

Michael Huang

1-236.996.4848



Surrey, BC, Canada

Work Experience

Full Stack Software Engineer

GrainFox 10/2022 – Present

- Developed industrial Agri-Tech software solutions serving over 3000 users following a Scrum framework.
- Decreased system down time and bug-fix turnaround time by up to 90% through integration of system cloud monitoring.
- Implemented and maintained 5+ email templates responsible for delivering thousands of customized newsletters updates.
- Developed, and improved 25+ Agri-Tech and Fin-Tech related software systems, features, and custom components.
- Developed and executed 100+ test procedures to ensure system stability on both the frontend and backend.

Robotics Developer

MapaRobo 10/2021 – 03/2022

- Spearheaded the creation of a cross platform app to provide users with an interface for robotic localization.
- Established local connection between app and robot to enable remote control capabilities via WebSocket.
- Worked closely with project manager, developers, and engineers to refine project requirements based on user story.

Control Engineering Co-op

Ballard Power Systems Inc. 01/2020 – 08/2020

- Designed and implemented control strategies to improve automation capabilities of Industrial Fuel Cell test stations using SCADA systems.
- Improved sensors and database server connection reliability to increase system performance and stability.
- Upgraded control system architecture, tuned systems, configured firmware, and performed analysis to improve facility wide performance.

Robotic Instructor

Sticks and Stars Program 06/2016 – 07/2017

- Instructed classes of up to 30 students in the application of robotics through interactive project-based group programming sessions.
- Mentored 5+ teams simultaneously to meet demanding project deadlines in a competitive environment.
- Engaged students by capturing their passion for technology to be focused into a positive pursuit in an extracurricular setting.

Skills

Specialties

Googling, GUI/HMI, software development, system design, testing, debugging, simulation

Languages

Python, JavaScript, SQL, HTML/CSS, Markdown, PowerShell, Bash, G, MATLAB

Frameworks / Libraries

Vue.js, Next.js, React Native, Django, Tailwind CSS, Jest, Framer Motion, Pandas, NumPy, Matplotlib, Scikit-Learn, TensorFlow, Selenium, Playwright, NLTK, ROS

Software / Tools

GitHub, Docker, Datadog, Confluence, Jira, Google Maps / Cloud Platform, Firebase, SendGrid, Netlify, Notion, WordPress, Discord, ChatGPT, LabVIEW, CAN, SCADA, SOLIDWORKS, Windows, Linux

Hardware

Beckhoff, Omega, Siemens, Arduino, Raspberry Pi, I2C, CAN, SPI, UART

Education

BASc Mechatronic Systems Engineering with Computer Science Minor (Artificial Intelligence)

Simon Fraser University 10/2021

- Siemens Mechatronic Systems Assistant Certifications
- Co-operative Education degree designation

HTML, SQL, C, C++, C#, Java Certifications

SOLOLEARN 11/2019

Extracurricular Experiences

Vice President -> Executive

SFU-S Badminton Club 09/2018 – 11/2021

Technical Mentor

Technovation Girls 12/2020 – 04/2021

Consulting - 2nd place

SFU Engineering Competition 11/2020

MSE Student Body Year Representative

MSE Student Society 09/2018 – 09/2019