

Harsh Kumar

3000harshkumar@gmail.com | +91-7248132705 | linkedin.com/in/harshkumar
harshkumar.github.io | GitHub

SUMMARY

Computer Science Engineer with hands-on experience in full-stack development, AI/ML integration, and UAV systems. Built and deployed production-grade projects using React, FastAPI, and LLM APIs.

EDUCATION

- Noida Institute of Engineering and Technology** Nov 2022 – June 2026
B. Tech, Computer Science and Technology Percentage: 71.3

TECHNICAL SKILLS

Languages: Python · Java · JavaScript (ES6+)
Frameworks & Libraries: React.js · Node.js (Express) · FastAPI · Flask · Tailwind CSS
Databases: PostgreSQL · MySQL
Developer Tools: Git/GitHub · Postman · Vercel · Render
AI/ML: PyTorch · OpenCV · RAG Systems · LLM API Integration
Engineering & Hardware: UAV Systems · IoT · Fusion 360 CAD

PROJECTS

- RepoLens** | React · Node.js · Express · PostgreSQL · Prisma · Claude API | GitHub Feb 2026 – March 2026
- Built full-stack AI tool generating 8 structured documentation pages from GitHub repositories.
 - Developed 4-layer ingestion pipeline with OAuth, caching, rate-limit handling, and WebSocket updates.
 - Implemented PDF/Markdown export, React UI, and Mermaid-based architecture and database diagrams.
- Frontier** | FastAPI · Next.js · OpenCV · YOLO · SQLite | GitHub Sep 2025 – Oct 2025
- Engineered a real-time video processing pipeline for object detection and event generation from webcam and video sources.
 - Designed a zone-monitoring engine supporting custom regions and automated intrusion detection workflows.
 - Developed a full-stack dashboard with event logging, analytics, and WhatsApp notifications for events.
- Language Translator** | Python · FastAPI · React · Tailwind · Whisper | GitHub Jun 2024 – Jul 2024
- Built a real-time speech translation pipeline processing live audio streams with sub-500ms response latency.
 - Implemented FastAPI backend integrating Whisper STT, GoogleTranslator API, and WebSockets supporting concurrent client connections.
 - Optimized audio decoding using FFmpeg and faster-whisper, reducing inference time by ~30% during testing.

ACHIEVEMENTS & LEADERSHIP

- Smart India Hackathon (SIH) 2024** - Selected for Grand Finale from 86,000+ institute-level teams; built and demoed a working solution under 36-hour constraints.
- Team Lead - Drone Development Competition** - Led full UAV build lifecycle - frame assembly, ESC integration, flight controller setup, and testing - within competition deadlines.

CERTIFICATIONS

- AI-900: Microsoft Azure AI Fundamentals** - Infosys Springboard Apr 2025
- Python for Data Science, AI & Development** - IBM / Coursera May 2023