

Aradhya Pavan H S

AI/ML Engineer | NLP | LLMs | RAG | Agentic AI | Full-Stack Development

Bengaluru, Karnataka

aradhyapavan@gmail.com | +91 96116 16524

linkedin.com/in/aradhya-pavan | aradhyapavan.github.io | devpost.com/aradhyapavan

Professional Profile

AI/ML and software engineer with 4+ years of experience building full-stack applications and intelligent systems, with a focus on **NLP, LLMs, RAG, and Agentic AI**. Experienced in developing multi-agent applications, retrieval pipelines, LLM-powered solutions, and database-driven systems using **Python, Flask, LangChain, PyTorch, SQL, and vector search**. Experienced in translating business requirements into practical software solutions and building AI workflows from development through deployment.

Skills

Programming Languages: Python, JavaScript

AI/ML Frameworks: PyTorch, Keras, Scikit-Learn, SpaCy, NLTK, LangChain, MLflow

NLP & LLMs: Retrieval-Augmented Generation (RAG), Large Language Models (LLMs), Agentic AI Frameworks (CrewAI, PhiData/AGNO), OpenAI SDK, Prompt Engineering, Parameter-Efficient Fine-Tuning (PEFT) (LoRA/QLoRA)

MLOps: Model Deployment, Monitoring, Automation, Prototyping, Pipeline Development, Docker, FastAPI, GitHub Actions, CI/CD, MLflow, Git/GitHub

Vector Databases: FAISS, PostgreSQL (PGVector), Chroma, Pinecone, Milvus

Cloud Platforms: AWS (S3, EC2, Lambda), Microsoft Azure (AI/ML Services)

Databases & Web: PostgreSQL, MySQL, Flask, REST APIs

Tools & Environments: Jupyter Notebook, Anaconda, Virtual Machines

Education

M.Tech in Artificial Intelligence and Machine Learning

BITS Pilani

2023 – 2025

Specialization: Natural Language Processing (NLP)

Completed postgraduate program focused on AI, ML, and Data Science, with emphasis on building NLP-driven solutions.

Bachelor of Engineering in Computer Science

Visvesvaraya Technological University – BCE College

2015 – 2019

Relevant Coursework: Data Structures, Operating Systems, Computer Networks, Software Engineering

Work Experience

AI/ML & Full Stack Developer

[Askin Consultancy LLP](#) (restructured from Chelukala Enterprises)

Sep 2025 – Present

- Led the development of an internal RAG-based support assistant that helped support teams resolve customer queries 3 to 4 times faster by retrieving relevant historical tickets and knowledge for faster resolution.
- Built a domain-specific knowledge base for finance, taxation, GST, accounting, and compliance by sourcing, cleaning, and preprocessing content, and using LLMs to annotate the data for retrieval.
- Contributed to developing retrieval pipelines across AI projects using open-source embedding models, PostgreSQL with PGVector, and FAISS to index and retrieve relevant information from knowledge sources.
- Integrated LLM APIs through the OpenAI SDK across AI applications, connecting retrieved context with model responses and supporting different LLM-based workflows.

Full Stack Developer

[Chelukala Enterprises](#)

Jan 2022 – Aug 2025

- Developed and maintained full-stack applications, ERP tools, financial systems, reporting platforms, and business automation solutions based on client and business requirements.
- Automated invoicing, reporting, financial tracking, and audit workflows, including tax-ready reporting and multi-user workflows, reducing audit and GST filing effort by over 50%.
- Developed an LLM-powered Question Answer Builder for a client using document processing, RAG, embeddings, FAISS, LangChain, and agentic workflows to generate structured question sets from large volumes of content.

- Developed an AI-powered query solution for clients working across multiple DBMS environments using LLMs, schema-aware reasoning, agentic workflows, and natural-language query generation.
- Developed a multi-agent feedback and support system using LLMs, RAG, embeddings, LangChain, and prompt engineering to process unstructured inputs and generate structured insights.

Projects

Enhanced Feedback Analysis System

[Project Documentation](#)

M.Tech Project

- Developed a domain-agnostic, multi-agent NLP system using Agentic AI and LLMs to convert unstructured feedback into structured, actionable business insights.
- Implemented RAG, FAISS, LangChain, PyTorch, and Mistral with a Flask-based application and real-time processing through Server-Sent Events.

Multi-Dialect Agentic SQL Assistant

[Project Documentation](#)

Hackathon Project

- Developed an Agentic AI-powered application that converts natural language to accurate SQL queries using schema reasoning and supports multiple database dialects with real-time query execution.
- Built using Flask, SQLAlchemy, PhiData, and Mistral models to enable database interaction through natural-language workflows.

Certifications

Microsoft Certified: Azure AI Fundamentals (AI-900)	Jun 2025
Microsoft Certified: Azure AI Engineer Associate (AI-102)	Jun 2025
GitHub Foundations	Jun 2025
AI Engineer for Data Scientists Associate (DataCamp)	Jun 2025
AWS Certified AI Practitioner (AIF-C01)	Jul 2025
GitHub Copilot (GH-300)	Jul 2025
AI Engineer for Developers Associate (DataCamp)	Aug 2025

Hackathons & Awards

Maximally AI Shipathon 2025 (Winner)	Sep 2025
Award Categories: MakeX Best “Experiment with AI” Project	
Syrotech MVP Hackathon 2025 (Winner)	Sep 2025
Award Categories: Great Project Prize, Best Project Prize	