

Aayush Gavande

+1 5512347441 | aviaayush@gmail.com | Jersey City, NJ | [in/aayush-gavande](https://in.aayush-gavande)

Education

MS Computer Science [Stevens Institute of Technology](#) Hoboken, USA 2022-2024
BE Computer Engineering, Honor's: Data Science [Savitribai Phule Pune University](#) Pune, India 2018-2022

Skills

- **Programming Languages:** Python, C++, MySQL, NoSQL, PL/SQL
- **Machine Learning:** TensorFlow, PyTorch, Sklearn, OpenAI, HuggingFace, LLM, LangChain, VAE, GANs
- **Data Analysis & Visualization:** Tableau, Excel, Pandas, NumPy, Matplotlib, PySpark, XGboost, Prompt Engineering
- **Cloud Platforms:** AWS, Google Cloud Platform, Docker, Databricks, Vector DB, Spark, Airflow
- **CI/CD:** Jenkins, Git, AWS Code Pipeline
- **Marketing Analytics Tools:** Big Query, Meta Ads, TikTok Ads, Google Ads, Google Analytics

Professional Experience

Fraud Analyst and Junior Data Scientist Intern, ([Experian](#)) Scottsdale, AZ 07/2024 – Present

- Reduced fraudulent transactions by 30% through the implementation of an AI-driven third-party fraud detection system, leveraging Python, PySpark and SQL for data analysis and model development.
- Optimized existing fraud detection machine learning model, decreasing false positives by 25% and improving fraud detection by 28%.
- Automated the process for first-party and third-party identity theft detection for client, reducing manual workload for fraud investigation by 20 hours per week.
- Obtained GenAI certifications and conducted in-depth research on Experian GPT's capabilities for enhancing fraud detection through prompt engineering.

Marketing Analyst and Data Science Intern, ([Bayer Corporation](#)) Whippany, NJ 06/2023 - 02/2024

- Productized cost-effective image generation Generative AI model (Python, Google Vertex AI, Palm 2 LLM) for automated creative production, reducing costs by 99% (from \$5,000 to \$50 per creative) and boosting efficiency.
- Built LLM-based summarization tool (Vertex AI) for automated Tableau dashboard insights extraction, streamlining reporting and improving team efficiency by providing monthly automated reports.
- Designed and implemented Tableau dashboards for UMM, MTA, and MMM data integration, providing brand teams with real-time insights for data-driven decisions for omnichannel marketing.

Software Developer Intern, ([Persistent Systems](#)) Pune, India 01/2022 - 06/2022

- Orchestrated and guided a highly collaborative software engineering team in developing scalable software solutions leveraging Java and Spring Boot, resulting in 40% cost savings per quarter.
- Optimized complex business logic with Drools rule engine resulting in 30% less system downtime.

Cloud Developer Intern, ([Cloud-Plus-plus](#)) Pune, India 06/2021 - 01/2022

- Achieved AWS certification and implemented CI/CD pipeline for company website, increasing development speed by 15% and reducing downtime by 30%.
- Led application migration to AWS Cloud for hybrid infrastructure, optimizing performance and reducing cost by 27%.

Projects

ECS Identity Theft Fraud Detection | *Python, PySpark, Scikit-Learn, SageMaker, Tableau, Feature Engineering*

- Developed a new machine learning model using CatBoost to detect third-party identity fraud, achieving an 88% fraud capture rate.
- Integrated multiple data assets (Identity Check, Device Attributes, FraudNet, Precise ID) to enhance fraud detection capabilities by 28% compared to the previous model.

Credit Card Fraud Transaction Detection | *Python, MySQL, Pandas, Scikit-Learn, AWS, Predictive Modeling*

- Built a real-time fraud detection system (XGboost model) achieving 90% accuracy, identifying suspicious transactions and notifying clients for potential loss prevention.

Automated GenAI Creatives for Advertisement | *Python, Scikit-Learn, Google Vertex AI, LLM, Prompt Engineering*

- Created a low-latency web application powered by AI using Flask. This application facilitates the generation of personalized creatives for brand advertising through straightforward text prompts. It utilizes Stable Diffusion and provides customization options based on brand templates
- Achieved a more than 99% reduction in the production cost of personalized creatives and shortened the production time for each creative by more than 2 weeks

LLM Based Q&A Chatbot for Insurance Claims | *Python, LangChain, AWS Bedrock, Vector DB, Open AI*

- Developed a next generation chatbot utilizing Llama2 LLM and RAG technology for natural language search, reducing information retrieval time by over 50% for customer inquiries.
- Architected and deployed a scalable RAG pipeline on AWS to enhance search and retrieval capabilities, utilizing Bedrock, OpenSearch, Lambda, Fargate, and API Gateway.