SAI NIKHIL POTHURAJU

Chicago, IL |+1 (217) 790-5997 | pothuraju.sainikhil22@gmail.com |LinkedIn

PROFESSIONAL SUMMARY

- Java Full Stack Developer with 7+ years building cloud-native, event-driven, and distributed platforms across fintech, SaaS workflow automation, CPaaS messaging, and education systems, supporting high-volume and multi-tenant environments.
- Designed and deployed Spring Boot microservices, Kafka/RabbitMQ pipelines, and secure OAuth2/JWT APIs, improving throughput, accuracy of transaction flows, and reliability of compliance-critical services.
- Delivered scalable solutions on AWS (Lambda, ECS/Fargate, EC2, S3, DynamoDB, RDS) and GCP (GKE, Cloud Run), enabling consistent multi-environment deployments, reduced latency, and cost-efficient resource utilization.
- Enhanced application performance using Hibernate optimization, PostgreSQL/Oracle tuning, Redis caching, and WebFlux reactive processing, achieving measurable gains in speed, automation coverage, and user responsiveness.
- Built modern front-end interfaces with Angular and React, and strengthened engineering delivery through CI/CD automation (Jenkins, GitLab CI/CD, GitHub Actions), Kubernetes orchestration, and DevSecOps practices to ensure secure, high-availability releases.

TECHNICAL SKILLS

Backend Engineering: Java, Spring Boot, Spring MVC, Spring Cloud, Spring Security, Spring Data JPA, Hibernate, Microservices Architecture, RESTful APIs, GraphQL, Reactive Programming (Spring WebFlux), Event-Driven Architecture, Spring Batch

Frontend Engineering: Angular 17/15/13, ReactJS, TypeScript, JavaScript (ES6+), HTML5, CSS3, SCSS, Bootstrap, Component-Driven UI Design

Cloud & Serverless Platforms: AWS (EC2, S3, Lambda, ECS/Fargate, DynamoDB, API Gateway, SQS/SNS, RDS, CloudWatch, IAM, VPC), Terraform (Infrastructure as Code), Kubernetes (K8s), Helm, Container-Orchestrated Deployments

Messaging & Streaming Systems: Apache Kafka, Kafka Streams, RabbitMQ, JMS, Asynchronous & Distributed Messaging Patterns

Databases & Storage: PostgreSQL, Oracle, MongoDB, Redis, DynamoDB, SQL/PL-SQL, Query Optimization, Data Modeling

DevOps, CI/CD & Platform Tooling: Docker, Kubernetes, Jenkins, GitLab CI/CD, GitHub Actions, Maven, Gradle, ArgoCD, Nexus/Artifactory, Observability (Prometheus, Grafana)

Testing & Quality Engineering: JUnit, Mockito, REST Assured, Postman, Selenium, Test-Driven Development (TDD), Contract Testing, Performance Testing (JMeter)

Version Control, Monitoring & Collaboration: Git, GitHub, GitLab, Bitbucket, SonarQube, ELK Stack (Elasticsearch, Logstash, Kibana), Splunk, Swagger/OpenAPI, JIRA, Confluence, Log4j/SLF4J

Architecture & System Design: Distributed Systems, High Availability Design, Domain-Driven Design (DDD), API Lifecycle Management, Secure Engineering (OAuth2, JWT, RBAC), Cloud-Native Architecture, DevSecOps Integration

