

Huân Q. Bui

Colby College, 8347 Mayflower Hill, Waterville, ME, 04901
hqbui21@colby.edu | huanqbui.com | **in** | 301-704-6958

Education

B.A. (*anticipated*) Colby College, 2017—2021, GPA: 4.12/4.00
Physics & Mathematical Sciences with a Concentration in Statistics.

Courses

Physics Classical Field Theory (*independent study*), General Relativity, Classical Mechanics, Thermodynamics & Statistical Mechanics, Modern Physics.
Mathematics Matrix Analysis, Linear Algebra, Probability Theory, ODE, PDE, Statistical Modeling, Vector Calculus, Introduction to Statistics, Honors Calculus, Introduction to Python.

Work Experience

- Undergraduate Researcher**, *Joint Quantum Institute—UMD & NIST* Summer 2019
- Principal investigator: Steven Rolston.
 - Unofficial offer accepted. Topic: Optical nanofiber (ONF) experiments.
- Research Assistant**, *Colby College, Dept. of Physics & Astronomy* Nov 2017—Present
- Principal investigator: Professor Charles Conover.
 - Study ultracold Rydberg ^{39}K in a MOT using frequency-stabilized external-cavity diode lasers
- Teaching Assistant**, *Colby College, Dept. of Mathematics & Statistics* Feb 2019—Present
- Grade problem sets for MA253: Linear Algebra. Instructor: Otto K. Bretscher.
 - Hold TA hours.
- Teaching Assistant**, *Colby College, Dept. of Physics & Astronomy* Sep 2017—Present
- Graded problem sets for Mechanics, E&M and Optics ('18), and Modern Physics I & II ('19).
 - Prepared laboratory equipment for Foundations in Electromagnetism & Optics.
- Math & Physics Tutor**, *Colby College, Dean of Studies* Nov 2018—Present
- Meet 5 students from Modern Physics, Mechanics, and First-year Calculus on a regular basis.
 - Help improve their academic performance through reviewing course material and solving problems.
- Tech Support**, *Colby College ITS* Aug 2017—Sep 2018
- Troubleshoot classroom equipment, hard/software, and networking problems.
 - Provided help to students, staff, and faculty both over the phone and in person.
- Tutor**, *7AStar Tutoring* Summer 2017
- Assisted Vietnamese high school students with the SAT Subject and AP tests.

Honors & Awards

Bixler Scholar, *Colby College*: 2017—2018
Dean's List, *Colby College*: F'17, S'18, F'18

Skills

Laboratory Optics, atomic spectroscopy (collecting and analyzing data), constructing ECDL's and electronic laser frequency-locking circuits, operating diode lasers & magneto-optical traps, programming arbitrary waveform generator.
Computing IGOR Pro (programming, analysis & modeling), R, Python, Mathematica, \LaTeX , Adobe Illustrator, Ubuntu, Windows, MacOS, C++ (beginner), HTML & CSS (novice).
Tutoring Online & One-on-one
Languages Vietnamese (*native*), English (*fluent/proficient*)

Conferences

DAMOP19 Millimeter-wave precision spectroscopy of d-d transitions in potassium Rydberg states
CUSRR2018 Precision measurement of potassium energy levels at highly excited states