


Abdullah Ikram Ullah Tabassam

Machine Learning Engineer | Electrical Engineer

 abdullahdar2017@gmail.com 

 Manchester, England

 [linkedin.com/in/abdullah-ikram-ullah-tabassam-1103b021b](https://www.linkedin.com/in/abdullah-ikram-ullah-tabassam-1103b021b) 

 +44-7309-117608

 github.com/AbdullahTabassam 

 abdullahtabassam.github.io/ 

PROFILE SUMMARY

I am an accomplished, highly motivated, AI professional with a proven track record of success. With an MSc in AI from a renowned university, I possess a solid understanding of machine learning, NLP, and computer vision. My exceptional problem-solving skills and attention to detail enable me to provide innovative solutions to complex problems. As a self-starter, I have gained practical experience through course works and personal projects, delivering ground-breaking solutions. Now, I am eager to leverage my expertise to contribute to an organization's AI initiatives and deliver tangible results.

EDUCATION

Masters in Artificial Intelligence (Machine Learning)

Liverpool John Moores University, Liverpool, England.
September 25, 2022 – Present

Project and Thesis: In-flight Bird Detection, Bird Counting, Migratory Path, and Behaviour analysis

Bachelors in Electrical Engineering (Tele-communication)

Institute of Space Technology, Islamabad, Pakistan.
September 13, 2017 – August 25, 2021 **CGPA 3.13/4.00**

Project and Thesis: IoT based Remote Health Monitoring

SKILLS & INTERESTS

Artificial Intelligence | Computer Vision OpenCV | Object Detection | Object tracking | Vision-based ML | Deep Learning | Machine Learning | Docker | MLOps | Hadoop | SQL | Spark | NumPy | Pandas | Python | Java | C - C++ Visual Studio | CUDA (CuDF CuML) | ETL | Data Science Libraries | Deep learning frameworks (e.g. TensorFlow - Keras - PyTorch) | Development | Cloud Infrastructure | Tableau | Data Visualization – Matplotlib Pyplot | Optimization | Predictive Modeling | Model Development | Neural Networks | Deep Neural Networks | Natural Language Processing | Extracting Meaningful Insights | Sklearn | Transfer Learning | ML Models, Architectures and Frameworks | Statistics | Probability | Data Mining | Big Data | Real-world datasets | Data Analysis and Manipulation | Data Cleaning | Data Modeling | Hyperparameter Tuning | Management | Problem Solving Skills | Communication Skills | Teamwork | Collaboration | Data structures | Unsupervised learning | Programming skills

EXPERIENCE AND PROJECTS

Computer Vision

September, 2022 – May 2023

In-flight Bird Detection, Bird Counting, Migratory Path, and Behaviour analysis

Liverpool John Moores University *Present*
Details

- Successfully managing a project involving complex tasks like bird detection, counting, and behaviour analysis.
- Developing a detailed project plan and timeline to ensure timely completion of the project.
- Producing an extensive research report on the project, highlighting the significant contribution to the field of ornithology.

End-to-End Object Detection Web-Application Details

- Managed the entire project, from designing and developing the web application to integrating the model and database.
- Developed a user-friendly and efficient Flask web application for object detection, resulting in high accuracy and quick processing.
- Effectively used Docker to containerize the app, ensuring scalability and easy deployment.

Bird Species Detection Details

- Managed the entire process of cleaning, labeling, preprocessing, and training the image dataset for object detection.
- Successfully implemented transfer learning and achieved high accuracy in UK garden bird detection using TF2 Object Detection API.
- Produced an extensive report on the project, including the methodology and findings, showcasing strong technical writing skills.

Sign Language Detection Details

- Implemented transfer learning techniques to a pre labeled dataset of hand images and achieved high accuracy in hand signs detection using TF2 Object Detection API and produced an extensive report on the project, including the methodology and findings.

Hand Gesture Volume Control Details

- Utilized Mediapipe library for computer vision to detect landmarks on hand joints and efficiently controlled the volume using the hand gestures.

Machine learning

September, 2022 – May 2023

Audio Signal Analysis to detect Anti-Social and Criminal Behaviour

Details

- Managed the project from data collection to model training and optimization.
- Designed custom neural networks and performed hyper-parameter optimization to achieve high accuracy in detecting anti-social and criminal behavior from audio signals.
- Produced a detailed report on the project, highlighting the significant contribution to the field of audio signal processing.

Skeletal Analysis for Identification of Birds from bones Details

- Managed the project independently, cleaning and preprocessing the skeletal measures of birds to classify various bird species from their bone measurements.
- Developed a robust classification model, achieving high accuracy in species identification.
- Produced a research paper on the project, showcasing strong academic writing skills.

Particle classification using LHC dataset

Details

- Managed the project from data exploration to model design and implementation.
- Implemented various techniques to reduce dimensionality and designed a deep neural network for efficient particle classification.
- Produced a technical report on the project, highlighting the findings and contributions to the field of particle physics.

Natural Language Processing

September, 2022 – May 2023

OpenAI Lang Chain Model

Detail

- Leveraged the OpenAI API to use large language models like GPT 3.5 to create a web application to provide custom diet and workout plan to the users.

SMS Ham/Spam Detector

Detail

- Successfully applied NLP concepts like cleaning, tokenization, lemmatization, and vectorization, leveraging the NLTK library to achieve high accuracy results.

Electronics Engineer

Service Care – Part of Clipper Logistics

Feb 2022 – Jun 2022

Oldham

Achievements

- Managed and supervised a team of technicians, specialized in fault finding, testing, and repairing appliances from reputable companies such as Amazon, Shark, Hoover, Tefal, and Panasonic, while introducing innovative testing and repair techniques that improved efficiency and reduced repair times by 20%.

Engineering Intern

General Fan Company (GFC) Ltd.

Jan 2021 – Feb 2021

Gujrat

CERTIFICATES

IBM

- Data Analysis with Python.
- Data Science Methodology
- Databases and SQL for Data Science with Python
- Machine Learning with Python
- Python for Data Science, AI & Development
- What is Data Science

Microsoft

- Introduction to Microsoft Azure Cloud Services
- Azure Machine Learning for Data
- Create Machine Learning Models in Microsoft Azure
- Build and Operate Machine Learning Solutions with Azure

Meta/Facebook

- Django Web Framework

LinkedIn

- NLP with Python for Machine Learning
- Transformers Text Classification for NLP Using BERT

ACHIEVEMENTS

- Published an open access research paper on “**MLOPS: A Step Forward to Enterprise Machine Learning**”. (2023)
- Completed all modules with **distinctions** during MSc. in AI. (2022-2023)
- Achieved **A** grade for the BSc. final project: “**IoT-based Remote Health Monitoring**”. (2021)