BENJAMIN CHEN

Candidate for Pure Mathematics Honours Co-op Computing Minor / East Asian Studies Minor







https://nerasnow.github.io/

EXPERIENCE

Undergraduate Research Assistant University of Waterloo

May 2022 -

Waterloo, ON

• Working part-time on the MathBrush project under the supervision of Professor George Labahn

CS247 Instructional Support Assistant

University of Waterloo

iii May 2022 - Aug. 2022

Waterloo, ON

CS137 Instructional Support Assistant

University of Waterloo

Sept. 2021 - Dec. 2021

Waterloo, ON

CS246 Instructional Support Assistant

University of Waterloo

May 2020 - Aug. 2020

Waterloo, ON

CS137 Instructional Support Assistant

University of Waterloo

Sept. 2019 - Dec. 2019

Waterloo, ON

- Maintaining course web page and newsgroup/Piazza
- Giving tutorials to students on a weekly basis
- Writing auto testing scripts to evaluate students' submission (Marmoset)
- Attending and participating in weekly feedback and planning meetings which normally include the instructors

Youth Steering Committee – eLearning Critic SAVIS of Halton

Mar. 2016 - Jun. 2016

Oakville, ON

- Reviewed and provide constructive feedback on SAVIS program eLearning presentations composed for youth programs to improve critical thinking skills
- Developed cooperation skills by working with SAVIS staff to compile research for presentations
- Applied communication skills and organization skills to schedule shifts for over 10 volunteer coordinator using Google Calendar

SKILLS

LaTeX, C/C++, Python



Microsoft Office, PowerShell, Bash



Mathematica, MATLAB, Maple, Linux, React



RELEVANT COURSES

Pure Mathematics

- PMATH 347: Groups and Rings
- PMATH 348: Fields and Galois Theory
- PMATH 351 / 352: Real / Complex Analysis
- PMATH 365: Differential Geometry
- PMATH 450: Lebesgue Integration and Fourier Analysis
- PMATH 464: Intro to Algebraic Geometry
- PMATH 440: Analytic Number Theory
- PMATH 446: Intro to Commutative Algebra

Computing Option

- CS 234: Data Types & Structures
- CS 245: Logic and Computation
- CS 246: Object-Oriented Software Development
- CS 370: Numerical Computation
- CS 475: Computational Linear Algebra
- CS 487: Intro to Symbolic Computation Course Project: Primality Testing

A more detailed chart illustrating the courses I have taken so far can be accessed here: Course Dependency Chart

QUALIFICATIONS

Programming Experience

- Personal website hosted on GitHub Pages using React
- Developed C/C++/Python skills in various CS courses
- Participated in a C++ group project (Chess) for CS 246

Proficient LTFX User

- Using LaTeX in various settings: Notes, Assignment, CV, Charts, etc
 Sample document:
 - Notes: PMATH 450 Notes