PROFESSIONAL EXPERIENCE

Sr. Java Full Stack Developer — Aug 2024 - Present

U.S. Bank | Chicago, IL

- Designed cloud-native payment microservices using Java 17, Spring Boot, and AWS ECS, streamlining transaction routing and cutting API response time by 32% during high-volume activity.
- Modeled key payment and onboarding workflows with Spring Cloud, Kafka Streams, and JPA, enabling predictable event handling and boosting system throughput by 40% under peak load.
- Built REST and GraphQL APIs using Spring Boot, OpenAPI, and GraphQL Java, unifying data access for mobile, web, and risk teams and improving integration turnaround for partner channels.
- Strengthened access controls with OAuth2, JWT, and Spring Security, improving compliance readiness and reducing unauthorized access incidents by 52% across critical banking endpoints.
- Delivered automated settlement and reconciliation pipelines using Spring Batch and PostgreSQL, increasing ledger accuracy and lowering manual back-office processing by 70%.
- Implemented geo-risk analytics services with Kafka Streams, AWS Lambda, and DynamoDB, accelerating fraud detection workflows and reducing alerting delays by 28%.
- Improved deployment stability by working with platform engineers to apply Docker, Kubernetes, Helm, and Terraform, ensuring consistent releases across UAT and production environments.

Java Full Stack Developer — Dec 2023 - Jul 2024

Dell Technologies |Chicago, IL

- Revamped payment validation flows using Java 11, Spring Boot, JPA, and AWS Lambda, improving workflow sequencing and cutting validation time by 30% during heavy transaction loads.
- Partnered with cloud architects to migrate billing and settlement modules to AWS EC2, S3, and EBS, increasing system uptime and enabling smoother deployment cycles for engineering teams.
- Implemented automated settlement and reconciliation pipelines with Spring Batch and PostgreSQL, eliminating repetitive finance tasks and reducing operational workload by 70%.
- Enhanced partner payment integrations by building secure connectors with OAuth2, Spring Security, and TLS, strengthening PCI compliance and reducing integration failures with external gateways.
- Configured Kafka producer and consumer groups to support real-time transaction streaming, improving durability of event propagation and increasing fraud-analytics accuracy across downstream systems.
- Delivered operational dashboards using Angular 11, TypeScript, and RxJS, giving risk and operations teams clearer insights into payment trends and reducing time spent on daily monitoring.
- Elevated release quality by integrating SonarQube and Fortify into CI workflows with Jenkins and Maven, resolving critical issues earlier and lowering security vulnerabilities by 40%.

Java Full Stack Developer — Oct 2021 - Aug 2023

QualiZeal |Hyderabad, India

- Developed configurable workflow modules using Angular 11, TypeScript, and RxJS, enabling property teams to customize processes quickly and reducing feature build time by 35% for new tenants.
- Delivered backend automation services in Java 11, Spring Boot, and Spring Data JPA, increasing workflow accuracy and lowering support tickets by 25% across operations teams.
- Created Spring Batch pipelines with PostgreSQL that automated inspections and SLA-driven tasks, raising automation coverage to over 70% of recurring operational workflows.
- Implemented Kafka-based event streams using Kafka topics and consumer groups, giving field teams real-time visibility into maintenance activity and reducing response delays by 28%.
- Reinforced tenant-level security with OAuth2 and Spring Security, improving access accuracy and reducing authorization conflicts for 500+ active users.

- Streamlined deployment workflows by collaborating with DevOps teams to enhance Jenkins pipelines, improving release consistency and shortening deployment time by 40% across QA and UAT.
- Optimized backend performance through Hibernate query tuning and PostgreSQL procedure optimization, cutting slow query execution by 30% and improving dashboard responsiveness for staff.

