Christopher Luey

christopherluey@gmail.com | linkedin.com/in/chrisluey98 | github.com/chrisluey | chrisluey.vercel.app

Experience

Software Engineer, Seron Electronics – Vancouver, BC   June 2022 – Present
- Constructed a full-stack **Electron** and **Vue.js** companion app allowing entrepreneurs and researchers to generate, control, and visualize electrical waveforms for research and development
- Implemented and optimized a two-way streaming protocol between the desktop app and a microcontroller, reducing data latency by 90%
- Enhanced a **C++** state machine library with new firmware commands, resulting in improved command handling efficiency
- Optimized inline automated **Python** testing for a programmable power supply, improving testing speed during distribution by 10x
- Engineered a **Java Android** application providing students with a compact solution to generate and measure electrical waveforms at up to 48,000 points per second
- Utilized **Firebase Authentication** and **NoSQL** databases to integrate account management and session handling into the mobile interface
- Ensured desktop cross-platform compatibility while developing on a full-stack application
- Employed multithreading in these various applications to ensure a seamless user experience with efficient backend operations

Software Engineer Intern, Craver Solutions – Vancouver, BC   Apr 2020 – Dec 2020
- Developed a **React.js** feature end-to-end that allows customers to choose a nearby location to pick up food using GPS coordinates
- Linked payment integrations with Square, Stripe and Toast APIs and delivery integrations with DoorDash, Uber Eats and Postmates APIs for customer and restaurant usage in the Craver desktop ecosystem
- Improved back-end **JavaScript** logic to prevent order data loss
- Generated and executed **XML** queries with **Java** to ensure safe production **MySQL** schema updates

Software Engineer Intern, One45 (Acquired by Acuity Insights) – Vancouver, BC   Sept 2018 – Apr 2019
- Delivered an educational report output system using **PHP** and **AJAX** providing hundreds of medical students with an organized and user-friendly way to view their medical exam results
- Re-integrated a legacy **JavaScript** page into our automated **JUnit** testing framework
- Mentored an intern with onboarding and coding advice for numerous project tasks
- Debugged production issues with **Jenkins** unit tests, improving test reliability and CI/CD pipeline stability

Education

University of British Columbia – Bachelor of Science in Computer Science   Sept 2016 - May 2022

Skills

Languages: JavaScript, Python, C++, Java, PHP, MySQL, NoSQL
Frameworks: React.js, Vue.js, Node.js, JUnit, Electron, AJAX, OpenGL, Expo
Developer Tools: Git, Firebase, Jenkins

Projects

Avoid the Virus Game | *C++, OpenGL*   https://github.com/chrisluey/avoid-the-virus
- Created a 2D platformer/turn-based RPG hybrid game using native **C++** and **OpenGL** on a team of 5
- Implemented a game state manager to manage JSON-represented game units' positions

Trans Name Generator | *React.js, Expo, Node.js*   https://github.com/ahon54/Name-Generator
- Implemented a **JavaScript** mobile app that suggests names for people transitioning given the phonetic spelling of their previous name
- Implemented a sort based on the Levenshtein distance between word pronunciations to optimize searching for names with phonetic similarity