Fatema Begum

Student at Dartmouth College

bfatema1375@gmail.com • +1 347 459 8119

Education

Dartmouth College Hanover, NH
B.A.in Biology Expected Graduation: 2022

Research Experience

Lab Assistant

Higgs Lab, Geisel School of Medicine at Dartmouth College

Hanover, N

- October 2018 June 2019
- Analyzed intracellular membrane tubes in pancreatic cancer cells.
- Used the Andor Spinning Disk, Airyscan, and DIC Microscopes to image stained cells and used ImageJ for quantification.
- Presented my research at the 2019 Wetterhahn Science Symposium.

Research Assistant

Benson Lab. Icahn School of Medicine at Mt. Sinai

New York City. United States

February 2017 - August 2018

June 2016 - August 2018

- Assessed abnormalities in synaptic fractions in relation to Autism Spectrum Disorder.
- Used confocal microscopy to image stained cells and Metamorph and ImageJ for analysis.
- Presented my project at the NYC Science and Engineering Fair and was awarded 4th Place in the 2018 Annual STEP Competition (Senior Division).

CEYE Research Scholar, President

Center for Excellence in Youth Education, Icahn School of Medicine at Mt. Sinai

New York City, United States

- Selected for a two-year biomedical research program cultivating lab skills in DNA technology.
- Served as President of my class, acting as a liaison between my peers and the administration.
- Helped guide middle school students through heart, brain, and kidney dissections.
- Volunteered at the Annual Mount Sinai Brain Awareness Fair. Participated in the Annual March for Science and 2018 Climate March.

Extracurricular Activities

Volunteer, Junior Facilitator September 2018 - Present Sexual Assault Peer Allies, Movement Against Violence, Dartmouth College

Hanover, NH

- Trained to serve as a resource for students who have experienced sexual assault or intimate partner violence.
- Facilitate discussions about sexual violence in Greek houses and gender inclusive communities.

Volunteer

September 2018 - Present

Growing Change, Dartmouth College

Hanover, NH

- Work in classrooms to teach youth about food systems and healthy eating.
- Connect with the vibrant local agricultural community to build on strong farm-to-school networks.

Executive Committee Member

Nathan Smith Pre-Health Society, Dartmouth College

Hanover, NH

• Responsible for planning and executing programs that assist pre-medical students with science courses, explore ethical issues in medicine, and organize shadowing opportunities.

Pathways Scholar

Health Professions Program, Dartmouth College

September 2018 - Present

September 2018 - Present

September 2018 - Present

Hanover, NH

- Gain greater depth of knowledge, inspiration, and tools to understand and tackle social determinants and equity in health care through exposure to expert facilitators and robust discussions.
- Learn about innovative approaches for providing critical care to the most vulnerable in our society. Develop ethical understanding, mindfulness and compassion for a future in a health career.

Great Issues Scholar & Mentor

John Sloan Dickey Center, Dartmouth College

Hanover, NH

• Participated in a year-long series of interactive events aimed at enhancing one's understanding of current international events related to development, global health, and climate change throughout freshman year.

Awards

- Citation for Meritorious Performance in German, Dartmouth College (2019)
- AATG National German Exam, Gold Certificate (2016, 2017, 2018)
- Questbridge College Prep Scholar, New Americans Award (2017)
- Questbridge National College Match Scholarship (2018)

Skills

- Languages: Bengali, German
- Computer: InDesign, Autodesk Inventor, Revit, Fusion 360
- Research: Tissue Staining for Histology, Confocal Microscopy, ImageJ/FIJI for Analysis

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