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seanlee98



in seanlee98

# **Education**

# University of Waterloo

Honours Computer Engineering

Graduating May 2020

# Coursework

Programming **Fundamentals** 

Algorithms & Data Structures

**Embedded Systems** and Design

Digital Computers

### Skills

# Languages

Java

C++

Javascript

PHP

### Web Development

HTML5

CSS<sub>3</sub>

Laravel5

### **Tools**

Git

Subversion

Google APIs

Android SDK

Alexa Skill Kit

# Visit my website to learn more!

# seanlee.me

# **Professional Experience**

IT User Support Assistant TMS School (Sept 2016 - Dec 2016)

- Provided 1st level technical support to end users using TMS hardware and software, including break-fix, troubleshooting, diagnosis, repair, and training
- Modified Local Group Policy Editor (MMC) to accommodate classroom and examination needs
- Monitored network infrastructure and firewall (TCP/IP) to maintain bandwidth and wireless access to end users

### Computing Assistant University of Waterloo (Jan 2016 - Apr 2016)

- Administered students, faculty, and staff within the Faculty of Arts with computing accounts, computer lab and printing access, and technical support
- Utilized HTML/CSS and PHP with Laravel 5 framework to develop CALMS; a new platform that will migrate local data files (hardware assets) into the cloud for efficient storage and application.
- Reformatted Windows/OSX firmware with updated software, scheduled appointments with Faculty and Staff, and deployed new machines for Staff Rollover and lab upgrades

# **Projects**

#### PathFinder Java/Android SDK

- Android application that displays user movement and navigational directions on an SVG diagram
- Utilized Android Sensors API and finite state machines to generate a step/direction detection algorithm
- Implemented high pass and low pass filters to attenuate frequency signals, resulting in < 5% error in output data
- Used A\* search algorithm to find path between origin and destination

## Green Tips Javascript/Amazon Echo ASK

- Developed custom Alexa skill that is triggered by user invocation to deliver sustainable environmental solutions, all pulled from a randomized series in custom MySQL database
- Worked on back-end development to create JSON Intent schema and AWS Lambda function logic
- Created in less than 12 hours at Electric City Hacks 2016

### Speech 101 Java/Android SDK

- Recorded voice input through built-in speech recognition (Google textto-speech API) and parsed through converted text to obtain various assets
- Refined public speaking approach by highlighting "filler" and frequently used words utilized throughout the speech

## **Interests & Activities**

Consumer Smartphones, Hackathons, Virtual Reality, Artificial Intelligence, University of Waterloo Orchestra (Trumpet), Powerlifting, E-Sports