Maxwell Cruickshanks

Waterloo, ON, Canada

maxcruickshanks · in maxcruickshanks · # maxcruickshanks.site

Skills

Java, C++, Python, SQL, JavaScript, HTML, CSS, LATEX, Git, Unix

Education

University of Waterloo

Sep 2022 - Apr 2027 (expected)

Bachelor of Computer Science, Honours – Al Specialization

Waterloo, ON

- Cumulative GPA: 95.70% / 4.0 GPA
- Recipient of President's Scholarship of Distinction
 - Scholarship for an admission average of 95% or higher

Work Experience

Untether Al

May 2023 - Aug 2023

Compute Kernel Software Engineering Intern

Toronto, ON

- Shrunk the local database by 97.5% and improved data organization to ease development
- · Developed programs for a custom spatial architecture while using the RISC-V instruction set
- · Deployed and integrated PostgreSQL database with REST API in TeamCity CI/CD to store statistics about network performance and track regressions
- · Added debugging information to failed CI tests that checked for patterns in failed outputs
- · Optimized and tested compute kernels for common machine learning layers (like convolution, upsample, NMS)
- · Developed Python developer tools for creating compute kernels more efficiently
- Technologies used: Python, C++, SQL, Git, Unix

Centre for Education in Mathematics and Computer Science

Dec 2022 - Present

Canadian Computing Competition Committee Member

- Developed and proofread problems for the Canadian IOI selection contests (CCC/CCO)
- Technologies used: LATEX

DMOJ: Modern Online Judge

May 2021 - Present

Site Moderator

- · Added 1000+ problems, ensured consistency across the problem set
- Organized and set 10+ contests, each with 100+ contestants
- · Proofread contest problems for inconsistencies, grammatical errors
- Continually updated test data to prevent unintended solutions from passing
- Responded to contest tickets, ran integrity checks on contests
- Technologies used: Python, C++, LATEX

Contests and Awards

LeetCode - maxcruickshanks

Peak rating of 2800+, 200 out of 420 000 users (top 0.05%)

Canadian Computing Olympiad 2021 - Bronze Medalist

· Placed in the top 40 out of 2920 contestants in the Canadian Computing Competition to qualify

Personal Projects

Discord Bot (Using aitextgen)

maxcruickshanks/discord-bot-aitextgen

• Discord bot using Java that can generate text from trained messages with Python and aitextgen maxcruickshanks/Dynamic-File-Storage

Support peer-to-peer encrypted file transfer on LAN using Java

Paint++

maxcruickshanks/Paint

· Drawing tool similar to Windows Paint with an infinite grid and navigated with WASD using Java