Christopher Cliff

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Technical Skills

Languages/ Frameworks: Python, Java, Rust, Ruby, C++, C#, TypeScript, SQL, Node.js, React, LangChain
Developer Tools: AWS, GCP, Azure, Git, OpenShift, Kubernetes, Docker, Heroku, MySQL, Unity, Redis, Clusterfuzz

Technical Work Experience

Generative AI Platform Engineer June 2023 – October 2024
RBC (Royal Bank of Canada) *Toronto, ON*

- Developed, deployed, and brought to production a platform to expose LLMs for enterprise use, using Python, FastAPI, and frameworks such as LangChain, which over 100 internal teams have utilized.
- Using NLP methodologies to fine-tune NER and BERT-based models to detect and obfuscate PII, and prevent proprietary source code leakage.
- Designed a variety of usage-tracking APIs and an accompanying Angular application developed with internal libraries to display real-time usage metrics and aid in diagnostics for the LLM platform.

Amplify Software Developer May 2022 – August 2022
RBC (Royal Bank of Canada) *Toronto, ON*

- Inventor on patent filed by RBC: *US20240070771A1, "System and method for applying user data in accessing of institutional products."*
- Outlined and architected a comprehensive system to ensure robustness and scalability, and deployed a React front end with 4 dockerized associated Node.js microservices using OpenShift.
- Pitched the final product to a team of senior executives in a conference format, and won the best teamwork award.

Software Developer Intern May 2021 – December 2021
NetApp *Vancouver, BC*

- Was given full responsibility as a key stakeholder as part of StorageGRID to design and develop a full stack solution involving Bash scripting, Ruby REST APIs and back end, and an Angular front end for a client-requested feature.
- Was responsible for mentoring a new co-op student, and guiding them through any issues they faced.

Coop Software Developer January 2020 – August 2020
Incognito Software Systems *Vancouver, BC*

- Created automated regression tests using Java and Selenium, leading to a 30% reduction in total testing time.

Research Assistant May 2019 – August 2019
University of Alberta *Edmonton, AB*

- Researched and compared the A.I. entrepreneurial ecosystems of Edmonton and Vancouver - acknowledged in the paper: *A New Tool for Policymakers: Mapping Cultural Possibilities in an Emerging AI Entrepreneurial Ecosystem*.
- Created an autonomous database scraper using Python to download millions of lines of data and parse the results.

Projects

HSBC Team Vision | *Node.js, React, AWS Lambda, DynamoDB* January 2022 - April 2022

- Worked with a team of seven to deliver an end-to-end solution for providing a virtual office meeting platform based on specifications provided by HSBC, and was selected by HSBC as the solution they would use internally.
- Designed and developed a serverless application using AWS Lambda and DynamoDB, that was managed and deployed using AWS SAM and CloudFormation.

One Giant Leap - Lunar C&C | *C#, .NET Blazor, Azure* September 2021

- Developed a .NET Blazor utilizing Azure services, alongside CosmosDB to provide a real-time command and control application designed specifically for use on extra-planetary missions as part of the NASA Space Apps Challenge.
- Winner of the local Vancouver-based competition, and received an honorable mention in the global judging round.

Education

University of British Columbia Vancouver, BC
Bachelor of Science, Computer Science with Distinction, Co-op Program *May 2023*

- Dean of Science Scholarship