Pearl Guo . Jarvis Consulting

Hi there! I am a recent graduate of University of Waterloo with a Bachelor's degree in Computer Science. During my school time, I developed a thorough understanding of data structure and algorithms. I enjoy being challenged and engaged with projects that require me to work outside my comfort zone and knowledge set, as continuing to learn new development techniques and skills are important to me. I am an independent worker with limited supervision needed and meanwhile a collaborative team player. While I am free, I like to go hiking and reading.

Skills

Proficient: Java, Bash, SQL, Agile/Scrum, Python, HTML/CSS, OOP, Git, Linux

Competent: Docker, SpringBoot, JDBC, Google Cloud, Maven, JUnit

Familiar: C++, C, Jenkins

Development Projects

Project source code: https://github.com/jarviscanada/jarvis_data_eng_pearl

- **Cluster Monitor**: Developed an internal tool to record hardware specifications and track server node usage for Linux cluster administrator team using bash scripts. Collected the usage data leveraging PostgreSQL and generated report for further planning purpose.
- **Core Java Apps**: Programmed a JavaGrep program that is similar to Grep with Java Stream Api. Programmed JDBC by implementing a Data Access Object (DAO) pattern that leverages Data Transfer Object (DTO) to transfer the data between different classes and performs CRUD (create, read, update, delete) operations on DTOs. Programmed a Java app which can post/show/delete Twitter post via Twitter REST API.
- **SpringBoot App**: in-progress
- **Cloud & DevOps**: Not started
- **Hadoop**: Not started
- **Spark/Scala**: Not started

Professional Experiences

Associate Data Engineer, Jarvis, Toronto (2020-Present): Working on projects which includes cloud, DevOps, Java, Hadoop & Spark. Performing the duties of scum master in agile based team projects to ensure team cohesion, collaboration, and overall success.

Quality Assurance Intern, Genesys Lab, Markham (2016-2016): Implemented an end-to-end test automation environment and improved visibility of quality and progress using Jenkins. Involved in developing an in-house automation framework which enabled to automate 95 percent of test cases, provided a highly reliable result and reduced the duration of a full regression test cycle.

Network Automation Developer, Blackberry, Waterloo (2016-2016): Designed, developed and maintained an internal automation tool called gdt which assists in installing all dependency packages on all platforms. Migrated a MySQL Database to a PostgreSQL Database and maintained internal Device Databases. Implemented custom network monitoring tools for production networks and created custom reporting solutions for internal network systems.

Bioinformatic Software Developer, McMaster University, Hamilton (2015-2015): Designed, developed and maintained an internal software called Resistance Gene Identifier (RGI) which detects possible resistance genes to drugs using **BLAST** and **BioPython.** Designed a new project called Glycopeptide Resistance Prediction (GRP) using RGI which detects inducible system of gene expression. Improved and maintained Broad Street Database utilizing **PostgreSQL.**

Instructional Support Assistant, University of Waterloo, Waterloo (2014-2014): Led tutorials and held office hours, assisted students in understanding course concepts, and performed evaluations.

Education & Academic Projects

University of Waterloo (2013-2019), Bachelor of Computer Science, Computer Science, Bioinformatics option

- **Quadris:** Wrote a game very similar to Tetris in C++ leveraging Observer Pattern, except it is controlled via text commands.

- **Network Simulation program:** Wrote a program in Python that simulate both TCP and UDP socket programming in a client-server environment. Write a protocol that should be able to handle network errors such as packet loss and duplicate packets in order to send files to receiver over unreliable network.