

Vathaluru Akhileswar Reddy

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Technical Skills

Languages: Go, C, C++, Java, JavaScript, Python

Frameworks & AI Tools: FastAPI, Spring Boot, LangGraph, LangChain, React

AI/LLM Systems: Retrieval-Augmented Generation (RAG), Vector Search

Cloud & DevOps: AWS Lambda, Serverless Framework, Docker

Databases: MySQL, PostgreSQL, MongoDB, Redis

Version Control: Git, GitHub, GitLab

Education

KL University

Bachelor of Technology - Computer Science and Engineering (CGPA: 9.43)

Guntur, India

2021–2025

Experience

Ideyalabs

Backend Developer

Hyderabad, India

2024–Present

Project: APEX - Transportation Back Office System

- Developed a FastAPI backend with domain-driven architecture for transportation operations, pricing/rating, and shipment management.
- Deployed a serverless application on AWS Lambda using Serverless Framework with CI/CD pipelines via GitHub Actions.
- Integrated external services (SMC3, HERE.com, AWS S3, SES) and utilized PostgreSQL with SQLAlchemy ORM.

Project: HLF - Blockchain Transaction System

- Built RESTful APIs using Go to store blockchain transactions and manage issue, redeem, and transfer operations.
- Engineered Go-based smart contracts (chaincode) for Hyperledger Fabric to enforce business logic for transaction operations.
- Led migration from Corda-based blockchain system to Hyperledger Fabric, improving performance and interoperability.

Projects

Chat Bot:

- Built a full-stack AI chat application using FastAPI, React, LangGraph, and LangChain with PostgreSQL chat history.
- Connected OpenAI GPT-4 with custom tools (Tavily web search, date utilities) for real-time information retrieval.
- Designed a service layer architecture with SQLAlchemy ORM for multi-threaded conversations and persistent message storage.

Budget Buddy:

- Created a CLI finance assistant using LangGraph, LangChain, OpenAI GPT-4o with conversation memory persistence.
- Built custom financial tools for income/expense tracking with date-range analytics and Tavily web search integration.
- Implemented a modular architecture with PostgreSQL, SQLAlchemy ORM, and dependency injection for database management.

Fitness AI Platform:

- Built a microservices platform using Spring Boot, Eureka, Spring Cloud Gateway with Google Gemini AI recommendations.
- Implemented an event-driven architecture with RabbitMQ messaging for asynchronous communication between services.
- Configured Keycloak for OAuth2 authentication and centralized configuration server for microservice properties.

ClearBG:

- Developed a full-stack image background removal application using Spring Boot, React, and ClipDrop API.
- Configured Clerk authentication with webhook synchronization and JWT-based API security for user management.
- Incorporated Razorpay payment gateway for credit-based system and reactive Spring WebClient for AI service integration.

Linklytics:

- Built a URL shortener with analytics using Spring Boot, React, Redis, and PostgreSQL.
- Established click event tracking with date-range filtering for monitoring URL performance metrics.
- Designed RESTful APIs with JWT authentication and role-based access control for user-specific URL management.

Real Estate Management System:

- Built a blockchain property management system using Hyperledger Fabric with Go-based smart contracts (chaincode).
- Applied composite key-based chaincode for user registration, property listing, and transaction recording.
- Developed RESTful APIs in Go for property operations, ownership transfer, and transaction history on distributed ledger.

Coding

LeetCode:

- Solved 530+ problems across various difficulty levels (Easy, Medium, Hard) on LeetCode platform.
- Strengthened core problem-solving skills in data structures and algorithms including arrays, trees, graphs, and dynamic programming.

Certifications

Red Hat Certified Enterprise Application Developer (EX183):

- Demonstrated expertise in building enterprise applications using Red Hat JBoss Enterprise Application Platform 7.0.
- Skills validated: Java EE application development, RESTful web services, CDI, JPA, and deployment on JBoss EAP.

Google Cloud Agentic AI Day (Hack2skill, 2025):

- Achieved Finalist position — Top 700 out of 57,000+ participants in national-level AI hackathon.
- Built an AI-powered monitoring system using Vertex AI, Gemini, Next.js, and ESP32 hardware in 30-hour timeframe.