

Joshua Chang

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SKILLS

Languages: Java, Python, C++, R, SQL, JavaScript, HTML/CSS, BASH

Tools and Frameworks: React, AWS, Docker, Kubernetes, Helm, Datadog, Terraform, Jenkins, Git

EXPERIENCE

Site Reliability Engineer | The Globe and Mail

Sept 2022 – Present

- Migrated **10+ AWS Aurora dashboards** from AWS Cloudwatch to Datadog, collecting **50+** metrics of key health and performance indicators to reduce costs and resources
- Created monitoring and alerting for **2500+ daily AWS Kinesis** queries to catch **30+** anomalies by creating a Datadog metrics monitor provisioned using **Terraform**
- Organized and maintained Datadog dashboards and monitors for **100+ tools and services** to ensure ease of use, reducing navigation times by **75%**

Project Manager | University of Waterloo Product Management Club

August 2022 – Present

- Conduct **market research** and **communicate with stakeholders** to create new initiatives to help UW PM's mission to help grow and foster the product community at the University of Waterloo
- Create new features and provide **POCs** of the UW PM **React** web application and **delegate tasks** for developers and designers to ensure the team is on track for success with no blockages

DevOps Engineer | SAP Pioneer

January 2022 – April 2022

- Upgraded **Jenkins** production server and associated plugins to address security and vulnerability issues, while also **increasing job performance build times** and **CI/CD pipelines** by **15%**
- Worked with SAP Insurance software service codebase to upgrade **Log4J API**, finding suitable solutions for deprecated functionalities and customizing the API implementation to be compatible with various plugins and supporting APIs
- Created a BASH shell script to **automate** the process of **backing up SQL databases** to populate Nexus repositories, reducing the amount of manual labor spent by **85%**

PROJECTS

NHL Stat Tracker 🔗

Python, Jupyter Notebook

- Created a webapp with **Streamlit** to display regular season statistics of NHL teams and skaters, providing **key performance indicators** that contribute to team success
- Collected, cleaned, and filtered 3k+ rows of data using **Pandas** and **NumPy** to provide graphic analytical insights using **Matplotlib** and **Seaborn**

Volleyball Statistics Program 🔗

Java

- Developed an application to track offensive and defensive statistics of players and the team, supplying **analytical feedback** to athletes and coaches to achieve success in future matches
- Implemented a **GUI** to enhance user experience, displaying average scores and percentages of each statistic using **OOP, Methods, and ArrayList/Array Manipulation**

hy-bird. 🔗

Java, XML, JSON

- Collaborated with a cross-functional team using Git to develop an app using **Android Studio** that eases the transition for employees from home to office, **streamlining the hybrid work environment**
- Created a functional login and user dashboard with an integrated OpenWeather API, **parsing JSON data** to display the 5-day weather forecast according to city location entered by the user

EDUCATION

University of Waterloo

Waterloo, ON

Candidate for Bachelor of Applied Science in Systems Design Engineering 2021-2026

- Relevant Coursework: Data Structures and Algorithms (C++), Human Factors in Design