

(801) 541-6884 shawn.boyle01@gmail.com **PORTFOLIO GITHUB** LINKEDIN

SKILLS JavaScript / Python / React / Redux / Node.js / Flask / Express / SQLAlchemy / HTML5 / CSS3 / PostgreSQL / Docker

RELEVANT WORK EXPERIENCE

Junior Software Engineer | Flapmax (Contract)

Nov 2021 - Dec 2021

- Engineered optimization for AI models via FastAPI for RESTful routes to validate the models, then running automated tests on Azure Virtual Machines to measure and optimize output, resulting in improved throughput, latency, and memory footprint, while maintaining accuracy.
- Constructed an intuitive, comprehensive frontend UI through React, allowing clients to upload and optimize models, then displaying data through rendered charts and statistics, providing clients with clarifying data and an enhanced product.
- Integrated Azure cloud storage services for PostgreSQL and MongoDB providing SQL and NoSQL storage, allowing for efficient, flexible data management for our backend API.

L1 Technical Engineer | *Instructure*

May 2020 - Dec 2020

- Assisted admins, teachers, and students over the phone and live chat to resolve 80+ tickets per 20 hour weeks on the Canvas platform, by navigating a thorough troubleshooting process centralized around known bugs and common issues.
- Utilized several internal Canvas technologies and extensions to parse student activity data in JSON, replicate existing bugged environments for testing and debugging, and assist in implementing external API's into virtual classrooms.
- Demonstrated strong communication skills through weekly team and one-on-one meetings by proactively discussing current bugs and outages, setting SMART goals, and requesting feedback to maximize performance.

TECHNICAL PROJECT EXPERIENCE

PROGRAMMATIC | Group Project built with React, Redux, Flask-SQLAlchemy, AWS S3, PostgreSQL, Docker

Live Site | GitHub

- Engineered a visualization of Dijkstra's Algorithm by calculating the shortest path for a weighted graph of nodes, rendering the graph and edges with a React/CSS grid, then animating the traversal and shortest path for an enhanced UI/UX.
- Programmed a fluent search algorithm with **React** to match user queries with comprehensive filtering, returning results utilizing the useLocation hook for accurate DOM rendering.
- Developed a seamless, responsive discussion section for users to read feedback as well as engage in discussion by creating, editing, or deleting their comments utilizing React / Redux to manipulate the front-end dynamically and efficiently.

ZOOLODEX | Solo Project using React, Redux, Flask-SQLAlchemy, AWS S3, PostgreSQL, Docker

Live Site | GitHub

- Integrated Google Maps API for users to explore geographical regions seeded by coordinates.
- Designed a responsive navigation bar utilizing **React** and **CSS** to adjust styling conditionally when the Y coordinate scroll amount of the window object surpasses page image headers, providing a visually appealing UI/UX.
- Constructed a fluent backend Flask-SQLAlchemy server, handling comprehensive validations for user authentication and AWS S3 uploads, then providing that data to the PostgreSQL database, wrapping all data for deployment with Docker.

CRESCENDO | Solo Project utilizing React, Redux, Node.js, Express, Sequelize, AWS S3, PostgreSQL

- Developed a relational database with 12 tables held by PostgreSQL, which I queried on the Node.js backend's Express server with the **Sequelize ORM**, allowing server data to have clarity and accessibility.
- Utilized the audio element to construct a feature-rich, application-wide song player, giving users audio progress and extensive controls over the current playlist, album, artist, or song.
- Formed a cohesive Redux store through efficient API queries, cutting down on server load and resulting in a quick, optimal load time for data rendered on the frontend with **React**.

EDUCATION

App Academy | Full- Stack Web Development

Oct 2021

- Rigorous 1000-hour software development course with <3% acceptance rate
- Topics include: TDD (Test Driven Development), scalability, algorithms, OOP (Object Oriented Programming), coding style, REST, security, single-page apps, pair programming, design patterns, and web development/coding best practices.