Ananya Ananth

ananya.ananth.jain@gmail.com | +1 (801) 662-8290 | linkedin.com/in/ananyaananth | github.com/ananyaananth29

Education

University of Utah, Salt Lake City, UT
Master of Science in Computer Science (2024 – 2026) | GPA: 3.78

Nitte Meenakshi Institute of Technology, Bengaluru, India
Bachelor of Engineering – Information Science and Engineering (2019 – 2023) | CGPA: 9.27/10 (5th Rank)

Experience

Site Reliability Engineer | IBM
Jul 2023 – Jul 2024 | Bengaluru, India

- Supported Datacap, FileNet & CMOD SaaS offerings on IBM Cloud, ensuring availability, performance, and incident response as per SLA.
- Led the Security Remediation Project, reducing system vulnerabilities by 40% through monthly patching and server upgrades, ensuring compliance with industry security standards.
- **Developed an AI-powered data analytics tool** using IBM Watsonx, FastAPI, ReactJS, and DB2, reducing manual reporting efforts by 70% and improving data retrieval speed**.**

Software Engineer Intern | IBM
Feb 2023 – Jul 2023 | Bengaluru, India

- Designed and **implemented automation scripts** using **Ansible and Python** for repetitive operational tasks, cutting manual workload by 40% and reducing operational downtime by 30%**.**
- Created **training materials** on IBM Enterprise Saas offerings solutions to **onboard new team members**.

Research Assistant | University of Utah Health - Moran Eye Center
May 2025 – Present | Salt Lake City, UT

- Developed a deep learning convolutional neural network (CNN) to identify early-stage diabetic retinopathy by segmenting retinal blood vessel walls in Adaptive Optics Scanning Laser Ophthalmoscopy (AOSLO) images.
- Implemented a UNet architecture from scratch as a benchmark to evaluate and compare the performance of the nnUNet framework for vessel wall segmentation.
- Future scope includes Integrating the trained model into a user-friendly application suite to allow ophthalmologists to upload AOSLO scans and receive automated vessel segmentation results, supporting clinical decision-making.

Projects

- **AI-Powered Chatbot for SRE Assistance | IBM Watsonx Challenge 2024**

Built a Retrieval-Augmented Generation (RAG) AI chatbot that reduced issue resolution time by 40%, improving customer support efficiency. (Tech Stacks: **Watsonx AI, Python, Milvus DB, and IBM Cloud**)

- **Graph Simplification & Visualization | Scientific Computing and Imaging Institute - University of Utah**

Researched **graph motif simplification techniques** to enhance large-scale visualization, under **Dr. Paul Rosen** (Tech Stacks: D3.js, NetworkX, Matplotlib, Jupyter Notebooks)

Technical Skills

Programming Languages: Python, Java, C, C++, JavaScript, SQL, R, YAML
Cloud & DevOps: IBM Cloud, Google Cloud (GCP), AWS (Basic), Ansible, Docker, Kubernetes, CI/CD (Jenkins), Shell Scripting (Bash, PowerShell), GitHub, Git, CHPC, Slurm
Machine Learning & AI: LLMs, ML, NLP, Transformers, Deep Learning (PyTorch, TensorFlow), Retrieval-Augmented Generation (RAG), IBM Watson, Predictive Analytics
Data Science & Analytics: Pandas, NumPy, Matplotlib, Seaborn, SciPy, Scikit-Learn, Image Analysis
Databases & APIs: Milvus DB, PostgreSQL, MongoDB, IBM DB2, GraphQL, REST APIs
Software Development: FastAPI, Flask, ReactJS, Next.js, Microservices Architecture, Agile, Salesforce, Slack
Soft Skills: Curiosity, collaboration, communication, teamwork, creativity, cross-functional collaboration.