Java Developer **Jul 2019 - Sep 2021**

Stag Innovations |Hyderabad, India

- Engineered REST microservices using Java 8, Spring Boot, and Hibernate to support real-time academic workload analytics, improving response speed by 40% for more than 2,500 concurrent student users.
- Collaborated with platform teams to transition compute-intensive workflows to AWS EC2 and RDS, increasing system scalability by 40% during peak enrollment cycles and reducing infrastructure costs.
- Built modular UI components with Angular 7, TypeScript, and RxJS, enhancing portal responsiveness and lowering average page load times by 35% across high-traffic academic modules.
- Introduced asynchronous processing via RabbitMQ message queues, enabling smoother registration handling during spikes and increasing scheduling workflow accuracy for academic operations.
- Automated ingestion and archival workloads through Spring Batch and SQL optimizations, raising automation coverage to over 60% and reducing manual preparation efforts for engineering teams.
- Refined database performance by optimizing Hibernate mappings, pagination logic, and SQL queries, cutting slow-query frequency by 30% and improving dashboard data accuracy for faculty reviewers.
- Enhanced release consistency by setting up CI pipelines with Jenkins, Maven, and SVN, partnering with QA teams to accelerate deployment cycles and improve build reliability throughout semester updates.

Java/J2EE Developer **Jun 2017 - Jun 2019**

Tanla Platforms | Hyderabad, India

- Built high-throughput messaging components using Java 8, Spring MVC, and Hibernate, increasing routing speed and supporting millions of telecom users with more consistent delivery performance.
- Integrated carrier interfaces using JAX-RS and JAX-WS, improving message exchange accuracy and reducing failed delivery handoffs for enterprise CPaaS clients.
- Optimized retrieval performance through Hibernate caching, HQL tuning, and pagination, reducing data access latency by 30% during high-traffic messaging periods.
- Configured JMS queues and topics with Spring JMS, enhancing asynchronous processing accuracy and lowering message-drop incidents across routing pipelines.
- Upgraded operational consoles using AngularJS, JSP, and Bootstrap, enabling support teams to analyze delivery paths faster and decreasing investigation time for field-reported issues.
- Streamlined billing batch operations by refining Spring JDBC queries and Oracle procedures, lowering nightly processing costs and improving efficiency for high-volume reconciliation runs.
- Improved system resilience by developing JUnit test suites and Log4j monitoring, helping QA and NOC teams identify delivery anomalies earlier and reduce production-level defects affecting carrier SLAs.

PROJECTS

Cloud-Native Banking Platform

- Built a payment orchestration layer using Spring Boot, Spring Cloud, Kafka, Redis, and AWS Lambda to route transactions more efficiently and improve settlement speed for high-volume banking workflows.
- Applied CQRS and event-sourcing with Kafka Streams and PostgreSQL to maintain consistent audit trails, raising accuracy of reconciliation across customer accounts.
- Delivered secure REST and GraphQL APIs with Spring Boot, OpenAPI, OAuth2/JWT, enabling downstream teams to integrate new banking features with fewer defects and quicker validation cycles.

Intelligent Task Automation Engine

- Designed rule-driven automation services using Spring Boot, Drools, and PostgreSQL, enabling operations teams to automate recurring tasks and expand workflow coverage across tenants.
- Implemented reactive ingestion pipelines with Spring WebFlux and Kafka, handling high-volume field interactions and maintaining steady processing performance under load.
- Developed an administrative UI with Angular and TypeScript, allowing product teams to adjust rules and monitor workflow status, reducing turnaround time for tenant-specific updates.

Distributed Messaging Analytics Dashboard

- Built streaming analytics pipelines with Kafka, Kafka Streams, and MongoDB, giving operators near-real-time visibility into delivery patterns across CPaaS systems.
- Developed an interactive dashboard in React and TypeScript, enabling engineering and NOC teams to identify delivery anomalies faster during high-traffic periods.
- Implemented tracing and metrics using OpenTelemetry, Prometheus, and Log4j, improving incident-detection accuracy and speeding up root-cause analysis for messaging issues.

EDUCATION

Masters in Computer & Information Systems

Eastern Illinois University | Charleston, IL

CERTIFICATIONS

- AWS Certified Developer - Associate
- Oracle Certified Professional, Java SE 11 Developer
- VMware Spring Professional Certification
- Microservices with Spring Boot - **Coursera**
- Building Scalable Java Microservices on Kubernetes - **Coursera**
- Cloud Native Application Development - **Coursera**
- Developing Applications with Java and Spring Boot - **Coursera**