TANISHQ THUSE

Portfolio | tanishq.thuse23@vit.edu |





Education

Vishwakarma Institute of Technology, Pune

SY B.Tech Student in Computer Science and Engineering(Artificial Intelligence)

2023 - 2027 **CGPA** - 8.9

Nowrosjee Wadia College, Pune

2021 - 2023

Class 12 (PCM+Electronics)

Percentage - 80%

Experience

SIH'24 Grand Finalist | Smart India Hackathon 2024

Sep 2024 – December 2024

• Contributed as a technical team member to develop a browser-based Face Liveness Detection solution for UIDAI's face authentication platform. Worked on optimizing ML models for active and passive liveness detection using TensorFlow.js and ONNX.js, ensuring sub-500ms inference time and a model size under 5MB to support low-bandwidth usage.

Data Science Intern | Cognify Technologies

May 2024 - Jun 2024

- Assisted in data preprocessing and building ML models, improving model performance by 15%.
- Developed Python scripts for data cleaning and automation, reducing processing time by 30%.
- Collaborated on data analysis projects using Pandas, NumPy, and Scikit-learn.

Web Development Head | *ISA VIT Pune*

Nov 2024 - Present

- · Led a team of web developers in designing and deploying multiple projects for the ISA (International Society for Automation) VIT Pune Student Section, enhancing the club's digital presence.
- · Fostered collaboration and skill-building within the team, promoting innovation and technical growth.

Open Source Head | *Team Quark VIT Pune*

Nov 2024 - Present

- · Led a team of developers in designing and deploying various open-source projects, improving digital outreach and engagement within the college community.
- Actively encouraged and guided team members to participate in open-source events like Hacktoberfest, fostering skill development and contributing to their personal growth in the open-source ecosystem.

Projects

Face Anti-Spoofing Detection System | Python, OpenCV, Machine Learning, Flask Smart India Hackathon 2024 (Grand Finale)

Nov 2024

- Engineered an advanced face liveness detection system to secure UIDAI's browser-based authentication platform, addressing vulnerabilities such as photo, video, and 3D mask spoofing.
- Shortlisted for the SIH 2024 Grand Finale, recognized for meeting stringent functional requirements and delivering an innovative edge-computing solution.

LegalGPT: AI-Powered Case Law & Statute Retrieval | RAG, LLM, FAISS, OpenAI, LangChain

June 2024

- · Built and Al-driven legal research system using RAG and FAISS for efficient case law retrieval, integrating OpenAI embeddings and LangChain for structured query handling.
- Implemented semantic search with vector databases, enabling precise case law recommendations, NLP-based query interpretation, and enhanced legal compliance analysis.

Smart Learning Management System | MERN Stack, AI-based Content Curation

Dec 2023

- Conceptualized and built a comprehensive full stack website for managing labs in the college environment.
- Implemented Socket Programming to enable features such as attendance monitoring and doubt resolution, reducing 30% administrative workload.

Achievements

- Top 11/497 teams in Internal SIH at VIT
- Shortlisted for SIH Finale 2024 (Dec 2024)
- 150+ Days on LeetCode & 100+ On CodeChef

- Top (13.4%) @LeetCode Max (1,696)
- 500+ questions solved on Leetcode
- Contributor @GSSoC'24 Open Source Event

Technical Skills

Languages: C, C++, Java , Python, HTML/CSS, Javascript

Technologies: Tensorflow, Numpy, Pandas, Linux, GitHub, Flutter, Android, Firebase, Arduino

Coursework: Data Structures and Algorithms, Operating Systems, Artificial Intelligence, Data Visualization, Problem Solving and Programming, Robotics

Other Skills: Competitive Programming, UI & UX Design, Figma, Canva, MS Office, Graphic Designing, Digital Marketing,

Profile Links

Codolio: https://codolio.com/profile/TanishqThuse
LeetCode: https://leetcode.com/u/TanishqThuse/

 ${\it CodeForces:} \underline{\it https://codeforces.com/profile/TanishqThuse}$

LinkedIn: https://www.linkedin.com/in/tanishq-thuse-32472b248/

Github: https://github.com/TanishqThuse

Codechef: https://www.codechef.com/users/tanishq_thuse

GeeksForGeeks: https://www.geeksforgeeks.org/user/tanishqtma6q/

AtCoder: https://atcoder.jp/users/TanishqThuse