# Jayendra Rathod

→ +91-7058519325 

jayendrarathod07@gmail.com in LinkedIn 

GitHub 

LeetCode

# Summary

Computer Science student with 2+ years of coding experience with strong specialization in Machine Learning and Data Science. Solved 150+ LeetCode problems demonstrating solid DSA expertise. Experienced in Python, MySQL, and computer vision with hands-on AI project delivery. Fluent in Hindi, Marathi, and English, with proven ability to apply software development to real-world problems.

#### Education

#### VIT Bhopal University

May 2026

Bachelor of Technology in Computer Science Engineering, CGPA: 7.45

Sehore, MP

#### Experience

**TPP** Consultation

Dec 2024 - Feb 2025

Data Engineer Intern

Hybrid

- Optimized MySQL queries and data models, improving data retrieval efficiency for 3 client project
- Designed and maintained ETL pipelines using Python and SQL to process large datasets for reporting and analysis.
- $\bullet$  Enhanced data pipelines by adding logging and error-handling, improving processing speed by 30%
- Automated data cleaning and transformation workflows, ensuring high data accuracy and consistency.

#### **Projects**

Reinforcement Learning Stock Trading Agent | Python, TensorFlow, Stable-Baselines3, MySQL

Oct 2024

- Composed AI trading agent using Deep Q-Network (DQN) trained on 10,000+ historical stock data points.
- Developed custom trading environment with OpenAI Gym, integrated with MySQL database containing 2+ years of market data.
- Implemented reward-based learning system with 95% accuracy in buy/sell signal generation across 500+ test scenarios.
- Utilized NumPy and Matplotlib to achieve 15% improvement in trading accuracy and 12% higher returns over 6-month testing period.

#### Virtual Keyboard with Hand Tracking | Python, OpenCV, MediaPipe, Tkinter

Nov 2024

- Completed computer vision-based virtual keyboard supporting 26 alphabets and 10 numbers with 95% keystroke accuracy.
- Constructed Tkinter interface supporting 500+ words per minute typing speed with real-time visual feedback system.
- Integrated MediaPipe framework detecting 21 hand landmarks with 95% accuracy across 1,000+ test gestures.
- Deployed and optimized the project on AWS, ensuring smooth real-time performance and scalability.

#### Namaste AI – Generative Mental Health Chatbot | Python, OpenAI API, Olama 3, MySQL

Jan 2025

- Built generative AI chatbot delivering empathetic, human-like responses for stress, trauma, and anxiety support.
- Implemented sentiment analysis and risk detection pipeline to auto-suggest verified mental health helpline numbers.
- Integrated FastAPI backend with Node.js middleware, containerized via Docker, and deployed on AWS.
- Enabled secure and scalable storage with MySQL, ensuring data privacy and real-time response handling.

## **Technical Skills**

Programming Languages: C++, Python, Java

Technologies & Frameworks: OpenCV, MediaPipe, TensorFlow, Stable-Baselines3, Flask, Tkinter

Databases & Tools: MySQL, AWS, Git, GitHub

Core Competencies: Data Structures & Algorithms, Machine Learning, Computer Vision, Data Analytics, DBMS, OOP

## Certifications

- SQL on Oracle Cloud (Oracle University)
- Problem Solver DSA (FacePrep)
- Computer Vision (Vityarthi)

- Python Essentials (Vityarthi)
- OCI Generative Al Professional (Oracle University)
- Data Analytics Fundamentals (Coursera)

## **Extracurricular Activities**

Deloitte job simulation (Data Analysis) - Built Tableau dashboard; analyzed data in Excel.

SMM Team Core Member, AI Club VIT Bhopal - Social media management and AI project coordinator

EM Team Core Member, Linux Club - Event management and technical workshop organization

Volleyball Player, Svabhimani Club Akola - Team sports and leadership development