Lichen Ma

✉ l67ma@edu.uwaterloo.ca • in linkedin.com/in/lichen-ma • ⌂ github.com/lichenma

Skills

Technologies / Spring, NodeJS, Express, AngularJS, React, Android Studio, Git
Languages / Java, JavaScript (ES6), C, C++, Python, SQL, Kotlin, HTML5, CSS3

Experience

Back End Engineer *Intersect*   *Sept - Dec 2019*
Ruby, Rails, Java, Spring, Git, JIRA   *Toronto, ON*

Full-Stack Developer *HubHead*   *Jan - Apr 2019*
Java, Spring, AngularJS, PostgreSQL, Groovy, Git, MVEL   *Markham, ON*

- Developed the full-stack implementation for a duplicate workflow detection service on a cloud based multi-user application, **eliminating back-end errors** resulting from user input overlap
- Added client-side and server-side data validations for an Asset Management web service using **MVEL** and **SQL**, ensuring compliance with SAP masterdata standards
- Designed a SQL optimization job using Obsidian Job Scheduler, periodically removing unused database entries and **reducing process list load times by 20%**

Wireless LAN Engineer *Extreme Networks*   *Apr - Aug 2018*
JavaScript, Postman, Newman, Bash, SwaggerIO   *Markham, ON*

- Automated REST API regression testing by creating Postman workflows to generate requests and JavaScript Assertions to perform validations, **shortening the verification process by 60%**
- Managed the verification process for all user profile API endpoints, **eliminating back-end vulnerabilities** resulting from improper server-side validations

Software Engineer *Toronto Water*   *Sept - Dec 2017*
Python, NumPy, pandas, Microsoft SQL Server   *Toronto, ON*

- Automated the generation of Asset data analytics using **Python** for data preprocessing and analysis, **shortening the asset report generation process by 80%**
- Developed and maintained a database of company assets using **Microsoft SQL Server**, streamlining the data retrieval process and saving the server team 10 hours / week

DevOps Engineer *Toronto Water*   *Jan - Apr 2017*
TCP/IP, Routing/Switching, Cisco CLI   *Toronto, ON*

- Architected a network design including **IP addressing** and **security architecture** to provide network access to Power Distribution Units located in the company's datacenter

Projects

10Minutes - Android Kotlin Application
Kotlin, Android Studio, Java

- Developed a countdown timer application designed to control user phone usage inspired by the 10 minute-delay rule in **The Willpower Instinct**
- Designed the application implementation featuring **preference utility** streak counters, background functionality driven by **intents** and **broadcast receivers**, and push notification support using **Notification Utilities**

Education

Candidate for Bachelor of Applied Science in Computer Engineering   *2016 - 2021*
University of Waterloo   *Third Year*