# Ruthick Madamsetti

**I** ruthick765@gmail.com

**J** +91 7793977136 |

in <u>LinkedIn</u>

<u>GitHub</u>

Portfolio

#### **Summary**

Computer Science and Engineering (AI & ML) undergraduate with a strong academic foundation and hands-on experience in Machine Learning, Deep Learning, Natural Language Processing, and Web Development. Proficient in Python, C++, JavaScript, SQL, and familiar with tools and frameworks such as TensorFlow, Keras, OpenCV, Pandas, NumPy, AWS, Git, and Google Colab.Currently serving as a Teaching Assistant at NxtWave, providing support in Python programming and debugging Experience includes developing CNN-based facial expression recognition systems, legal text classifiers using BiLSTM and causal inference (GFCI), and privacy-preserving facial recognition via machine unlearning.Completed internships at Swecha and IBM SkillsBuild, contributing to AI research, data handling, and model optimization. Published research in IEEE and ScienceDirect, demonstrating strong technical writing and implementation skills. Seeking opportunities to apply AI and software engineering skills to real-world problem-solving in dynamic environments.

#### **Projects**

## **Emotion-Aware Recommendation System Using ML**

- Developed CNN-based facial expression recognition using Python, OpenCV, TensorFlow.
- Extracted facial landmarks for personalized activity and quote suggestions.

#### **Legal Inference using Causal NLP Models**

- Applied the GFCI (Greedy Fast Causal Inference) algorithm to uncover causal structures within Indian legal case texts, identifying key cause-effect chains related to legal outcomes.
- Developed and trained a BiLSTM model to classify legal charges based on contextual features from case descriptions, improving charge prediction automation.

## **Experience**

# Teaching Assistant – Python Programming, NxtWave

Mar 2025 – Present

Teaching Assistant Portfolio

- Solved doubts and explained Python programming concepts.
- Guided students on debugging, logic, and algorithm optimization.

#### **Education**

#### B.Tech, CSE (AI & ML), BVRIT, Telangana

2022-2026

• CGPA: 8.47 (till 5th semester)

#### Intermediate (MPC), Krishnaveni Jr College, Khammam

2022

• Score: 97.2%

#### SSC, St Francis De Sales High School, Khammam

2020

• Score: 10 GPA

#### Skills

Languages: Python, JavaScript, C, C++

Web: HTML, CSS, JavaScript

Databases: MySQL

**Tech:** Machine Learning, Deep Learning, AWS, Git **Libraries:** Pandas, NumPy, Matplotlib, Keras, TensorFlow **Tools:** vs code, Jupyter Notebook, Google Colab, Figma, Flutter **Others:** DSA, OOP, OS, CN, Version Control, Debugging

### Internship

#### IBM SkillsBuild Virtual Internship - CSRBOX

Oct 2024 - Nov 2024

• Hands-on in data handling and ML techniques.

#### Summer of AI Internship - Swecha

May 2024 – Jun 2024

• Worked on AI research and optimization for cultural/linguistic applications.

#### **Certificates**

- Introduction to LLMs NPTEL (IIT Madras), Apr 2025
- Deep Learning for NLP NPTEL (IIT Kharagpur), Apr 2025
- Developer Foundations NxtWave, Apr 2025
- AWS ML Foundations AWS Academy, Mar 2025
- Python Foundations NxtWave, Feb 2025
- Introduction to Database NxtWave, Feb 2025
- Mastering Data with ML IBM SkillsBuild, Nov 2024
- Soft Skills (Silver+Elite) NPTEL (IIT Roorkee), Nov 2024
- Summer of AI Internship Swecha, July 2024
- Joy of Computing Using Python(Silver+Elite) NPTEL (IIT Ropar), Nov 2023
- Build Your Own Static Website NxtWave, Aug 2023

#### **Publications**

# Securing Personal Identity in Facial Recognition: The Shift to Machine Unlearning

Dec 2024

IEEE ICSES, Nepal - 10.1109/ICSES63445.2024.10763384

# Integrating NAS for Human Pose Estimation

To be published

ScienceDirect, ICEMCSN 2024