

Mark Toh

SOFTWARE ENGINEER, FULL STACK

☎ (608) 770-4619 | ✉ marktoh96@gmail.com | 🌐 marktoh | in mark-toh

EDUCATION

University of Wisconsin-Madison

BACHELOR OF SCIENCE IN COMPUTER SCIENCE

Madison, WI

Fall 2018

Skills

Fullstack MERN (MongoDB, Express, React, Node)

Frontend JavaScript, HTML, CSS, Redux, Sagas, Leaflet, D3.js, Plotly.js, Jest, Cypress

Backend Node, Python, Go, SQL

Software Heroku, Github, Adobe XD

Experience

DataChat - Dashboard

Madison, WI

SOFTWARE ENGINEER - REACT, REDUX, SAGAS, GO, PYTHON, POSTGRESQL

June 2019 - PRESENT

- Developed a self-service business intelligence cloud dashboard for analyzing, visualizing, and sharing big data.
- Consolidated communication portal by documenting high-level plans on shared technical design documents.
- Provided 360-degree customer views with an automated data collection pipeline and third-party API connectors in Python.
- Streamlined user flow with a clean interface design for creating, editing, saving, and viewing dashboards.
- Bolstered collaborative work by supporting dashboard sharing across customers.
- Established business logic using Go endpoints to manage dashboard connections to a PostgreSQL database.

DataChat - Messenger

Madison, WI

SOFTWARE ENGINEER - REACT, REDUX, SAGAS, GO, PYTHON, POSTGRESQL

Jan 2019 - June 2019

- Developed a web messenger that uses a natural language chat interface for data analytics.
- Established company brand and reduced development time by constructing a custom React component library.
- Successfully conveyed federal level manufacturing information in a geomap using Leaflet.js.
- Expanded market reach to mobile and desktop users by supporting cross-browser data visualizations in Plotly.js.
- Incorporated React-Redux container and Redux selector patterns to architect highly scalable front-end state management that enabled access to messages, charts, and user information.
- Structured asynchronous logic and side effects by applying Redux-Saga middleware.
- Significantly reduced manual labor costs by leading a team of engineers to deliver onboarding software.

DataChat

Madison, WI

SOFTWARE ENGINEER INTERN - REACT, REDUX, SAGAS, GO, PYTHON, POSTGRESQL

May 2018 - Dec 2018

- Modernized look of application by conducting market research, drafting wireframes, and implementing UX/UI designs.
- Polished user experience after tuning through 50 nuances of animation effects.
- Granted users access to store 50gb worth of data using a proper a fullstack file manager in React and Go.
- Save 30% of software development cycle time by engineering an end-to-end test automation framework using Jest and Cypress based on Unit Testing, Regression Testing and Behavior Driven Development (BDD).

Projects

Open Formula 1

marktoh.github.io/open-f1

WEB DEVELOPER - REACT, LEAFLET, FORMULA ONE API, HEROKU

- Developed a web application for tracking circuits across Formula 1 seasons.
- Mapped locations of 1400 circuits across 60 years using React, Formula One API, and Leaflet.

Email Feedback Collector

SOFTWARE ENGINEER - MERN, SENDGRID, OAUTH, STRIPE, HEROKU

- Developed a paid email survey service for collecting user feedback.
- Built using MERN, mongoose, passport.js, and deployed on Heroku.
- Implemented an easy-to-use login system with Google OAuth and passport.js.
- Designed schema and integrated database system using Mongoose and MongoDB.
- Generated revenue by implementing a credit-based billing service using Stripe API.
- Automated email delivery with SendGrid, coupled with webhooks to monitor user feedback.