

VIVEK KUMAR GUPTA

Kushinagar, Uttar Pradesh, India

+91-9151429036 — vivekgupta3749@gmail.com — linkedin.com/in/vivek-gupta-0400452b6 — github.com/vivek34561

Education

Indian Institute of Information Technology (IIIT) Bhagalpur

2023 – 2027 (Expected)

B.Tech in Mathematics and Computing – CGPA: 7.51

Bhagalpur, Bihar, India

Technical Skills

Languages **Databases:** Python, MySQL, C++

Frameworks & Libraries: Pandas, NumPy, Scikit-learn, XGBoost, CatBoost, Matplotlib, Seaborn, Plotly, TensorFlow, FastAPI

Machine Learning & AI: Supervised & Unsupervised Learning, Deep Learning, Transfer Learning, Prompt Engineering, Model Optimization

NLP & Generative AI: LangChain, RAG Pipelines, OpenAI GPT-4/GPT-4o, HuggingFace Transformers, FAISS, Vector Databases (ChromaDB)

MLOps & DevOps: MLflow, DVC, Docker, CI/CD (GitHub Actions)

Software Engineering: Async Python Programming, Data Structures & Algorithms (DSA), Git/GitHub

Other Tools: Jupyter Notebook, VS Code, BeautifulSoup

Projects

CardioCare AI | Live Demo Python, Machine Learning, Streamlit, LangChain **June 2025 (Anticipated Completion)**

- Engineered a predictive system using Random Forest, XGBoost, and CatBoost with MLflow for experiment tracking, achieving accurate heart disease risk detection.
- Integrated Groq LLaMA 3 (70B) to deliver personalized diet plans, lifestyle guidance, and interactive medical chatbot support.
- Designed a secure architecture with MySQL, FastAPI backend, and dotenv for safe key management, supporting multilingual output and PDF health reports.
- Developed a modular ML pipeline ensuring preprocessing, prediction, and automated result generation with a user-friendly UI for real-time access.
- Deployed an end-to-end Streamlit application enabling real-time risk predictions and AI-generated recommendations through an intuitive web interface.

AI-Powered Interview Prep Tool | Live Demo LangChain, OpenAI, FAISS, Streamlit **January 2025 (Anticipated Completion)**

- Developed a comprehensive recruitment preparation system analyzing resumes against job descriptions using semantic similarity matching with FAISS vector stores and OpenAI GPT-4, achieving 85% accuracy in skill gap identification.
- Engineered a voice-enabled mock interview module using OpenAI Whisper STT and TTS APIs, automatically scoring candidate responses on communication, technical knowledge, and problem-solving abilities with detailed feedback generation.
- Implemented a RAG pipeline for contextual Q&A and dynamic interview question generation, personalizing 100+ technical and behavioral questions based on candidate profile analysis and identified skill gaps.
- Integrated Adzuna job search API with intelligent filtering and built an automated resume optimization engine, improving ATS compatibility scores by 40% through keyword enhancement and format restructuring.

Experience

Outlier – AI Response Evaluator (Freelance)

March 2025 – Present (Anticipated Start)

Reviewed AI outputs for accuracy and quality in English, Hindi, and coding.

Reviewed

* Assessed multilingual and technical outputs, identifying hallucinations, factual inconsistencies, and logical errors.

* Delivered structured evaluation reports to refine prompt performance, accuracy, and user experience in AI models.

Certificates

Oracle Cloud Infrastructure 2025 Certified AI Foundations Associate | Oracle **August 2025 (Anticipated)**

Generative AI Course with Langchain and Huggingface | Udemy Completed