

Pratham Pansare

Full-Stack & AI Developer | prathamwork2511@gmail.com | [My Portfolio](#) | github.com/Pratham2511 |

EDUCATION

A. P. Shah Institute of Technology, Thane
B.Tech in Information Technology, University of Mumbai

Thane, MH
Expected 2027

OPEN SOURCE / INDEPENDENT DEVELOPMENT

Independent AI/ML Developer

2024 – Present

Remote / Contract

Production systems — model to interface

- Designed and shipped 7 end-to-end production systems independently, spanning graph ML for cybersecurity, LLM tooling, computer vision for agriculture, and Android applications
- Each system built from model to API to interface — covering GNN pipelines, multi-provider LLM integration, and mobile-first deployment
- Available for contract and freelance engagements

PROJECTS

TGDetect ↗ | *Python, PyTorch, FastAPI, GraphSAGE*

2026

- Built a cybersecurity threat detection system using temporal heterogeneous graphs and a GraphSAGE+GRU pipeline; ROC-AUC 0.9999 on held-out CTU-13 botnet data
- Engineered zero-copy Parquet streaming + vectorized analytics: 130k events in ~200ms
- Designed interactive temporal graph visualization with force-directed physics and threat-prioritized subgraph sampling

Verbis ↗ | *TypeScript, Python, FastAPI, VS Code Extension*

2026

- Developed AI database assistant with terminal REPL, NL→SQL generation, and privacy-shield schema anonymization
- Implemented multi-provider LLM integration (Gemini/Groq/Ollama) with OS keychain security and read-only execution guards
- Built schema explorer with live ER diagram, query history tree (ReactFlow DAG), and business glossary editor

ShetVaidya ↗ | *React, FastAPI, TensorFlow MobileNetV2*

2025

- Created crop-disease inference platform with MobileNetV2; V2.0 safety logic (non-leaf rejection + confidence gating)
- Built medicine verification + batch-check flow with mobile-first UI and R2 image storage
- Integrated barcode scanning (ZXing) and mobile profile dashboard for field-level crop diagnosis

Kivo ↗ | *TypeScript, Next.js, PostgreSQL, Prisma*

2026

- Built a local research workspace for scholarly discovery with federated academic search (Crossref, arXiv, Europe PMC)
- Implemented evidence matrix, comparison selection, PDF extraction with SHA-256, and BibTeX/RIS export for literature reviews
- Designed responsive reading panel with passage capture, source tracking, and living-search worker for new publication alerts

TECHNICAL SKILLS

Languages: Python, TypeScript, JavaScript, SQL, C/C++

Frontend: React, Next.js

Backend: FastAPI

Databases: PostgreSQL, Supabase

AI / ML: PyTorch, TensorFlow, GraphSAGE, LLM integration, prompt engineering, RAG

Mobile / Other: Kotlin, Jetpack Compose, Capacitor, Cloudflare R2

Tools: Git, Docker, Vercel, Hugging Face

Available for contract and freelance engagements.