

WORK & LEADERSHIP EXPERIENCE

CodeQuotient, Mohali, **Software Development Engineer**

Jan 2024 – Present

- Login Service: Developed and deployed a secure login service using NodeJS, ExpressJS, Redis, and MongoDB. Reduced authentication issues by 4%.
- Test Application: Built a cross-platform desktop application using ElectronJS, deployed to over 10k users, with anti-cheating mechanisms that reduced integrity violations by 70%.
- Quiz Service: Enhanced backend API performance, security and optimized MongoDB queries.
- Workspace Backend: Contributed to communication services using Redis Stream. Implemented independent authentication of the service.
- Workspace Frontend: Contributed to building the frontend using ReactJS and TypeScript.
- Student IDE: Designed and built a cross-platform Integrated Development Environment (IDE) for students, supporting C/C++, Java, and Python with integrated compilation and debugging tools. Developed using ElectronJS with a ReactJS frontend, offering flexible support for both Docker containers and native compilers.

CodeQuotient, Mohali, **Software Development Engineer Trainee**

June 2023 – Jan 2024

- Lead Management System (Backend): Developed RESTful APIs using Node.js and PostgreSQL.
- Lead Management System (Frontend): Improved user interface responsiveness using ReactJS and TypeScript, increasing user satisfaction by 10% through streamlined UX.
- Course Service: Worked on backend services using PostgreSQL, optimizing data handling, which resulted in a 20% faster response time and improved scalability.

PERSONAL PROJECT

- Upload File: Developed a file-sharing service that handled 500+ file uploads monthly, allowing users to share files anonymously. Integrated AWS S3 for scalable and secure file storage, with an automatic file deletion system that maintained a 100% success rate in clearing expired files. Implemented a seamless upload-resume feature, minimizing data loss by allowing uploads to continue from the point of interruption during connectivity issues, enhancing user experience and reliability.
- E-Comm: Developed an ecom site for selling game keys. Used NodeJS for backend with ejs for server side rendering and microsoft sql server as database.

TECHNICAL SKILLS

- Languages: JavaScript, TypeScript, Go Lang.
- Frameworks: NodeJS, ExpressJS, Go Fiber, NextJs(14).
- Databases: MongoDB, PostgreSQL, Redis.
- Frontend Library: ReactJS, Zustand, Ant Design, tailwindCSS.
- DevOps and Tools: Nginx, AWS (S3), Docker, Git.

EDUCATION & QUALIFICATIONS

Maharshi Dayanand University, India, **MSc Computer Science**

2021– 2023

Maharshi Dayanand University, India, **BSc Mathematics**

2018 – 2021