

Sri Satya Vinay Venneti

srisatyavinay11@gmail.com | Ann Arbor, MI
linkedin.com/in/srisatyavinay | github.com/srisatyavinay | srisatyavinay.in

Education

University of Michigan, Ann Arbor

Aug 2026 – May 2028 (Expected)

M.S. in Computer Science and Engineering

Ann Arbor, MI

- Coursework: Advanced Scalable Systems, Advanced Compilers, Natural Language Processing

IIIT Hyderabad

Nov 2020 – May 2024

B.Tech with Honors in Computer Science and Engineering; CGPA: 9.18/10; Dean's List (top 5%)

Hyderabad, India

- Coursework: Data Structures and Algorithms, Computer Networks, Network Security, Machine Learning

Experience

Wells Fargo

Hyderabad, India

Software Engineer

Sep 2025 – Jul 2026

Program Associate

Aug 2024 – Sep 2025

- Built backend services and REST APIs for a multi-agent marketing-orchestration platform, one of the company's top-3 AI initiatives, cutting campaign time-to-market from 6 months to under 2 hours; earned a Team Spotlight Award.
- Integrated third-party CRM vendor agents over the A2A and MCP protocols, and built lifecycle-event monitoring and Arize Phoenix tracing with a golden evaluation dataset to catch regressions.
- Deployed containerized services to Red Hat OpenShift through GitHub Actions and Harness CI/CD pipelines.
- Developed ETL workflows consolidating customer data from multiple sources into a Unified Customer Profile in Adobe Experience Platform, the single source of truth for campaign eligibility.
- Modernized a terabyte-scale legacy data pipeline with offer-code processing and real-time alerting, ensuring eligibility checks ran on 100% of the latest qualified customer data.
- Built Python and Spark automation that cut dataset-provisioning time by 90% (6 hours to 30 minutes).

Remedo Clinitech

May 2023 – Jul 2023

Backend Developer Intern

Remote

- Built unit-test coverage for the core TypeScript/NestJS backend (Jest, TypeORM) and integrated an embedded database into NestJS's test framework, cutting test runtime by 60%; the new tests exposed 4 critical bugs.

CSTAR Lab, IIIT Hyderabad

May 2022 – May 2024

Research Associate

Hyderabad, India

- Designed the blockchain architecture and Hyperledger Fabric smart contracts for a MeitY-funded privacy-preserving data-retrieval prototype; migrated it from a single node to a multi-node network for scalability and fault tolerance.

Virtual Labs, IIIT Hyderabad

Jan 2022 – May 2022

Software Development Engineer Intern

Hyderabad, India

- Built 10 interactive VLSI simulations (JavaScript, jsPlumb, Bulma) for a Government of India (MHRD) e-learning initiative and modernized a 10-year-old legacy site, eliminating frequent hangs and high latency.

Projects

Declarative Computer-Use Interface for macOS Agents | Python, LLM Agents

Aug 2026 – Present

- Porting the Declarative Model Interface (Wang et al., 2025: +67% task success, 43.5% fewer steps on Windows) to macOS.
- Built a graph of application menu states and a path planner that turns one declarative request into the full click sequence, cutting agent actions per target state from 4–5 to 1.

GenAI Incident-Resolution Platform | React, Flask, REST, LangChain, Gemini, ChromaDB

- Built a full-stack platform with a context-aware chatbot, automated root-cause summaries and related-incident retrieval.
- Implemented vector similarity search over past incidents using Gemini embeddings and ChromaDB.

Unix Shell | C, Linux, System Calls

- Built a Unix-like shell with 8+ built-in commands, job control (fork, execvp, signals), I/O redirection and piping.

Technical Skills

Languages: Python, Java, C++, C, JavaScript, TypeScript, SQL, Bash

Frameworks: Spring Boot, Node.js, Express, NestJS, Flask, React, REST APIs, Apache Spark, Jest

Cloud & DevOps: Azure, AWS, Docker, Kubernetes, Red Hat OpenShift, Helm, GitHub Actions, Harness, Jenkins

Data & Tools: PostgreSQL, MySQL, MongoDB, Prometheus, Grafana, SonarQube, Linux, Git

AI & MarTech: Google ADK, LangChain, LangGraph, MCP, A2A, Adobe Experience Platform, CRM Integration

Certifications: Microsoft Certified Azure Developer Associate, Azure Administrator Associate, Azure AI Engineer Associate