DAQING (TYLER) CHEN

Minneapolis, MN

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EXPERIENCES

University of Minnesota GroupLens, Minneapolis, MN

May 2025 - Present

Developer

- Migrated recommendation system from Java LensKit to Python Flask for MovieLens.org, implementing similarity scoring algorithms and neighborhood-based prediction models.
- Built dynamic model training pipeline processing 1.6GB user-rating datasets, implementing data preprocessing, feature engineering, and data fetching to ensure high-quality recommendations.
- Conducted A/B testing comparing static pre-trained models vs. real-time training approaches, analyzing recommendation quality metrics to optimize system performance for production deployment.

Shenzhen Gaodeng Computer Technology Co., LTD, Guangdong, China

Jun-Aug 2024

- Frontend Developer Intern
 - Increased profit tracking efficacy by collaboratively integrating third-party APIs into the internal database using Vue.js interface, streamlining the tracking and accessing of toll and profit data.
 - Collaborated with the backend team to adjust the logic and UI of existing sales functionality to better meet business requirements for collecting enterprise risk assessment information.
 - Boosted client engagement metrics by developing a notification feature for the company's WeChat Mini Program (a widely used platform in China), enabling pricing and transaction alerts and increasing transaction tracking efforts.
 - Optimized the UI and component logic for internal and external interfaces, developing and implementing a Vue.js interface to manage partner fuel station logos and names.
 - Coordinated with product managers and key stakeholders to perform in-depth requirement analysis efforts.

University of Minnesota Networking Research Group, Minneapolis, MN

May 2023 - May 2024

Research Assistant

- Utilized Python to analyze 1,711 traceroute files, uncovering data roaming patterns across Germany, Italy, Spain, and France, and identified a distinct data roaming pattern for the France Orange carrier.
- Enhanced research efforts by creating in-depth, insightful graphs to visualize roaming patterns and traceroute data summaries for a published research paper.

EDUCATION

Master of Science in Computer Science (Candidate)

Sep 2024 - May 2026

University of Minnesota Twin Cities, Minneapolis, MN

Bachelor of Science in Computer Science

Jan 2022 - May 2024

University of Minnesota Twin Cities, Minneapolis, MN 2023 Fall semester Dean list

PROJECTS

Budget Tracker

May 2024

- Built a **React** and **Azure MongoDB** web app with a team of five, allowing users to manage transactions and budgets.
- Integrated Azure AI Form Recognizer for extracting totals from receipt photos, streamlining user input.
- Designed visually appealing graphs and interfaces using the ArmChart JS library and Tailwind CSS, incorporating responsive web design to ensure the web app is beautifully presented on devices with different screen size.
- Implemented login feature using **Auth0**. The web app is accessible at *here*.

Event Finder May 2024

- Created a web app that allows event organizers to create and manage events while enabling users to browse and subscribe to events of interest, using Flask for frontend-backend integration and PostgreSQL for database management.
- Integrated Google API for adding events to Google Calendar and searching locations via Google Maps.

TODO list management application

Dec 2022

- Implemented the frontend using HTML, CSS, and JavaScript for managing and filtering to-do items.
- Built the backend with **Node.js**, **mysql Database**, and **Pug templating** for data handling and server-side logic.

SKILLS

Front-end & Database: React, Node.js, Flask, Vue.js, Webpack, Jest, GraphQL, PostgreSQL, Azure MongoDB Programming languages: JavaScript, HTML, CSS, C, C++, Python, Java, Ocaml

Tools & Others: Cross-browser, Tailwind CSS, RESTful APIs, Git, Docker, Vscode, Google API, Linux, Agile

PUBLICATIONS

Rostand A. K. Fezeu, Claudion Fiandrino, Eman Ramadan, Jason Carpenter, *Daqing Chen*, Yiling Tan, Joerg Widmer, Feng Qian, and Zhi-Li Zhang, "Roaming across the European Union in the 5G era: Performance, challenges and opportunities," in *Proceedings of the IEEE International Conference on Computer Communications (INFOCOM '24)*, Association for Computing Machinery