James Li

Mechatronics engineering | University of Waterloo | j2668li@uwaterloo.ca | 647-206-6929 | LinkedIn | GitHub

Qualifications

- Familiar with the following programs and software: C++, Python, SQL, HTML, CSS, JavaScript, GitLab, Excel, MS Office, AutoCAD, SolidWorks, Confluence, Slack, GitHub, Replit.
- Participated in the University of Toronto Space Design Competition as well as the 2022 Waterloo
 Engineering Competition where I used my resourcefulness and collaboration skills.
- Strong **problem-solving skills** from previous working experience in an IT position.
- Keen eye for detail from **testing** and fixing code in various school and side projects.
- **Self-motivated** and able to learn and work consistently by myself without supervision.
- Experience with **soldering** on PCBs and joining wires from fixing dead monitors.
- Not afraid to ask questions and always looking to improve and learn from my mistakes.

Projects

Personal Portfolio Website

Oct 2022

- Designed a personal portfolio website using HTML, CSS, and JavaScript.
- Implemented **mobile responsiveness** to gain experience with HTML and to improve user experience using **2** sets of font sizes and picture resolutions depending on window size.
- Gained experience with diagnosing and troubleshooting code in VSCode and using GitHub.

Scissor Car Jack Assembly

Sept 2022

- Designed **6** parts for a scissor car jack in **SolidWorks** with reasonable dimensions and size.
- Attached all 6 parts together in an assembly to model and test the functionality of the car jack.
- Used 2 different types of nuts and bolts to properly model how these fasteners are used in a real-life.

Tic-Tac-Toe Robot

Dec 2021

- **Designed** a robot that can play tic-tac-toe using 4 different sensors and taking user inputs from two players.
- Worked as a team of 4 to build the robot as well as prepare a presentation to demo the robot in front of a TA.
- Worked independently to **test** and **debug code** to ensure robot was fully functional and intuitive to use.

Work Experience

Computer Support Assistant - University of Waterloo

May 2022 - Aug 2022

- Assisted in the **development** and **installation** of the deployment software for the computers used in the ECE department which includes installing operating systems.
- Received, delivered, and installed various technologies purchased by professors and graduate students.
- **Programmed** and **implemented batch files** on Windows to **troubleshoot** and solve various issues and errors encountered during deployment.
- Frequently used **multitasking skills** to work on up to 8 computers at once to maximize efficiency.
- Proficiently used power tools to install or remove any computer related hardware or electronics.

Personal Tutor - Teenage Tutors

Nov 2019 – Sept 2020

- Tutored and developed connections with four children in a year period to help teach and strengthen their understanding of Math and French and allow me to strengthen my ability to communicate and share my knowledge.
- Taught one-on-one sessions 1 to 2 times per week per person.

Education

University of Waterloo, ON, CA, Pursuing BASc in Mechatronics Engineering

- University of Waterloo President's Scholarship (above 90% gr12 average)
- Earned Highschool Core French Bilingual Certificate

Interests

• My interests include playing volleyball and basketball, working out at the gym, and cooking.