Apr 2021 - Present

- Collaborated with Professors Angela Duckworth (Main supervisor UPenn), Daniel Kahneman (Princeton), Lyle Ungar (Upenn), Colin Camerer (Caltech), Louis Hickman (Upenn), & Jordan Ellenberg (Wisconsin)
- Collaborated with doctoral students Linnea Gandhi (Upenn), Benjamin Lira (Upenn), and Marcos Gallo (Caltech)

# Harvard University & University of Chicago - Research Associate

May 2020 - Present

• Collaborated with Professor Jon Rogowski (Harvard, then UChicago)

# Tuck School of Business at Dartmouth College – Research Associate & Producer

Oct 2018 – Sep 2019

• Collaborated with Professor Sydney Finkelstein (Dartmouth)

#### WORKING PAPERS

1. Makridis, C., Hickman, L., **Manning**, **B.**, & Duckworth, A. L. Earnings Are Greater and Increasing in Occupations That Require Intellectual Tenacity. *Proceedings of the National Academy of Sciences*. Submitted Feb 2022. [pdf]

#### ARTICLES IN PREPARATION

- 1. Gallo, M., **Manning**, **B.**, & Camerer, B. Applications in Reinforcement Learning: Teacher Effort and Student Learning As a Multi-Armed Bandit Problem. Target: *Proceedings of the National Academy of Sciences*.
- 2. Gandhi, L., **Manning, B.**, Duckworth, A. L., & Kahneman, D. Systematic Overconfidence in Psychological Hypothesis Development. Target: *Psychological Science*.
- 3. Duckworth, A. L., & Manning, B. et al. Effects of Email Nudges on Elementary School Math Teachers. Target: Proceedings of the National Academy of Sciences.
- 4. **Manning, B.**, Duckworth, A. L., Ungar, L., Ellenberg, J. Changes in the Formality of English through the 20<sup>th</sup> and 21<sup>st</sup> Centuries. Target: *Computational Linguistics*.
- 5. Rogowski, J., **Manning, B.** Historical Employment Changes in the Composition of the U.S. Government. Target: *American Journal of Political Science*.

### TEACHING EXPERIENCE

# University of Pennsylvania – Course Lead

Aug 2021 - Present

- Leading with Grit for MBAs with Prof. Angela Duckworth (Spring 2022)
- Gritlab for undergraduates with Prof. Angela Duckworth (Spring 2022)
- Undergraduate Honors Research Seminar in Psychology with Prof. Angela Duckworth (Fall 2021)

• Tutored masters and doctoral students across multiple graduate schools in statistics and microeconomics

#### Harvard Kennedy School - Teaching Assistant

Jan 2020 - May 2021

- Applied Intensive Policy Seminar with Profs. Joe Aldy & Jack Donahue 50 Students (Spring 2021)
- Econometrics II with Prof. Teddy Svoronos (Spring 2021)
- Markets and Market Failure with Prof. Christopher Avery (Fall 2020)
- Big Data for Politics with Prof. Benjamin Schneer (Spring 2020)

### Phetpittayakom School – Mathematics Teacher

Sep 2017 - Oct 2018

• Taught mathematics courses from pre-algebra to trigonometry in classes of up to 50 students (over 500 total) at a public school in rural Thailand

### Washington University in St. Louis - Peer Tutor

Sep 2014 - Dec 2016

• Tutored peers in Multivariable Calculus, Linear Algebra, Probability & Statistics, Differential Equations, and Biostatistics

### **HONORS & AWARDS**

- High Pass Honors Master's Thesis (2021)
- Kosciuszko Foundation Tuition Scholarship Supports American students of Polish descent for graduate studies (2019)
- College Honors Cumulative undergraduate GPA award (2017)
- Order of Omega Honor society recognizing high standards of undergraduate leadership (2016)
- Dean's List Semester undergraduate GPA award (Multiple Years)
- United Valley Micah Hero Award For projects helping to "heal the world" in Uganda over the course of 10 years (2015)

#### SERVICE & ADDITIONAL WORK

- Pennsylvania Department of Transportation Volunteer data scientist analyzing the efficacy of speed cameras put on streets in Philadelphia in order to lower rates of death and injury from vehicle crashes (2021 Present)
- COVID Response Team Volunteer helping Vermont residents get COVID vaccines and other necessities (2020 Present)
- Big Brothers Big Sisters Volunteer mentor for underprivileged students who aspire to attend college (2019 2021)
- VIPKID Tutor teaching over 300 Chinese children English through online platform (2017 2020)
- Village Project Sponsor & Volunteer for program supporting orphans in rural Uganda (2009 Present)

### **SKILLS**

#### **Programming:**

Python; R; SQL; LaTeX; Version Control – Git; STAN; Command Line/Bash; Javascript; CSS; Qualtrics; C; Matlab

### Languages:

Spanish – Limited Working Proficiency; Thai – Elementary Proficiency

#### Extracurricular:

Travel: 41 countries on 6 continents; soccer; guitar; saxophone; basketball; yoga; hiking; science fiction; Settlers of Catan

### REFERENCES

- Angela Duckworth Professor of Psychology University of Pennsylvania aduckworth@characterlab.org
- Christopher Avery Professor of Public Policy Harvard University christopher\_avery@hks.harvard.edu
- Colin Camerer Professor of Behavioral Economics California Institute of Technology camerer@hss.caltech.edu
- $\bullet \ \ Sydney \ Finkelstein Professor \ Of \ Management Dartmouth \ College \underline{sydney.finkelstein@tuck.dartmouth.edu}\\$
- Jon Rogowski Associate Professor of Political Science University of Chicago jrogowski@uchicago.edu
- Teddy Svoronos Lecturer in Public Policy Harvard University theodore\_svoronos@hks.harvard.edu