

Zenghao Wang

3RD YEAR COMPUTER SCIENCE · 3.84 / 4 CGPA

Toronto, Canada

☎ (+1) 647-968-0036 | ✉ zenghao.wang@mail.utoronto.ca | 📱 ZenghaoWang | 🌐 zenghao-wang

Education

University of Toronto - St. George Campus

Toronto, Canada

HONORS BACHELOR OF SCIENCE IN COMPUTER SCIENCE, MATHEMATICS, AND CLASSICS

Sept 2018 - May 2023 (Expected)

- **3.86 / 4 CGPA**
- **Relevant Courses:** Operating Systems, Algorithm Design and Analysis, Data Structures, Computer Organization, Advanced Multivariable Calculus, Software Design, Systems Programming, Databases, Software Development
- **Currently: On PEY with Huawei Heterogenous Compiler Labs**

Skills

Languages: Proficient in Python and C, have experience with JavaScript and Java

Other Skills: Git, HTML, React, Concurrency, Systems Programming

Projects

Libfuse Filesystem Implementation

Toronto, Canada

CODE AVAILABLE UPON REQUEST

June 2020 - July 2020

- Designed and implemented a fully functioning filesystem mounted in Linux userspace
- Chose an inode/extent structure based on ext4 for efficient allocation of space
- Designed filesystem to handle arbitrary size and number of inodes

Virtual Memory

Toronto, Canada

CODE AVAILABLE UPON REQUEST

July 2020 - August 2020

- Implemented virtual-to-physical address translation and several page replacement algorithms

Multithreaded Synchronization

Toronto, Canada

CODE AVAILABLE UPON REQUEST

July 2020 - July 2020

- Implemented multithreaded message queue between arbitrary amount of consumers and producers
- Used appropriate synchronization primitives to facilitate proper data transfer and prevent deadlock

Chat Server

Toronto, Canada

CODE AVAILABLE UPON REQUEST

March 2020 - March 2020

- Implemented command-line text server using sockets and TCP
- Implemented functionality to send messages, follow users, and handle partial reads without errors or memory leaks

Probation: Android Minigame Collection

Toronto, Canada

[HTTPS://GITHUB.COM/ZENGHAOWANG/PROBATION](https://github.com/ZenghaoWang/PROBATION)

Sept 2019 - Dec 2019

- Worked in small team to create a collection of minigames for Android devices
- Utilized git effectively to track changes and coordinate workflows
- Used model-view-presenter architecture and design patterns to create maintainable and extendable code

Experience

Huawei Heterogenous Compiler Labs

Markham, ON, Canada

COMPILER SOFTWARE ENGINEER

May 2021 - May 2022

- Designing, developing, and testing software in a wide range of products

Hart House Symphonic Band

Toronto, ON, Canada

WEBMASTER - [HTTP://HHSB.SA.UTORONTO.CA](http://hhsb.sa.utoronto.ca)

July 2020 -

- Maintaining and updating website for UofT extracurricular musical ensemble - HTML, CSS, and SFTP

K12 Building Blocks

Aurora, ON, Canada

PROGRAMMING INSTRUCTOR

July 2019 - August 2019

- Taught students ages 7-13 the basics of python and scratch
- Simplified programming concepts such as functions, variables, and loops in a friendly, intuitive, and approachable fashion
- Inspired several students to take an interest in programming by creating games and practical programs