Seyoung Oh

San Jose, CA | 408-304-8254 | syoh2k@gmail.com | linkedin.com/in/syoh2k/ | F-1 STEM OPT

WORK EXPERIENCES

Software Engineering Intern - KQED

San Francisco, CA

Jul 2025 - Present

- Deprecated unused RESTful endpoints in a **Spring Boot** and **MongoDB/Firebase** service deployed on **Docker** and **GCP**, achieving a 27% reduction in API surface area and simplifying system design.
- Resolved **IntelliJ** build configuration issues, cutting local build times by 55%, and documented solutions.

Application Engineer - JKI INC

Campbell, CA Sep 2024 - Jan 2025

- Designed and implemented a **Shmoo testing framework** in C++ for NAND flash memory validation, automating voltage and timing parameter analysis against vendor specifications.
- Discovered an additional 17% VCC power margin through systematic performance validation, enabling broader operational stability and extending device lifespan under varying power conditions.

IT Specialist (Sergeant) - Republic Of Korea Army

Goseong-gun, South Korea

Oct 2022 - Apr 2024

- Conducted daily server and database inspections using **PuTTY and Unix** to ensure data integrity and server stability by monitoring performance and implementing optimizations, successfully maintaining 98% data stability and connectivity.
- Diagnosed hardware, software, and network issues affecting military systems, and resolved 5+ issues per day.
- Managed critical IT operations during Freedom Shield joint US-ROK military exercise in high-pressure environment, earning III Corps Commander's Commendation for exceptional performance.

Data Engineer Intern - JKI INC

Yongin-si, South Korea

Jul 2022 - Sep 2022

- Built an interactive temperature monitoring dashboard using **Plotly Python** to analyze post-testing log data, enabling efficient identification of thermal anomalies and reducing debugging time by 80%.
- Developed and automated a robust data pipeline with **NumPy** and **Pandas**, cleaning and analyzing 10K+ log entries.

AWARDS & RECOGNITION

SpartUpSJSU Hackathon: Awarded 5th Place

Apr 2025

• Developed AutoWise, an AI-powered car all-in-one platform integrating DIY repair services, shop locators, and fuel price tracker using **LLM API**, **Next.js**, **Mapbox API**, and deployed on **Netlify**.

SpartUp × **SBDC Pitch Jam**: Placed Top 10

Apr 2025

- Designed and pitched "MediTrek" startup, upgrading medication guide platform for international students and travelers, presenting revenue model with pharmacy partnership strategy.
- Improved medication guide with **in-memory caching** implementation that reduced API usage by 30%.

HackHayward Hackathon: Awarded Best Use of Perplexity/Sonar

Mar 2025

• Led a team of two to develop an AI-powered Medication Guide, creating a **RESTful API** with **FastAPI**, integrating **Perplexity** for recommendations, and adding a pharmacy locator with **Google Place API**, deployed on **Vercel**.

SKILLS

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

Frameworks/Libraries: Spring Boot (JPA, JDBC, WebFlux), FastAPI, Next.js, React, Plotly, NumPy, Pandas

Databases/Tools: MySQL, MongoDB, Firebase, Git, Postman, Jira, Confluence **Deployments**: Docker, Google Cloud Platform, AWS(IAM, S3, EC2), Vercel, Netlify

EDUCATION

San Jose State University

San Jose, CA