

Yiming Zhang

Toronto, ON M5T — +1 437-580-0869 — yimingg.zhang@mail.utoronto.ca

Education

Bachelor of Applied Science and Engineering

University of Toronto

Sept 2020 – May 2025

Toronto, ON

- Major: Computer Engineering
- Relevant Courses: Algorithms & Data Structures, Communication and Design, Computer Networks, Programming Fundamentals, Computer Organization, Operating Systems

Experience

System on Chip Digital Verification Intern

Alphawave Semi

May 2023 – Aug 2024

Toronto, ON

- Enhanced team infrastructure with Python, optimizing Jenkins pipelines, pre-commit hooks, and automated error handling, reducing outbreak time by 90%.
- Developed a full-stack system using Python (Flask), MongoDB, and HTML/JS, saving developers 20 minutes daily.
- Performed register bit bash testing via APB access and sanity tests, aiding SoC design verification.

Software Developer Intern

Sophoton

May 2022 – Sept 2022

Shanghai, China

- Improved an existing plotting tool by enhancing label clarity with Matplotlib, increasing data readability by 25%.
- Designed software using Tkinter to help designers visualize chips in a self-driven manner.
- Delivered a final presentation to the company, leading to 100% adoption of the design tool.

Projects

Software Developer — Software Design and Communication

University of Toronto

Jan 2022 – Apr 2022

Toronto, ON

- Developed a C++ program using OSM (OpenStreetMap) to visualize and draw geographical locations.
- Collaborated in a team of 3, utilizing GIT for version control and implementing pathfinding algorithms such as Dijkstra's and A*.

Processor Design — Computer Organization

University of Toronto

Apr 2022

Toronto, ON

- Utilized Verilog to design a 16-bit processor with ARM-like instructions including add, sub, and conditional branch.
- Tested the design on FPGA using Quartus with multiple test cases.

Leadership Experience

Team Leader — Engineering Strategies and Practices II

University of Toronto

Jan 2021 – Apr 2021

Toronto, ON

- Led a team of 5 to propose a design to solve e-cargo cycle parking issues.
- Created and maintained a Gantt chart for project planning and ensured effective communication.

Team Leader — Sociology 12 Service-Learning Project

Jilin, China

Sep 2019 – Oct 2019

Jilin, China

- Directed a group of 17, organizing the project and leading practice and performance sessions.

Skills

- **Programming Languages:** Python, C++, C, Verilog, ARM Assembly
- **Tools:** Jenkins, MATLAB, Quartus, ModelSim
- **Other:** Git, MongoDB, Flask, HTML/JS