

EDUCATION

Massachusetts Institute of Technology- Cambridge, MA

Class of 2030

Doctor of Philosophy: Mathematics

- **Dean of Science Fellow:** Competitive fellowship that fully funds three years of doctoral study without a requirement of teaching
- **Interests:** Analysis of PDE, nonlinear dispersive equations

University of North Carolina at Chapel Hill- Chapel Hill, NC

Class of 2025

Bachelor of Science (highest honors): Mathematics

Bachelor of Arts: Music

- **Thesis:** A sharp lower bound on the lifespan for a multiple-speed system of wave equations with radially symmetric initial data (doi.org/10.17615/znay-5732)
- **Phi Beta Kappa**
- **Honors Carolina:** Highly competitive program admitting 10% of each incoming class
- **GPA:** 3.981

RESEARCH EXPERIENCE

Undergraduate Research Assistant- Chapel Hill, NC

January 2023 – May 2025

- Researched systems of nonlinear wave equations with multiple speeds under the direction of Dr. Jason Metcalfe
- Published a paper with Dr. Metcalfe establishing a lifespan result for a particular multiple-speed system using local energy methods (doi.org/10.3934/cam.2023033)
- Delivered a talk with Dr. Metcalfe on our lifespan result to the UNC Online Undergraduate Research Seminar
- Wrote with support from NSF grants DMS-2054910 and DMS-2135998
- Received a financial award as a member of the spring 2025 cohort of Kennedy Scholars

ADDITIONAL EXPERIENCE

Academic Chair, Carolina Math Club- Chapel Hill, NC

January 2025 – May 2025

- Organized a series of semi-weekly lectures by UNC students and faculty

Math Tutor, Triangle Learning Consultants- Raleigh, NC

Summer 2021

- Tutored middle school and high school students in algebra and geometry

Private Math Tutor- Raleigh, NC

September 2020 – May 2021

- Tutored middle school and high school students in algebra, geometry, and basic math

Performing Jazz Pianist

December 2018 – Present

- Named to the National Association for Music Education's All-National Honor Ensemble in Summer 2020
- 2023 Recipient of the Fred and Gail Fearing Jazz Award for accomplishments in the UNC Jazz program
- 2024 Recipient of the UNC Jazz Studies Award with a grant to produce a studio recording in January 2025
- Combo leader in the UNC Jazz Combos ensemble from August 2023 to May 2025, leading meetings and planning rehearsals for a band of six members

COMMUNITY SERVICE

Long Run for Race

June 2020

- Organized and ran a marathon in Raleigh, North Carolina, raising \$3279 for programs at White Memorial Presbyterian Church to combat racial inequality