

Sahil Warade

sahilwarade12@gmail.com | +91 80100 43302 | Portfolio | LinkedIn | GitHub

Skills

Programming Languages: Python, C++

Machine Learning & AI: Machine Learning, Artificial Intelligence, TensorFlow Lite, Model Maker

Web Technologies: HTML, CSS, JavaScript, Flask, MERN Stack

Technical Clubs: PICT IEEE Student Branch (PISB), PICT CSI (PCSB), PICT CyberCell

Experience

AI-Powered Drowsiness Detection System

Feb 2025 – Apr 2025

Research Intern, PICT

- Developed a full-stack AI system to enhance driver safety by detecting drowsiness in real-time. Utilized Flask, OpenCV, and TensorFlow for video processing and eye state prediction, integrated with WebSocket for seamless frame handling. Implemented a React frontend and Bootstrap dashboard for live detection and event analytics, stored in SQLite. Incorporated a voice assistant using pyttsx3 and Ollama's Gemma3 for interactive alerts. Overcame challenges in optimizing WebSocket performance and speech recognition. Demonstrated expertise in computer vision, machine learning, and full-stack development, creating a scalable solution for automotive safety.

Education

SCTR's Pune Institute of Computer Technology (SPPU), Pune, India

2022 – 2026

Bachelor of Engineering in Information Technology, CGPA: 8.01

Honours in Data Science (2024–2026)

St Paul School, Nagpur – Class XII (HSC): 94%

Montfort School, Nagpur – Class X (CBSE): 90.40%

Projects

Advancements in Malware Detection

- Built ML models (KNN, XGBoost, Voting Classifiers, Random Forest) to classify executables as malicious or benign.
- Achieved high accuracy and reduced false positives via rigorous model validation.

YouTube Comments Sentiment Analysis (Team Project)

- Developed a Python-Flask web app to analyze video comments.
- Generated graphical sentiment analysis reports.

Wanderlust (Team Project)

- Built a full-stack hotel booking platform using the MERN stack.
- Implemented secure authentication with encrypted passwords and JWT.

Publications

AI-Powered Drowsiness Detection using LLM

Journal of Technology, Volume 13, Issue 6, 2025, pp. 954–958

ISSN: 10123407, DOI: 18.15001/JOT.2025/V1316.25.1666

Sentimental Analysis: A Comparative Study over Different Social Media Platforms

PICT's International Journal of Engineering and Technology, Vol 2 Issue 2, PIJET 09 ISSN: 2584-2668

June 2025

Certifications

- AI-ML VIRTUAL INTERNSHIP -Google For Developers by AICTE
- Networking Cloud Virtual Internship at Juniper Networks by AICTE
- Unlocking Java : Core Java , J2EE and Android Essentials by PICT
- Basic Certificate Course in Artificial Intelligence by CDAC