Hansson Lin

HanssonLin.me
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Skills

Languages	Java, C++, C, JavaScript, Python, SQL, HTML, CSS
Frameworks	Spring, Node.js, React, Angular, JUnit, RobotFramework, Selenium
Tech & Tools	MongoDB, PostgreSQL, AWS Lambda, API Gateway, DocumentDB, Git, Gradle, Maven, Postman

Experience

Ford Autonomous Vehicles — *Cloud Computed Autonomous Driving Solutions*
Software Engineer Intern

Remote
Sept 2020 – Current

- Worked on Mode Management; handles mode change requests/responses *asynchronously* for AV Cloud-Native Platform
- Engineereed security validation service using **AWS Lambda**, **API Gateway**, and **MongoDB**, to block *fraudulent* requests to *cut business overhead* costs
- Implemented notification service to update admin users of blocked requests, using **AWS SNS**, to facilitate *protected* overriding of stopped requests, *reducing* downtime for end-users
- Designed *multi-tenancy architecture* for all security services, enabling *thread safe* handling for *concurrent* API requests
- Ensured unit, integration, and functional test coverage for all security services using **JUnit**, **Cucumber**, **Robot** and **Selenium**
- Currently designing *machine learning algorithm*, trained with *supervised learning* using user tendency history, to continuously adapt criteria for *fraudulent* request detection

PointClickCare — *Cloud-Based Healthcare Software*
Software Engineer Intern

Toronto, ON
Jan 2020 – April 2020

- Worked on cloud-platform's Financial Management module; tasked with billing and payments
- Created new transaction type *End-End feature* for cash app, providing *1.4+ million* active clients a new channel for billing
- Integrated platform-wide support for new transaction type with **Microsoft SQL Server** and **Spring**, enabling cross-compatibility for Financial Management operations on *~100 million* yearly transactions

Inetco Systems — *Real-Time Transaction Monitoring and Analytics*
Full Stack Developer Intern

Burnaby, BC
May 2019 – August 2019

- Worked on Insight, a software platform to monitor transactions in real-time; used **Angular**, **RxJS** and **Nvd3**
- Built new *type-enforced* JSON-to-Object mapper library for transactions data handlers, decreasing page load times by *30%*
- Designed a new transaction data model schema, increasing data process speed from *50+* API request endpoints

Projects

Simpli-Fly — *Python, C, Arduino, Leap Motion* 🎖
Hack The North 2018 Winner

devpost.com/software/simpli-fly

- A program that enables a drone to be flown using hand gestures, Won CANSOFCOM *1st-place prize at Hack The North* 2018
- Transmitted live motion data from PC running **Python** to on-board **Arduino** through *Bluetooth* using PySerial
- Used Leap Motion controller to transform hand motion vectors to Pitch, Roll, Throttle values

Education

University of Waterloo • Software Engineering
Pursuing B.S.E. Software Engineering — Last Term Average: 92%

Waterloo, ON
2018 – Present