Gangula Venkata Durga Nikhil Reddy

Education

Sree Vidyanikethan Engineering College

Bachelor of Technology in Computer Science

FIITJEE Junior College

Secondary High School in Maths and Science

2020 - 2024

2020

Major GPA: 8.54/10.0 Tirupati

> GPA: 9.67/10.0 Vijayawada

Experience

HashedIn by Deloitte, Hyderabad | Python, FastAPI, GenAI, LangChain — AI-Assist DevOps Sep 2024 - Present

- Developed backend APIs using FastAPI to support an AI-powered system for generating Infrastructure-as-Code (IaC), enabling DevOps teams to reduce manual Terraform code writing by 70%.
- Integrated OpenAI GPT-4 (via LangChain) to generate accurate Terraform code based on user stories and architecture diagrams and CI/CD pipeline scripts based on user stories.
- Implemented RAG (Retrieval-Augmented Generation) workflows using context-specific code samples and stored them in a POSTGRES PGVector database for enhanced prompt accuracy.
- Designed and maintained modular codebases leveraging Object-Oriented Programming (OOP) principles, ensuring scalability and reusability of the application.
- Created endpoints for generating IaC via 3 distinct approaches: Standard Generate, RAG Generate, RepoScan Generate, and each with or without Modular Approaches.
- Containerized the application using Docker and Podman for efficient deployment and testing in different environments.
- Enabled multi-cloud IaC generation for providers like AWS, GCP, and Azure, addressing diverse infrastructure requirements.
- Authored and fine-tuned prompts to improve the precision of generated Terraform and pipeline codes, aligning outputs with real-world infrastructure needs.

HashedIn by Deloitte | Full-Stack Development Internship — Python, SpringBoot, Angular Jun 2024 - Sep 2024

- Completed intensive training on Python, Spring Boot, and Angular, applying skills to build full-stack applications with modern development practices.
- Developed a Hotel Management System backend using Python and FastAPI with PostgreSQL for storage, integrating LangChain and LLMs for activity generation and conversational queries.
- Designed REST APIs for a BookMyShow-like application in Spring Boot, implementing features like user authentication, event booking, and admin-controlled discount campaigns using Spring Security and JWT.
- Built a dynamic web application, "Cinemania Delight," with Angular, incorporating user authentication, dashboard navigation, movie scheduling, seat selection, and a payment workflow.
- Utilized tools and platforms such as Git, GitHub, Docker, and Azure Cloud to streamline development and deployment processes.
- Emphasized clean coding practices, modular design, and unit testing with a minimum of 85% code coverage, ensuring reliability and scalability of applications.

Skills

Programming: C++, Java, Python

Databases :: VectorDB(pgvector, faiss), Mysql, cosmos DB

Technologies and Tools: FastAPI, Django, SpringBoot, Generative AI, langehain, Prompt Engineering, Git, Eclipse,

GitHub, Pycharm, Postman, Podman

Coding Profiles

LeetCode: nikhilgvd GeeksforGeeks: gvdnikhil

Languages

English: Fluent Telugu: Native Hindi: Fluent

Certifications

Academy Cloud Foundations: AWS academy

AWS Academy Machine Learning Foundations: AWS academy

Problem Solving (Intermediate): Hackerrank