

Oulad Moussa Nour

Data Scientist

+ (212) 617 753 728 nourom.professional@gmail.com NourOM02 Nour Oulad Moussa nour.oulad.moussa

EXPERIENCE

DATA SCIENTIST | Graduate internship

February 2023 – Present | Henceforth, Rabat, Morocco

- Automate the retrieval pipeline for testing 15 benchmark datasets using Pyserini.
- Implement state-of-the-art expansion methods using Prompt engineering techniques for better retrieving performance (up to 10%).
- Implement a novel expansion method with LLMs using embeddings.
- Fine-tune Llama-3 using LoRA and generated data with GPT-4.

Skills : Python • Pyserini • LLMs • LoRA • Azure DevOps

MACHINE LEARNING ENGINEER | Summer internship

June 2023 – September 2023 | International Travel , Tangier, Morocco

- Implemented a processing pipeline to automate data extraction.
- Fine-tuned YOLOv8 for object detection.
- Played with different image processing techniques for better OCR performance.

Skills : Python • OpenCV • PyTorch • TensorFlow • Deep Learning • Computer Vision

PRESIDENT OF ENSIAS BRIDGE | Extracurricular activities

June 2022 – June 2023

- Established and managed short and long-term goals for the club.
- Efficiently allocated budgets to support the club activities.
- Organized and led weekly meetings to assess project updates and adjust plans.
- Spearheaded **the Survey project**, collecting data and deriving insightful conclusions about the school's graduates.

Skills : Leadership • Communication • Teamwork • Management • Agile Methodologies • Data visualization • Info-graphics

PROJECTS

MOROCCAN SOCIAL MEDIA MONITORING | School project

February 2023 – June 2023

- Collected and processed up to 20,000 Arabic comments using web scraping.
- Employed LDA and BERTopic for topic modeling to derive insightful conclusions from the dataset.
- Created data visualizations and dashboard to present the results effectively.

Skills : Python • TF-IDF • Pandas • BERTopic • PyArabic • Scrapy • Selenium

UNSUPERVISED GALAXY MORPHOLOGY CLASSIFICATION |

Research project

March 2023 – May 2023

- Implemented feature extraction using the VGG16 convolutional NN.
- Employed K-means, Agglomerative, and Fuzzy C-means clustering algorithms.
- Achieved a 73% accuracy rate with K-means clustering..
- Highlighted the potential for further research to enhance unsupervised learning in galaxy morphology classification.

Skills : Python • K-means • Agglomerative Clustering • Fuzzy C-means • Data Analysis • Data Visualization

EDUCATION

NATIONAL SCHOOL FOR COMPUTER SCIENCE AND SYSTEM ANALYSIS | ENSIAS

Artificial Intelligence Engineering

September 2021 - Present

Machine Learning • Data Analysis • Deep Reinforcement Learning • Data science Computer Vision • Deep Learning • Big Data • Time Series • Distributed systems

PREPARATORY CLASSES

September 2019 - June 2021

Linear Algebra • Probability • Algorithms Numerical Analysis • Data structures

SKILLS

TECHNICAL SKILLS

Python • SQL • Selenium • OpenCV • Pytorch • Tensorflow • Scikit-learn • PySpark • Git • Docker

SOFT SKILLS

Communication • Team work • Curiosity

LANGUAGES

English (IELTS 8.0) • Arabic • French

CERTIFICATIONS

March 2024

• **Generative AI with Large Language Models @DeepLearning.ai**

in progress

• **Natural Language Processing Specialization @DeepLearning.ai**

OTHER INTERESTS

- Writing articles about AI and Computer Science on **medium**
- Competitive Programming
- Teaching friends and relatives
- Mathematics
- Creating content
- Design & Infographics