Sai Akhilesh Tulluri

Boston, MA | akhilesh@tulluri.me | linkedin.com/in/akhiltulluri | github.com/akhiltulluri | https://tulluri.me

EDUCATION

Master's in Computer Science, Northeastern University (GPA: 4.0/4.0)

Boston, MA

Coursework: Algorithms, Programming Design Paradigm, Operating Systems

Sep 2024 - May 2026

Teaching Assistant: Software Development (Fall '24), Computer Systems (Spring '25).

Bachelor's in Computer Science, Vellore Institute of Technology (CGPA: 9.03/10.00)

India

Coursework: Data Structures, Web Development, Cloud Computing, Computer Networks

Aug 2020 - May 2024

Experience

Software Engineering Intern (Full Stack)

Jan 2024 – Apr 2024

Jarobe Labs

Jackson Center, OH

- Developed a full-stack web app for users to configure **3 multi-factor authentication types** (security keys, Duo Push, Twilio TOTPs) using **Next.js**, **PostgreSQL**, and **TypeScript**.
- Engineered a GitHub app to enforce 2FA for pull request approvals, securing 100% of code merges using Node.js.
- Reduced development setup time by 50% by creating Dockerfiles to automate PostgreSQL provisioning, monorepo builds with pnpm, and launching the Next.js server.

Software Engineering Intern (Backend)

May 2023 – Aug 2023

Digital Fortress

India

- Optimized the Point of Sale (POS) system's sales dashboard API, reducing latency by 50% through SQL query optimization, adding indexes, and minimizing redundant database lookups.
- Reduced deployment time by 40% by automating unit tests, Docker image builds, and deployments to GitHub Container Registry through a robust CI/CD pipeline.
- Enabled seamless transactions for 50+ daily users by architecting secure RESTful APIs with **Django REST** Framework and MySQL, building 10 endpoints for essential POS features, and deploying on AWS EC2.

Software Engineering Intern

Nov 2020 - Apr 2022

eFuse

Columbus, OH

- Boosted user retention by 18% through push notifications to remind users to maintain activity streaks, implemented in TypeScript, Node.js using third-party SaaS products like Braze.
- Increased site traffic by 6% by connecting gamers across 100+ communities with esports internships and scholarships, by building a Discord bot in Python, using PostgreSQL.
- Reduced production issues by 20-30% by migrating to TypeScript, implementing Cypress integration tests for eFuse's frontend (Next.js), and establishing a CI pipeline.
- Optimized search performance by 40-50% by migrating from AWS Elasticsearch to MongoDB Atlas Search, improving response time and result accuracy for queries handled by Express.js endpoints.

Projects

VTAPP - Event Platform | Next.js, MySQL, Airtable, Cloudflare pages

GitHub | Demo (Feb 2024)

- Developed a user-friendly web platform for a technical fest using Next.js, MySQL and Drizzle ORM (5k+users).
- Integrated QR-code based ticketing system & Airtable spreadsheets, enabling easier event management (generated 50k+ tickets for 80+ events) and deployed to serverless environment on Cloudflare.

 $\textbf{Restaurant Monitoring - API} \mid \textit{FastAPI}, \ \textit{PostgreSQL}, \ \textit{SQLAlchemy}, \ \textit{SQLModel}, \ \textit{Redis}$

GitHub (Jun 2023)

- Built a robust monitoring API to generate restaurant uptime/downtime reports for 10k+ stores.
- Achieved a **155-second benchmark** for processing reports of **14,000 stores** by designing an efficient uptime/downtime algorithm with asynchronous processing using **Redis and Python-Arq**.

TECHNICAL SKILLS

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

Frameworks: Spring Boot, Flask, Django, Express.js, React.js, Next.js, Redux, Angular

Databases: PostgreSQL, MySQL, Oracle, SQLite, MongoDB, Redis

Other Tools: Amazon Web Services, Microsoft Azure, Cloudflare, Docker, Git & GitHub, Linux/Unix