Shrikanth Vilvadrinath

College Park, MD | [LinkedIn](#) | 240-828-0044 | shri15@terpmail.umd.edu

Education

University of Maryland, College Park — **- May 2026**
MS in Data Science - 4.0 GPA

Indian Institute of Technology -Madras, India. — **- Dec, 2024**
BSc. Data Science - 3.5 GPA

Vishwakarma Government Engineering College - Ahmedabad, India — **- June,2024**
BTech. Electronics and Communication - 3.5 GPA

Technical Skills

C/C++, Java, Python, Pandas, SQL, Numpy, TensorFlow, Pytorch, OpenCV, Machine Learning, Deep Learning, MATLAB, Git/GitHub, VS Code, Postman APIs, Excel, ReactJS, Blender 3D, Data Structures, Flask, VueJs, Django, JavaScript, Apache Spark, Apache Airflow, Kafka, Neo4j, Hive, Hadoop, Dask, LangChain, LangGraph, Ollama, LangSmith, Bash/Shell, Snowflake, Redis, Amazon S3, Firebase, Power BI, Tableau, Hugging Face Transformers, ETL/ELT.

Technical Projects

- **Generative AI Integration into Study Portal**
  Designed and deployed a Generative AI-enhanced study portal with real-time feedback, personalized problem-solving assistance, and LLM-powered interactive content generation. Integrated a live coding IDE via API, secure JWT-based authentication, and AI tutoring features to improve user engagement and learning outcomes. Applied principles of AI product development, full-stack engineering, and NLP to support scalable EdTech solutions.

- **Intelligent Navigational Robot with Bluetooth Control, CNN-Based Object Classification, and Multi-Sensor Integration**
  Built an intelligent autonomous robot with real-time CNN-based object classification and obstacle detection using ultrasonic sensors and microcontrollers (FeatherS3).
  Integrated a Bluetooth-enabled browser-based control interface and servo-based navigation system for interactive robotics simulation.
  Applied embedded ML, computer vision, and sensor fusion techniques to develop a prototype with practical robotics use cases.

- **Radiology Report Analyser**
  Developed a full-stack AI-powered Radiology Report Assistant using Ollama, LangChain, and Flask, capable of parsing diagnostic PDFs and highlighting key clinical terms. Enabled click-to-explain definitions, AI-generated follow-up suggestions, and a conversational Q&A mode to simulate assistant radiologist support. Streamlined radiologist workflows and improved medical document interpretability across 100+ test reports during development. Applied advanced LLM techniques to enhance real-time clinical comprehension and user engagement in radiology contexts.

Work Experience

NV Rad Imaging - Tampa, Florida, US
AI Technical Intern — **May, 2025 - August, 2025**
As an AI Technical Intern at NV Rad Imaging, I built a radiology-focused assistant using Ollama, LangChain, and Flask to analyze diagnostic PDFs and deliver real-time, interactive insights. The tool highlights medical terms, offers AI-generated explanations, and supports Q&A interactions simulating an assistant radiologist. Through this project, I gained deep experience working with LLMs in healthcare and applying AI to real-world medical workflows.

AI Himalaya Labs - Remote, India
AI Research Intern / Full Stack developer — **Feb, 2024 - April, 2024**
During my internship at AI Himalaya Labs, under the guidance of Arifa Khan, an esteemed Ethereum Partner, I focused on cutting-edge AI technologies. I developed full-stack websites, leveraged advanced AI models, and crafted AI products using tools like React, Python, Flask, and SQL. This experience enhanced my technical skills and provided valuable insights into the practical applications of AI. Working with Arifa Khan and the team was instrumental in my professional development, enriching my understanding of AI's real-world impact.

Fx31 Labs (Formerly Fractal31) - Ahmedabad, India
Python developer — **March, 2023 - August, 2023**
Worked on GoDot, Blender and Python to make some interesting robotic simulations. Used GoDot for simulations and making some virtual interface to connect with the robot. Used Blender to make some equipment (Servo Motors, Arms, Body, etc.) for the Robot. Used Python as an interpreter, between the user and the robot for the ease to control it.

Accomplishments

Python, DSA Competition Rank 5 in Programming Competition conducted by IITM Madras BSc Programming, Data Structures And Algorithms using Python course.
NumPy Library Successfully completed Online Proctored Exam for Machine Learning Techniques and Displaying Proficiency in NumPy Library.
Core Media Team Member Co-led the creation and editorial process of college and departmental newspapers, resulting in improved content quality and increased readership.
Member of Code: Black at University of Maryland-College Park, fostering a culture of coding and collaboration.
Core member of the Discourse Forum and **Discord Help Team** at IIT Madras, providing guidance to peers and enhancing community engagement.