Shin Feng Wong

□+65 96535694 | ■ shinfeng.wong@gmail.com | ★ twirle.github.io/blog | • twirle | • shinfengwong

Education

Singapore Institute of Technology | Bachelor of Science in Computing Science

Sep 2020 - Aug 2024

· Joint Degree with the University of Glasgow

Ngee Ann Polytechnic | DIPLOMA IN INFORMATION TECHNOLOGY

Apr 2017 – May 2020

• Experience with DevOps principles, Agile/Scrum methodology and hands-on with SAP ERP Business Functions and Processes.

Experience_

Ernst & Young Solutions LLP | Technology Solution Delivery Intern

Aug 2022 - Apr 2023

- · Ensured high standards in documents and oral presentations quality for project proposals in RFP contract bidding.
- Improved SAP system accuracy and functionality by testing and fine-tuning configurations across modules(Concur, FICO, and RE-FX.)
- Ensured UAT users were guided in testing deliverable SAP modules by preparing walkthroughs and following up with their testing.
- Accelerated user acceptance and smoother go-lives by preparing detailed walkthroughs and actively supporting UAT users during SAP module testing.
- Contributed to timely project deliveries and better stakeholder communication by supporting project managers in tracking milestones and generating regular progress updates.

Venture Corporation Limited | PROCESS AUTOMATION INTERN

May 2021 – Aug 2021

- Minimized physical interaction between visitors and security staff during COVID lockdowns by automating the collection of visitor information at entry points; collaborated across teams for requirements gathering, development, and addressing user follow-ups.
- Saved staff hours each week by scripting automation for SAP material management reports, streamlining data filtering, transformation, and visualization of key metrics.

CapitaLand | Enterprise System Management Intern

Mar 2019 - Aug 2019

- Facilitated smoother user transitions and reduced rollout friction by supporting SAP RE-FX configuration changes and conducting handson UAT sessions to guide users through new system features.
- Improved staff access to technical solutions and reduced troubleshooting time by translating complex specifications into user-friendly documentation and maintaining up-to-date resources on the corporate learning portal.

Projects

Audiolibrary | Personal Media Management Platform for Organizing Audio Libraries

Feb 2025 - Current

- Developing a modern audio library manager using Flask with SQLite database and Angular with Tailwind CSS, packaged using Electron.
- Configurable library management with database-persisted user preferences, and metadata scanning system that processes audio files.
- Implemented virtual scrolling using Angular CDK and incremental loading patterns for performance optimization, to ensure performance handling thousands of tracks while maintaining UI responsiveness.
- Utilises concurrent processing with background threading for CPU-intensive tasks and implemented reactive data flow using RxJS observables to maintain real-time UI updates.

Capstone Connect | SMART STUDENT-SUPERVISOR MATCHING FOR CAPSTONE PROJECT

Apr 2024 – Jul 2024

- Engineered and deployed a prototype full-stack application (React, MongoDB, Express, Node.js) on Vercel with CI/CD pipeline, designed to efficiently handle matching for 300+ students and 50+ faculty members.
- Transformed a manual, subjective matching process into an automated system that reduced matching time to minutes while improving compatibility outcomes by analysing research interest alignment.
- Implemented text processing through tokenisation and Jaccard similarity algorithms to quantify matches between student proposals and faculty research areas, with match optimization using Gale-Shapley's and Hungarian algorithms to maximize overall fit scores.

Worksite Environmental Monitoring | Internet of Things Worksite Monitoring

Sep 2021 - Apr 202.

- Comprehensive IoT monitoring solution capturing critical environmental parameters (temperature, humidity, noise) across multiple construction zones, enabling real-time hazard prevention through an interactive .NET/React dashboard
- Designed and implemented a resilient sensor network using multiple Raspberry Pi units with environmental sensors communicating via MQTT protocol, ensuring reliable data collection even in challenging worksite conditions.
- Built a complete data pipeline from sensor capture through RESTful APIs to PostgreSQL database, featuring data validation, automated alerts, and historical trend analysis for safety compliance reporting.
- Led bi-monthly demonstrations with industry partner, incorporating feedback to meet requirements and delivering a production-ready solution with comprehensive technical documentation.

Skills_

Languages Python, Javascript, Typescript, bash, C++, C#, R **Frameworks** React, Express, Flask, Angular, Tailwind CSS

DatabasesMongoDB, MySQL, PostgreSQLPlatformsUbuntu, Docker, Kubernetes, VercelOthers:SAP ERP, Agile/Scrum Methodology

APRIL 11, 2025 Shin Feng Wong