Ken Jiang

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SKILLS

Languages: C#, C, C++, Java, Python, TypeScript, JavaScript, SQL, HTML, CSS

Frameworks/Libraries: React, Next, Jest, Node, Bootstrap, Tailwind, .NET

Tools: Git, SQL Server, PostgreSQL, MongoDB, Docker, Jira, Enzyme, AWS (S3, EC2), Unity

EXPERIENCE

Software Developer   January 2023 – Present
Senstar
- Advanced the **C#** based desktop surveillance video management client
- Integrated a digital hardware I/O device into the client with reusable **interfaces** and **endpoints** in order to allow for total control of third party rules, alarms and commands
- Built a generic upgrade pipeline to upgrade old hardware device implementations to newer integrations stored in **PostgreSQL** and **SQL Server**, increasing client security and feature adoption
- Upgraded a **TCP-based** security system event handler to naively support 100+ concurrent connections using **multi threaded sockets**, greatly simplifying configuration by the end user

Software Developer   May 2022 – August 2022
Shoplogix
- Contributed to the development of our manufacturing data visualization software
- Created and validated unit tests in **Jest** and **Enzyme**, achieving 96% code coverage over 5+ features
- Built 5+ API **endpoints** in **C#** using **Nancy**, fetching data from **PostgreSQL** with response times under 50ms, boosting page metrics on 20+ pages
- Developed a settings management system with inheritance and overriding for over 10 views, taking advantage of tree and map **data structures**, greatly improving ease of configuration
- Synthesized a **React** component to dynamically handle 100+ routing configurations simplifying future developement

Application Developer   September 2021 – December 2021
QBuild
- Developed an Engineering Change Notice management web app system
- Parallelized initial data fetching with task-based logic to speed up latency by up to 15 times
- Created a responsive image upload feature which processed files into **SQL Server** in under 100ms for a seamless user experience
- Built an extensible comments section from scratch using **Telerik UI**, complete with email notifications and employee tagging

Application Developer   January 2021 – April 2021
QBuild
- Designed new features and pages for the in-house CRM solution
- Overhauled **SQL Server View** and **Stored Procedure** implementations leading to 30 times improvements in data fetching speeds
- Created a script to parse 1000+ spreadsheets and transfer invoice data into our database vastly improving sales employee efficiency
- Automated creation of sales quotes in our CRM improving generation times by 60 times

PROJECTS

TextTracker | *JavaScript, Node, MongoDB, Discord.js*
- Built a message tracking discord bot using the **Discord.js API**
- Stored denormalized data in **MongoDB** for better data usage and retrieval speed
- Shipped app to an **EC2** instance via a **Docker** container greatly simplifying deployment
- Leveraged **event-driven** logic improving scalability and latency

EDUCATION

University of Waterloo   Waterloo, Ontario
Computer Engineering Candidate - B.A.Sc   *Expected April 2025*