AKASHS G

Software Development

9 +91 8618041675 akashsg247@gmail.com linkedin.com X

Mysore, Karnataka, India

SUMMARY

Driven software developer with expertise in Python and a solid background in Al and machine learning technologies. Skilled in designing, building, and deploying scalable applications and intelligent models to address challenging problems. Passionate about delivering innovative solutions and thriving in collaborative team environments.

EXPERIENCE

Al Software Developer

Apollo pharamacy/Apollo 247

ii 07/2024 Present Pangalore, Karnataka, India

- Built a multi-server SQL tool for executing queries across databases, improving efficiency over SSMS
- Automated monthly sales reporting from statewide branches with a centralized insights dashboard.
- Developed a Streamlit NLP web enabling natural language queries on pharmacy data without SQL knowledge.

 Used LangChain, Gemini-1.5-pro, and few-shot learning to convert natural language
- to SQL with high accuracy.
- Implemented semantic search with embeddings and optimized SQL results display using SQLAlchemy and Streamlit.

Prompt Engineer

Turing

iii 10/2024 - 11/2024 Remote

- Prompt Design: Creating effective prompts to guide Al models in delivering accurate and relevant responses.
- Model Evaluation: Assessing outputs for coherence and relevance to enhance Al model performance.
- RLHF Expertise: Contributing to Al improvement by applying Reinforcement Learning through Human Feedback to refine system behavior and responses.
- Iterative Improvement: Continuously refining prompts through testing and feedback.
- Collaboration: Working with a talented team of data scientists and machine learning
- **Documentation:** Recording key insights to inform future development.

<u>AI INTERN</u>

Infosys

= 05/2024 - 07/2024

Remote

- Developed a multi-class classification model to predict obesity risk using machine learning algorithms, improving early intervention strategies.
- Conducted data collection and preprocessing, including handling missing values, normalizing features, and encoding categorical variables.
- Performed feature engineering and exploratory data analysis (EDA) to identify key factors contributing to obesity risk.
- Deployed an interactive web application for real-time obesity risk prediction, enhancing healthcare professionals' ability to implement preventive measures.

LINKS

PORTFOLIO LINKED-IN GITHUB LEET CODE CODE CHIEF

EDUCATION

BE IN INFORMATION SCIENCE

NATIONAL INSTITUTE OF ENGINEERING

i 09/2020 05/2024 🐶 Mysore, Karnataka, India CGPA : 7.5 / 10.0

CERTIFICATIONS

- ARTIFICIAL INTELLIGENCE PRIMER CERTIFICATION - INFOSYS
- PROMPT ENGINEERING FOR EVERYONE BY **COGNITIVE CLASS-IBM**

PROJECTS

CHAT WITH DATABASE

PYTHON, LANGCHAIN, RAG, VECTORDATABASE - 2025

- Developed a Natural Language Processing (NLP) Application: Created a Streamlit web application to enable natural language queries for a pharmacy database, allowing users to retrieve data without SQL knowledge, improving accessibility and user experience.
- Integrated Al and Machine Learning Technologies: Utilized LangChain and Google Generative AI (Gemini-1.5pro-latest model) to convert natural language inputs into SQL queries, enhancing data retrieval accuracy and efficiency.
- Implemented Few-Shot Learning Techniques: Designed and applied few-shot learning with predefined examples to guide the language model in generating precise SQL queries, ensuring robust performance across varied user inputs.
- Leveraged Semantic Similarity Search with Embeddings: Employed HuggingFace embeddings and Chroma vector store to implement semantic similarity search, optimizing example selection for accurate query generation and improved system reliability.
- Configured Database Connectivity with SQLAlchemy: Set up and managed database connections using SQLAlchemy and pyodbc to interface with Microsoft SQL Server, ensuring seamless and secure data querying for the application.
- **Enhanced Data Presentation with Dynamic Formatting:** Programmed Streamlit to dynamically format SQL query results into structured tables, displaying both results and generated queries for transparency and user-friendly interaction.

Al Assistant & PDF Chatbot with Gemma3:1B

PYTHON, LLM, NLP, Vector Databases - 2025

- **Developed Advanced Chatbots:** Designed and built conversational AI interfaces using Streamlit, enabling users to interact with language models and retrieve relevant information.
- Integrated Large Language Models (LLMs): Utilized Gemma3:1b and other LLMs to power chatbots, demonstrating expertise in model integration, prompt engineering, and response generation.
- Implemented Natural Language Processing (NLP) Techniques: Applied NLP concepts, such as text processing, tokenization, and embedding generation, to enhance chatbot functionality and user experience.
- **Built Vector Databases for Efficient Search: Created** vector databases using Faiss and Sentence Transformers, enabling fast and accurate similarity searches and information retrieval.
- Designed User-Friendly Interfaces: Developed intuitive and interactive user interfaces using Streamlit, providing users with a seamless experience for uploading files, asking questions, and viewing responses.
- **Demonstrated Expertise in Prompt Engineering and** Chatbot Optimization: Crafted effective prompts, optimized chatbot workflows, and fine-tuned model parameters to improve response quality, relevance, and overall user satisfaction.

SKILLS

- Python SQL GIT Pandas numpy
- GITHUB Machine learning Statistics
- LangChain RAG Pytorch Tensorflow
- Vector Databases (e.g., Pinecone, FAISS) HuggingFace ◆ HTML ◆ CSS ◆ FLASK
- RESTAPI PROMPT ENGINEER MCP server