Jeffrey Shum

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Education

Stony Brook University

Stony Brook, NY

B.S. in Computer Science and Applied Math & Statistics

2021 – Present (Expected 2025)

- Grade Point Average: 3.98
- Departmental Average: 4.00
- Relevant Coursework: Calculus 1, Calculus 2, Calculus 3 (Multivariable), Applied Linear Algebra, Discrete Mathematics, Object-Oriented Programming, Data Structures
- Dean's List College of Arts and Sciences (Fall 2021, Spring 2022, Fall 2022)

Work Experience

Collegiate Science & Technology Entry Program – NYSED

Stony Brook, NY

Computer Science Tutor

January 2023 - Present

- Provide personalized tutoring for Stony Brook University's CSE 215 Foundations of Computer Science (Discrete Mathematics).
- Create effective practice problems and mock exams that challenge critical thinking and encourage understanding beyond the classroom.
- Topics include Mathematical Logic, Proof Techniques, Sequences, Induction, Mathematical Recursion, Set Theory, Functions, Relations, LaTeX

Calculus Tutor September 2022 – Present

- Provide one-on-one personalized tutoring for historically underrepresented and marginalized groups in STEM at Stony Brook University.
- Guide and encourage students in practical problem-solving approaches with an emphasis on fundamental understanding of Calculus 2 topics.
- Assist students with their college transition through effective studying techniques, guidance on navigating college life, and awareness for campus resources.
- Topics include Taylor & Maclaurin Series, Integration Techniques, Differential Equations, Power Series, Convergence Tests, Applications of Calculus, Volume

Stony Brook University Dept. of Applied Mathematics & Statistics Undergraduate Teaching Assistant Stony Brook, NY August 2022 - Present

- Assist in teaching material, grading assignments, and tutoring undergraduate students in AMS 103 Applied Mathematics in Modern Technology with Professor Matthew G. Reuter.
- Topics include Algebra, Systems of Equations, Coordinate Systems, Base-n Systems, Modular Arithmetic, Probability, Encryption, Error-Detecting Codes, Graphs, Algorithms, Big-O Notation

Skills

Programming Languages: Java, Python, JavaScript/NodeJS, TypeScript, HTML, CSS

Frameworks/Libraries: React, NextJS

Software: Google Suite, Microsoft Office, LaTeX

Professional Certificates

Google Data Analytics Professional Certificate

Issued by Google via Coursera

July, 2022

- Relevant Skills: Contextualization, Data Processing, Data Analysis, SQL, Spreadsheets, Visualizations, R Programming Language