

EXPERIENCE	<b>University of Illinois Urbana-Champaign</b> Research Scientist, Institute of Sustainability, Energy, and Environment	2020–Now
	<b>University of Chicago</b> Postdoctoral Scholar (Advisor: Dan Black), Harris School of Public Policy	2017–2020
EDUCATION	<b>Northwestern University</b> Ph.D. Mathematics (Advisor: Steve Zelditch) Dissertation: Euclidean Embeddings and Riemannian Bergman Metrics	2009–2014
	<b>Columbia University</b> B.A. Mathematics with Honors, Columbia College Thesis: An Application of Poincaré’s Fundamental Polyhedron Theorem	2005–2009
PUBLICATIONS	<b>Algorithmic Fairness: Choices, Assumptions, and Definitions</b> To appear in <i>Annual Reviews of Statistics</i> , 2021. S. Mitchell, <b>E. Potash</b> , S. Barocas, A. D’Amour, K. Lum	
	<b>Validation of a Machine Learning Model to Predict Childhood Lead Poisoning</b> <i>JAMA Network Open</i> 3 (9), e2012734-e2012734 <b>E. Potash</b> , R. Ghani, J. Walsh, E. Jorgensen, C. Lohff, N. Prachand, R. Mansour	
	<b>Randomization Bias in Field Trials to Evaluate Targeting Methods</b> <i>Economics Letters</i> , Volume 167, June 2018, Pages 131–135. <b>E. Potash</b>	
	<b>Predictive Modeling for Public Health: Childhood Lead Poisoning</b> <i>21st ACM SIGKDD Proceedings</i> <b>E. Potash</b> , J. Brew, A. Loewi, S. Majumdar, A. Reece, J. Walsh, E. Rozier, E. Jorgensen, R. Mansour, R. Ghani	
	<b>Euclidean Embeddings and Riemannian Bergman Metrics</b> <i>The Journal of Geometric Analysis</i> , January 2016, Volume 26, Issue 1, pp 499-528 <b>E. Potash</b>	
WORKING PAPERS	<b>A Bayesian Approach to Recreational Water Quality Modeling and Cross Validation in the Presence of Measurement Error</b> <i>Submitted.</i> <b>E. Potash</b> and S. Steinschneider	
OTHER WRITING	<b>Why It’s So Hard to Find Out Where the Candidates Stand</b> <i>Washington Monthly</i> , November 2016	
INVITED TALKS	<b>Environmental Policy Institute at Chicago (EPIC) Workshop</b> Can Health Departments Prevent Childhood Lead Poisoning?, 5/15/2018	
	<b>EPA Research and Development “Science at Work” Seminar</b> Proactive Lead Investigations, 4/12/2017	
	<b>City Bureau Public Forum</b> Lead Poisoning Panel Speaker, 3/13/2017	

## American Public Health Association Annual Meeting

Predictive Analytics in Advancing Public Health Session, 11/3/2015

## Bloomberg Data for Good Exchange

Predictive Modeling for Public Health: Childhood Lead Poisoning, 9/30/2015

## ACM Knowledge Discovery and Data Mining (KDD) Annual Conference

Predictive Modeling for Public Health: Childhood Lead Poisoning, 8/12/2015

### GRANTS

#### Collecting and Sharing Information across Sectors in Chicago and Illinois to Identify Children at Risk for Lead Poisoning.

Robert Wood Johnson Foundation. With Rayid Ghani, Raed Mansour, Matthew Roberts, John DiCello, Tom Schenk, Illinois Department of Human Services, and Alliance of Chicago. Grant ID 73354. \$200,000.

### INDUSTRY EXPERIENCE

#### University of Chicago

2014–2017

Research Professional II, Center for Data Science and Public Policy

#### Eric and Wendy Schmidt Data Science for Social Good

Summer 2016

Technical Mentor

#### Open Energy Efficiency Meter (openeemeter.org)

2015

Data Scientist

#### Oroeco (oroeco.com)

2014

Scientific Software Engineer

### TEACHING

#### University of Chicago

2016–Now

Multilevel Regression Modeling for Public Policy (Winter 2020)

Introduction to Program Evaluation (Spring 2019, Winter 2020)

Introduction to Programming for Public Policy (Spring 2018, 2016)

#### Northwestern University

2008–2013

Assistant: Probability & Stochastic Processes, Mechanics, Real Analysis

### SKILLS

Python (numpy, scipy, pandas, sklearn, matplotlib)

R (tidyverse, rstanarm)

SQL (PostgreSQL), Java, JavaScript (D3.js), Ruby (on Rails)

Geospatial (PostGIS, GDAL, OpenStreetMap, Mapnik, QGIS, Leaflet)

git, bash, GNU/Linux, L<sup>A</sup>T<sub>E</sub>X

Fluent in Russian

### REFERENCES

- Dan Black, danblack@uchicago.edu  
Professor, Harris School of Public Policy, University of Chicago
- Shira Mitchell, sam942@mail.harvard.edu  
Statistician, Civis Analytics
- Emile Jorgensen, Emile.Jorgensen@cityofchicago.org  
Epidemiologist, Chicago Department of Public Health