Andrew Lin

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Technical Skills

Languages: C/C++, Java, Python, HTML/CSS, JavaScript, Golang, C#.Net, Groovy

Developer Tools: Git, MongoDB, PostgreSQL, Jmeter, Virtual Box, Selenium, JIRA, Azure Devops Technologies/Frameworks: React, Node.js, Express.js, Socket.io, Django, PyGame, Ncurses, MFC, NuGet

Experience

Rocscience Sept. 2022 - Dec. 2022

Software Developer

Toronto, Ontario

- Utilized C++, MFC, and Codejock to implement an updated ribbon bar consisting of buttons, dropdown buttons, and an updated combobox component onto Settle3, their MFC desktop application, for product release
- Documented over 30+ frontend changes for future UI updates for all Rocscience's MFC desktop applications
- Worked with the product team and the UI/UX team to bring 20+ UI/UX improvements to Settle3
- Converted common core desktop application, file name assistance, and registry classes into NuGet Packages, simplifying the codebase and improving code maintainability
- Created and integrated Resource DLLs for MFC applications to support sharing of resources, an added a unique string ID system for context sensitive help support

OpenText Jan. 2022 – May 2022

Software QA Automation Developer

Waterloo, Ontario

- Developed automated tests to test REST APIs using Jmeter, and Groovy scripts to facilitate API response, performance, and load testing for Exceed TurboX, OpenText's Remote Access Software
- Wrote over 30+ test cases for REST API testing to facilitate functional and regression testing for Exceed TurboX
- Developed a TCP and UDP Client/Server console application using Golang and C#.Net for performance statistics
- Created a Golang console application that displays Windows performance counters for performance testing
- Implemented a Python web crawler to simulate web interaction to performance test OpenText's SOCKS client

Monest Dec. 2021 – May 2022

Software Developer

London, Ontario

- Implemented an email sign-up feature using React and Django to save user emails into a PostgreSQL database
- Refactored code into multiple React components, improving code manageability and reusability
- Helped create a mobile friendly website that displays social and environmental data for clothing brands
- Implemented additional REST API methods to query database information for pollution, worker exploitation, and diversity data for clothing brands

InFlight (now Skuid)

May 2021 - Aug. 2021

Quality Assurance Analyst

Kitchener, Ontario

- Experience with manual regression testing, functional testing, black box testing and other testing practices
- Created test plans to test business enterprise systems and job application flows, increasing test coverage by 50%
- Automated testing processes with Selenium to test functional behaviour of job application flows

Projects

My-Chat-App | React, Node.js, Express.js, Socket.io, MongoDB

- Built a web-based chat application using the MERN stack that allows users to chat with other users privately
- Utilized Node.js, Express.js and MongoDB to build a REST API used to query chat information, and used Socket.io for websocket connections
- Implemented user authentication by storing usernames and encrypted passwords into a MongoDB database

ASCII Game Engine | C++, Neurses

- Implemented a C++ game engine to support the creation of ASCII art video games that is able to handle sprite creation, collision handling and rebound physics
- Created the "Google Dinosaur Game" and the "Impossible Game" using the game engine

Breakout | Python, PyGame

- Recreate a simulation of Breakout with an additional multi paddle mode during increased levels
- Implemented collision physics, music, and tracking of high scores using file read and write operations in Python

Education

University of Waterloo