MOHAMMED SAQLAIN

Portfolio: http://sq1754.tech/

Summary

Motivated Computer Science Engineering undergraduate with practical experience in data analysis, data science, and machine learning. Skilled in designing and implementing efficient, scalable solutions, and improving processes to achieve tangible outcomes. Experienced in collaborating within teams and applying modern technologies to solve technical challenges. Aspiring to contribute to impactful, forwardthinking projects in the technology domain.

Technical Skills

Languages and Databases: Python (Pandas, NumPy, Scikit-learn, TensorFlow, PyTorch), Java, MySQL, HTML, CSS, JavaScript

Visualization Tools: Matplotlib, Seaborn, Apache Spark, Hadoop

Other Skills: Business Analysis, Data Analysis, Full stack Development

Experience & Projects

Government Engineering College, Ajmer

June 2024 - Present

Rajasthan, India

Drone Forensic Research Intern

- Analyzed 200+ .DAT files using tools like DATCon and CsvView, converting raw data into actionable CSV, log, and KML datasets, reducing analysis time by 35%.
- Preprocessed datasets and conducted **feature selection**, leading to a **20% increase** in machine learning model accuracy.
- Automated **feature selection workflows**, boosting model training efficiency by **40%**.
- Conducted literature reviews of state-of-the-art methodologies, improving optimization strategies by 25%.
- Designed an automated data preparation pipeline, reducing manual efforts by 50% and enhancing workflow reliability.

Smart India Hackathon

September 2024 - December 2024

Face liveness Detection Project

- Co-developed a real-time face liveness detection system using a CNN-based MobileNetV2 model, achieving 95% accuracy.
- Optimized model size to under 5MB and reduced inference time to 500ms for seamless real-time detection.
- Designed and implemented advanced anti-spoofing mechanisms, strengthening security against attacks via photos, videos, and 3D models.
- Built an **interactive user interface** featuring:
 - Eve Calibration: Dynamic eve-tracking, increasing detection accuracy by 15%.
 - Voice Detection: Real-time speech authentication, enhancing user experience.
- Fine-tuned the model for a **20% improvement** in detection efficiency compared to benchmarks.

Smart India Hackathon

September 2024 – October 2024

Deep fake Video detection Project

- Developed a **deepfake detection pipeline**, achieving 92% accuracy in identifying fake videos.
- Optimized **preprocessing pipelines** to handle **large datasets** efficiently, reducing computation time by 15%.
- Utilized Haarcascades and Facenet-PyTorch for scalable and reliable face detection and feature extraction.
- Visualized results with **Matplotlib** and **Seaborn**, improving stakeholder understanding of model insights.

Alumni Association of ECA

Alumni Website Project

January 2024 - March 2024

- Led the creation of a full-stack alumni website using the Ionic framework, enhancing alumni communication and engagement.
- Implemented interactive features and optimized performance, reducing page load times by 25%.
- Improved user satisfaction by 30% through a responsive, user-friendly interface.

Awards & Recognition

- Finalist, Smart India Hackathon 2024 Developed a face liveness detection system with 95% accuracy.
- **Top Performer, Deepfake Detection Challenge** Achieved 92% precision in detecting fake videos.
- Academic Excellence Award Scored 91.2% in CBSE 12th Standard, ranking among the top performers in the batch.

Education

Government Engineering College, Ajmer

Bachelor of Technologies in Computer Science Engineering

Current CGPA: 9.15

Ajit Vidhya Mandir School, Sirohi

Central Board of Secondary Education (12th Standard) Percentage: 91.2%

November 2022 – July 2026

Ajmer, Rajasthan

March 2021 – July 2022

Sirohi, Rajasthan