Savir Singh

■ savirsinghwork@gmail.com in in/savirss • savirsingh • savirsingh.com

Experience

University of Waterloo

Waterloo, Canada

Software Engineering & Research Intern

January 2024 - April 2024

- Worked with a team of PhD students on a software security research project called FuzzSlice
- Added some support for C++ repositories to the project
- Built a Flask web app to make interacting with the product more efficient
- Produced a video demo of FuzzSlice using the GUI I developed
- My video demo and GUI were presented in the ICSE 2024 Research Track

DMOJ: Modern Online Judge

Toronto, Canada

Problem Setter & Contest Uploader

September 2023 - Present

- Uploading and setting **competitive programming** contest problems
- Passed a qualification quiz on my first attempt
- Added Canadian Computing Competition (2024) problems to Canada's largest online competitive programming judge

American Inn Ozark Ozark, USA

Backend Engineer Intern

June 2023 - September 2023

- Built an automated system to handle updating available rooms on the website
- Programmed a real-time pinging system to notify staff of new reservations
- Used a MySQL database to handle hotel reservations efficiently
- Increased room reservations by 30% over one month

Education

Garth Webb Secondary School

Oakville, Canada

Ontario Secondary School Diploma

September 2021 - June 2025

Executive Leader of Computer Science Club, Executive Leader of Financial Literacy Club, Founder & President of Competitive Programming Community, Member of Math Club, Member of Physics Club

Listed on academic honour roll for high-achieving students in grades 9-10

Skills

Programming Languages: Python, C/C++, Java, HTML, CSS, JavaScript

Frameworks/Tools: Linux, Git, Docker, React.js, Flask, Django

Projects

Math Contest Repository

October 2023 - Present

An online **math contest platform** with 200+ registered users, 220+ community members, 1400+ problems, and over 7000 monthly impressions. We have the support of **Desmos as a partner**

BYTEsense September 2023

A project we developed for **Hack the North 2023**. BYTEsense is an **AI-powered tool** which personalizes itself to a user's individual dietary needs. The purpose of the app is to inform the user how a **new cuisine** may affect them

Volcano Judge October 2022 - January 2023

Volcano Judge is an online competitive programming judge designed specifically to aid in learning new **algorithms and data structures**. Supports and has **sandboxing for Python and C++**

Honours & Awards

Top 8% on Canadian Computing Competition (Senior) 2024

March 2024

Achieved a score of 37/75 and a rank of 310 out of 3948 participants in Canada's national programming competition

3x First Place on PEO Mississauga High School Coding Contest

November 2021, 2022, 2023

I won first place **three times** in the high school coding contests hosted by Professional Engineers Ontario (PEO) - Mississauga Chapter

Hack the North 2023 Replit Prize Winner

September 2023

Awarded second place prize from Replit and Hack the North for building BYTEsense. Valued at \$200

13th Place Provincially - Skills Ontario Coding Competition

May 2023

Ranked 13th place in provincial level programming competition. Qualified by achieving first place in board-level competition

Gold Medalist, Board Representative - Halton Skills Coding Competition

March 2023

Ranked first place in school board programming competition. Qualified to represent school board in provincial competition