

Technologies

Typescript NodeJS Go React SQL MongoDB AWS Git Docker Kubernetes

Key Skills

Problem solving, software design, mentorship, leadership and communication

Interests

Technology, music, travel, fitness, video games

Work Experience [References](#)

Senior Software Engineer, [Flipp](#) | Toronto, Canada, Jan 2021 - Present

- Flipp helps North American shoppers save money by aggregating deals and flyers
- I am working on a greenfield web application enabling Flipp's retail partners design digital flyers, leading the charge in migrating off print flyers towards a digital solution
- Key challenges include initiating and establishing best practices for building a modern SPA with drag and drop interactions: React hooks, Typescript, NodeJS, MobX, Storybook
- Developing backend APIs and microservices to support the SPA and integrating it into the company's network of microservices using Golang, NodeJS, Kafka, AWS and Github Actions
- Mentoring peers on concepts such as functional reactive programming, atomic design, and component testing through presentations, code reviews and documentations
- Critically analyzing existing infrastructure to improve efficiency and developer experience: one POC has resulted in reducing 10K+ LOC scattered across Typescript, Ruby and Golang to sub 500 LOC of Typescript; an instance of improvements to concurrent Go code resulted in 35x improvement to endpoint latency; an instance of data structure refactor resulted in halving the size of the frontend state store

Mentor, [CareerFoundry](#) | Remote, Feb 2022 - Present

- Mentoring the next generation of web developers on soft skills and processes to penetrate and achieve success within the software industry
- Providing technical guidance, assignment feedback, code review, and debug support around a curriculum focusing on the MERN Stack

Full Stack Engineer, [Moonfare](#) | Berlin, Germany, Jan 2020 - Jan 2021

- Moonfare makes investing in private equity easy, currently managing over €2.4 billion in assets
- Developed new features for Moonfare's core web application and taking on the technical challenges to scale the business for a growing client base
- Challenges include designing database models, microservices, and user interfaces in addition to refactoring pre-existing software to improve performance and reduce tech debt
- In one case, I improved endpoint latency by 89% by optimizing asynchronous functions, database queries, and search algorithms

- Mentored fellow developers in algorithms, software design and database management through code reviews, documentation, and educational sessions
- Developed using a Typescript based tech stack with NodeJS, React, and SQL

Full Stack Engineer, [Diginex](#) | Berlin, Germany, Dec 2018 - Dec 2019

- Diginex pioneers blockchain based tools for governments and corporations, working with institutions such as the UN and Microsoft
- I helped develop a cryptocurrency trading platform that aggregates price data and allows algorithmic and manual trading across exchanges
- I worked on internal tools for backtesting arbitrage models using the Bellman-Ford algorithm, load testing, and supporting financial data transfer protocols
- Our tech stack and design principles focused on supporting data streams, analytics, and visualization: Python, Pandas, Postgres, and Redis on the backend, React with RxJS on the frontend, and AWS for encryption and user authentication

Contract Backend Engineer, [ReloTalent](#) | Hanoi, Vietnam, Mar 2018 - May 2018

- Developed a microservice to implement an iterative mathematical model for determining salaries during relocation considering tax rates, cost of living, and personal investments using Python, SQL, and AWS Lambda

Sr. Product Development Engineer, [Advanced Micro Devices](#) | Toronto, Canada, Jun 2012 - Nov 2017

- Led a team of engineers across North America and Asia in developing system level test programs and yield management for AMD Radeon Products: Radeon HD7990, Radeon R9 285, R9 Fury/Fury X/Nano, and the RX Vega 64 Series
- Received two Spotlight awards for contributing to over \$US 900,000 in company savings each

Education [Self study Degrees](#)

- Master of Engineering | University of Toronto, Canada, June 2015
- Bachelor of Applied Science with Honors | University of Toronto, Canada, June 2012