

Emily Kurtz | Resume

✉ kurtz217@umn.edu

PhD student of Political Science and MSc student of Statistics interested in American politics and quantitative statistical methods.

Education

- **University of Minnesota** **Minneapolis, MN**
Doctor of Philosophy in Political Science, GPA: 3.92/4.00 *2020–Present*
- **University of Minnesota** **Minneapolis, MN**
Master of Science in Statistics, GPA: 3.74/4.00 *2017–Present*
- **Wellesley College** **Wellesley, MA**
Bachelor of Arts in Mathematics and Environmental Science, GPA: 3.49/4.00 *2011–2015*
- **McDaniel College Budapest and Eötvös Loránd University** **Budapest, Hungary**
Budapest Semesters in Mathematics, High Honors *Spring 2014*

Employment History

- **University of Virginia Biocomplexity Institute** **Arlington, VA**
Graduate Student Fellow *May 2021 – August 2021*
Worked with teams of faculty and undergraduate students on two data science projects with benefits to the public. Studied occupations in the Skilled Technical Workforce and their benefits to economic mobility in the United States. Also studied the role data repositories play in data sharing and their benefits to the scientific community and society as a whole.
- **University of Minnesota** **Minneapolis, MN**
Graduate Assistant *September 2017 – Present*
Hold weekly recitations and office hours for undergraduate Statistics courses. Won the Bernard Lindgren Award for my successes in this role in Spring 2018.
- **Institute for Research in Statistics and its Applications** **Minneapolis, MN**
Student Researcher *Summer 2018, Spring 2019*
Aided student and faculty researchers on campus and in private organizations with the statistical components of their work. Employed classical statistics and machine learning techniques in R and Stata.
- **Epic Systems Corp.** **Verona, WI**
Technical Services Analyst *September 2015 – August 2017*
Developed health care software and assisted hospitals and clinics in its implementation and maintenance. Developed a new, more efficient method for tracking a referral's life cycle for the entirety of Epic's system, which directly benefits over 200 million people worldwide.
- **Wellesley College** **Wellesley, MA**
Supplemental Instructor *September 2013 – May 2015*

Led supplemental lessons in multiple Calculus courses, and held additional office hours for a variety of Math courses including Calculus, Linear and Abstract Algebra, Real Analysis, Combinatorics and Graph Theory, and Probability and Statistics.

- **East Tennessee State University** **Johnson City, TN**
Undergraduate Mathematics Researcher *May 2014 – August 2014*
Researched in the area of Probability and Graph Theory. Presented *Gray Code Distance 2 Graphs* and wrote *The Total Acquisition Number of the Randomly Weighted Graph* to share my results from this experience (see next section).
- **National Aeronautics and Space Administration** **Cleveland, OH**
Student Environmental Researcher *May 2013 – August 2013*
Analyzed health and safety data using R and excel and made recommendations for the entire NASA Glenn Research Center. Specific contributions include hearing protection initiatives and asbestos research, while working in other air pollutant areas. Gave a presentation at NASA and at Wellesley the following fall.

Presentations and Publications

- **Joint Mathematics Meetings**
 - Gray Code Distance 2 Graphs
- **Discussiones Mathematicae Graph Theory, September 2017**
 - The Total Acquisition Number Of The Randomly Weighted Path
- **Journal of Sports Engineering and Technology**
 - Within-field Variability of Turfgrass Surface Properties and Athlete Performance: Modeling Their Relationship using GPS and GIS Technologies

Awards, Scholarships, and Fellowships

- University of Minnesota Lynn Lin Fellowship for Statistical Consulting
- University of Minnesota Statistics PhD First Year Scholarship
- University of Minnesota Bernard W. Lindgren Award for Excellence in Teaching
- University of Minnesota Graduate Research Partnership Program Fellowship
- Wellesley College Quantitative Analysis Institute Guthman Fellow

Technical and Personal skills

- **Software and Programming Languages:** R, Python, Mathematica, SQL, M, Stata, and LaTeX.
- **Languages:** Intermediate Spanish, basic German, and basic Hungarian.

Volunteer and Extra-curricular Activities

- University of Minnesota Council of Graduate Students - Representative to the Board of Regents
- University of Minnesota Student Senate - College of Liberal Arts Graduate Student Senator
- Twin Cities Tutoring - Tutor
- Wisconsin Democratic Party - Data Worker
- Science Club for Girls - After school Teacher