

Jonny Li

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Education

University of Toronto

Expected Graduation Jun 2021

Honours Bachelor of Science, Computer Science and Linguistics.

Employment

SDE Intern - Amazon @ VirtualLocation

Jun 2020 - Sep 2020

- Participated in 12 week internship on **Amazon Core Search, Client Services Engineering** team.
- Developed **Search Engine Configuration Dependency Analyzer**, a dev tool to analyze search engine config metadata.
- Utilized Amazon internal package building systems and development environments.
- Participated in weekly team meetings and utilized tools like **Kanban** to communicate progress with team.

Software Intern - Mitsucari @ Tokyo, Japan

Sep 2018 - Aug 2019

- Assisted in development of [mitsucari](#), a startup web service to analyze compatibility of current/prospect employees within a company using personality tests.
- Implemented front and back end components with **Ruby on Rails, PostgreSQL, jQuery, Bootstrap, SASS**.
- Wrote **design documents** for features such as site-wide messaging system and implemented front/back end components.

Projects

Search Engine Configuration Dependency Analyzer @ SDE Intern, Amazon

Jun 2020 - Sep 2020

- Created an internal **Python** tool to return the dependency chain of any given search engine configuration metadata object.
- Implemented **DFS with memoization techniques** on dense dependency graph of 20,000+ metadata objects and millions of dependency relations.
- Conducted manual analysis on metadata to determine relevant dependencies of each object.
- Devised efficient methods to store large program output as JSON objects in **Amazon S3**.
- Contributed to ongoing effort to clean up unused search metadata with actual results from tool.

jp-bot

Apr 2016 - Dec 2019

- Created and developed a [Discord](#) chat bot written in **Python** and deployed on **Heroku**, for Japanese language learning.
- Implemented web scrapers for online dictionaries using HTML parsing libraries such as **lxml**.
- Implemented server moderation features to keep track of punished/banned users utilizing **MongoDB**.
- Created a website to display server statistics using data from **MongoDB** and front/back end in **PHP/JavaScript**.

uoft-scheduler @ Hack the North 2016

Sep 2016

- Created a scheduling dashboard web app for University of Toronto students at **Hack the North 2016**.
- Designed and implemented front end interface with **Bootstrap** and **jQuery**.
- Implemented back end with **node.js** and data from **Google Maps API** and web-scraped data from UofT website.

Activities

Foreign Exchange - USTEP @ University of Tokyo

Sep 2018 - Aug 2019

- Participated in University-wide Student Exchange Program (USTEP) at University of Tokyo for one year.

Webmaster - University of Toronto Japan Association @ University of Toronto

Oct 2016 - Aug 2018

- Utilized **Wordpress, JavaScript** to manage website.
- Organized culture festivals and language exchanges to promote exchange between Japanese and Canadian students.

Workshops Lead - Neurotech UofT @ University of Toronto

Sep 2017 - Apr 2018

- Created beginner-oriented tutorial workshops such as intro to programming (**Python**) and version control (**Git**).

Languages and Technologies

Python JavaScript Ruby on Rails PHP Java C# Full Stack Web Development SQL