XU WANG

Herndon VA, 20171

Education

Virginia Tech Aug. 2020 – Dec. 2021

M.Eng in Computer Science GPA 4.0/4.0

University of Surrey Sep. 2012 – Jun. 2016

B.S in Tourism Management Guildford, UK

Experience

Dyson May 2022 – June 2023

Software Engineer

Shanghai, China

Falls Church, VA

- Worked on the MyDyson Application on WeChat Mini-Program platform using HTML/CSS and Typescript.
- Developed the "Instant Control" feature for upcoming Dyson machines, enabling real-time web content display by processing and transmitting MQTT message queues between machines and clients, enhancing user interactivity and machine responsiveness.
- Implemented the user manual and troubleshooting content in the application. The feature leads to over 3,000 monthly user interactions, boosting user engagement.
- Participated refinement process of user interface design. Elevated the visual appeal by refining animation effects on existing components, resulting in a rise in the application's user rating from 4.5 to 4.7 on a 5 point scale.
- Worked hand-in-hand with the UI/UX team to identify and resolve edge design challenges, facilitating smooth implementation of the Material UI design, enhancing interface consistency and user experience.
- Actively participated in Agile practices including daily stand-ups, code reviews, and sprint planning, resulting in optimized development workflows and enhanced team synchronization. Accomplished 100% of assigned tickets punctually, ensuring timely project deliveries.

Projects

Better Banking Application | Java, Springboot, Junit5, OAuth2 Code

September 2023

- Better Banking Application is a Springboot web application maintains a list of merchants and their codes and use them to enrich consumer's bank statement for a more detailed illustration.
- Integrated a circuit breaker mechanism with Resilience4J, ensuring a dependable fallback strategy when failed requests exceed set limits, enhancing system reliability.
- All application endpoints are secured using Spring Security. Additionally, it offers OAuth2 authentication, allowing users to authorize access using their Google or Github accounts, enhancing user convenience and security.
- Written component and integration test in Junit 5 and perform end to end test using MockWebServer library, ensuring thorough application validation and desired functionality.
- Optimized application performance by caching responses in a Redis server, effectively reducing redundant API calls and speeding up user request processing.

Urban Advisor Web Application | Python, Django, SQLite, JQuery | Code | Demo

September 2021

- Urban Advisor is a full-stack application that insights into the living quality in an area based on user's household needs.
- The project is based on the Django framework combined with JQuery implementation in the front-end. Managed data exchange between the front-end and back-end using HTTP and Ajax.
- Implemented functions in Python to calculate user spending according to specific conditions they input.
- Elevated user data interpretation by integrating Chart.js, allowing for dynamic data visualization through clear and intuitive graphs and charts.

September 2023

- This is a web application powered by Open AI GPT 4.0. It summarizes given website content into concise paragraphs.
- Developed in React, integrating Redux for managing state of user input history list.
- Cached API response in localStorage, resulting in faster load times and reduced redundant requests.

Technical Skills

Programming Languages: Typescript/Javascript, Java, Python, HTML/CSS, Kotlin, SQL

Front-end Frameworks/Tools: Vue.js, React.js, Vite, Webpack 5, Jest, ECharts, JQuery, Bootstrap

Back-end Frameworks/Tools: Springboot, OpenAPI, Django, Node.js, Junit 5

Database Management: MySQL, SQLite, MongoDB