Christopher Chen

604-618-9712 | christopherchenpatrick@gmail.com | mywebsite

Education

University of British Columbia Vancouver, BC

Major in Computer Science, Bachelor of Science — GPA: 4.1 *Expected Graduation May 2027*

- Calculus I/II/III (Average 88%); Program Design (94%); Computation Models (89%); Software Construction (93%); Data Structures and Algorithms (87%); Operating Systems (83%)

Experience

Software Engineer Intern January 2025 - September 2025

Jostle - AI Service Team *Vancouver, BC*

- Built developer **tool to benchmark RAG-based AI service quality,** executing **2k+** RAG queries per run, evaluating response quality using **OpenAI Embeddings**, **Amazon Bedrock**, and **Google Gemini**.
- Implemented **interactive front-end dashboard** generating reports with visual analysis and **query-able datapoints**, supporting **20+ developers**.
- Developed and scaled end-to-end automation suites in Selenium, integrated with Jenkins, raising test pass rates from **82%** to **93%+** across **500+** cases.
- Built an **AI localization tool** using LLM and embedding models to generate and validate translations across web-app.
- Diagnosed and monitored issues in production and testing servers using Sumo Logic, OpenSearch, MongoAtlas.
- Improved and maintained **GitLab pipeline scripts** for branching repos and deployment of monolith build to AWS.

Projects

Basketbot - Produhacks 2024 Winner | *Python, OpenCV, PyAudio, VOSK Speech Recognition, TensorFlow, Keras 3*

- First place at **Produhacks 2024** (50 teams).
- Developed **basketball score-counting tool** that recognizes objects with **OpenCV** image processing, including contour and colour detection thresholds.
- Implemented **speech recognition** with PyAudio and VOSK library for score controls.
- Built **CNN** for net detection model using **TensorFlow Keras**, and collected limited training data.

Mindful Motion - HelloHacks 2023 Winner | *Python, OpenCV, Pandas, Flask, Flask-SocketIO, HTML, CSS*

- First place at **HelloHacks 2023** (200 participants).
- Developed a motion detection rep counter and yoga pose corrector
- Wrote backend program tracking real-time user motion by webcam, using image-processing techniques with **OpenCV**.

Ski and Snowboard Tracker | *Java, JUnit, JSON, Java Swing*

- Designed and developed a functional Ski and Snowboard trail tracker in Java that maps mountain trails in British Columbia and displays user statistics.
- Created a graphical user interface using **Java Swing** allowing users to input and view data intuitively.
- Utilized JSON file format to establish **Save/Load Functionalities** to store players data.

Technical Skills

Languages: Java, Python, C/C++, JavaScript, HTML, CSS, SQL
Frameworks/Libraries: OpenCV, Pandas, JUnit, JSON, Selenium
Developer Tools + Platforms: Git/GitHub, GitLab (Pipelines), Jenkins, Jira, AWS, MongoDB Atlas, Sumo Logic, OpenSearch, Blender, Godot