UMESH SOMNATH UGALE

Fullerton, CA | +1(657) 445-7350 | umeshugale24@gmail.com | [LinkedIn](#) | [GitHub](#) | [Portfolio](#)

SUMMARY

Software Engineer experienced in developing scalable applications using Java, C++, Spring boot. Skilled in designing micro-services, developing REST APIs, optimizing databases with SQL/Hibernate, and implementing high-performance distributed systems and cloud deployment. Passionate about solving complex engineering problems and delivering reliable, user-focused software solutions.

EXPERIENCE

Accenture   Aug 2021 - Dec 2023
Software Engineer

- Developed and deployed scalable Java based micro-services leveraging Spring Boot, Hibernate and Spring MVC improving transaction processing efficiency by 35% in fintech applications.
- Implemented and scaled RESTful APIs, optimizing database operations with JPA, Hibernate and Redis caching to reduce query execution time by 30% and response latency by 25% across multiple services, while maintaining zero downtime.
- Designed a real time monitoring dashboard using React.js and Redux, integrated via API gateway.
- Engineered end-to-end testing frameworks with JUnit, Mockito, Testcontainers and Selenium achieving code coverage of 90% and reducing production defects by 25%.
- Orchestrated containerized deployments using Docker, Kubernetes and AWS in distributed environment, ensuring reliable scalability in high traffic periods.
- Participated across all phases of the SDLC in Agile/Scrum teams, utilizing jenkins and CI/CD automation to support continuous integration and deployment, resulting in reliable and on-time software releases.
- Partnered closely with cross-functional teams to align technical solutions with business objectives and accelerate delivery cycles.

PROJECTS

Stream Processing System | Java, Distributed System, Apache Spark

- Designed a distributed stream processing system for real-time data processing, inspired by Apache Spark, with fault-tolerant, scalable architecture with 25% faster performance than Apache spark.
- Built a scalable, low-latency system by using features of HDFS and Cassandra, ensuring 99% availability and efficient data processing.
- Developed a failure detection mechanism using the SWIM protocol, enabling reliable identification and recovery from node failures.
- Ensured exactly once semantics by implementing duplicate detection, persistent logging, and state recovery, guaranteeing correctness even in failure scenarios.

Collaborative Document Editor | Spring Boot, React MUI, MongoDB, WebSockets

- Architected a real-time collaborative editing platform enabling concurrent multi-user document updates using Spring Boot WebSockets (STOMP) with low-latency synchronization.
- Implemented conflict-free editing by coordinating concurrent document changes through operation-based synchronization, ensuring data consistency across overlapping user edits.
- Secured shared documents through Spring Security and JWT, enforcing role-based access control for owners, editors, and reviewers.
- Persisted document snapshots and edit metadata in MongoDB, supporting version recovery, audit trails, and collaboration analytics.

Secure Text Communication Using Cryptography | Java, RSA, Rest API, PostgreSQL, OpenAI API

- Engineered a modular encryption solution that reduced processing time by 30% for real-time secure messaging with enhanced scalability.
- Ensured the application adhered to modern cryptographic standards, with keys sized at 2048 bits to guarantee strong encryption against attack.
- Enforced API rate limiting and throttling to protect endpoints from abuse, ensuring stable system performance under unexpected traffic spikes.
- Integrated optional AI assisted text suggestion and grammar correction as a per-encryption feature.

SKILLS

- **Programming Languages**: Java, C++, Python, JavaScript
- **Web Development**: React, HTML/CSS, Rest APIs, Spring Boot, Flask, Selenium
- **Cloud and DevOps**: AWS EC2, Lambda, Docker, CI/CD, Kubernetes
- **Salesforce Tools**: Salesforce Configuration, Apex, Lightning Web Component (LWC)
- **Database and Tools**: MySQL, SOQL, MongoDB, Data Loader, Workbench, GitHub, Postman

EDUCATION

California State University Fullerton   Jan 2024 - Dec 2025
Master of Computer Science, Computer Science

- **GPA:** 3.72
- **Coursework:** Advanced Algorithms, Advanced Blockchain Technologies, Advanced Computer Networks, Web Backend

CERTIFICATIONS

- Salesforce Certified Administrator
- Agentforce Specialist