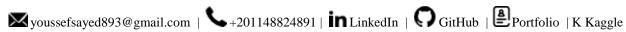
Youssef Sayed Ahmed

Data Scientist | NLP Engineer



Professional Experience

Data Scientist - NLP Intern

Aug 2023 - Oct 2023

CashCall Company

- Stayed at the forefront of data mining and machine learning research through novel studies and monitoring industry research and best practices.
- Contributed to the data science product strategy by developing applications, new data science products, and enhancements to existing products.
- Conducted analysis and preprocessing of raw data, preparing it for prescriptive and predictive modeling.
- Integrated and cleaned data from diverse sources to improve data quality and reliability.
- Developed Arabic Chatbots, expanding language capabilities in the domain of conversational AI.

Machine Learning Engineer, Freelance Project,

Apr 2022 - Sep 2022

 $[Quantitative-analysis-of-dopamine-by-gold-nanoparticle/Dr.\ Amr]$

- Orchestrated a team of five professionals in the conception, development, and implementation of a machine learning model for image analysis.
- Specifically focused on predicting dopamine quantity within a solution using gold nanoparticle-assisted techniques, under the guidance of Dr. Amr.
- Improved the model's precision from 83% to an impressive 98% on test datasets, highlighting expertise in optimizing algorithm performance.
- Provided technical leadership to team members, offering guidance in troubleshooting, code assessment, and optimization.
- Demonstrated proficiency in a range of technical tools, including Python, Scikit-Learn, Pandas, NumPy, TensorFlow, and Streamlit, utilizing these tools to implement various machine learning algorithms and methodologies.

Education

Bachelor of Computer Science, Artificial intelligence department,

Sep 2018 –Jul 2022 Cairo, Egypt

Faculty of Computers and Artificial Intelligence. Cairo university. GPA = 3.03 (Very Good)

Artificial Intelligence Coursework:

- Theoretical Foundations of Machine Learning Pattern Recognition Image Processing
- Supervised Learning Unsupervised Learning Reinforcement Learning
- Processing of Formal and Natural Languages GANs

Graduation Project \square :

- Customer Service Chatbot using RASA, Excellent
- ARCA Chatbot engages seamlessly in Arabic conversations, adeptly addressing inquiries, offering solutions, and processing orders. Demonstrates remarkable performance with a 99% accuracy rate in intent detection and a 95% accuracy rate in generating responses.

Projects

LLM Science Exam 🗹

 Participated in a Kaggle competition aimed at solving multiple choice questions using LLM using BERT, demonstrating strong natural language processing and machine learning skills.

Arabic Lyrics Generator ☑

• Executed an end-to-end Natural Language Processing (NLP) initiative to generate classical-style Arabic poetry using GPT achieved a loss of 5.1341 across three training epochs.

Ai assistant bot 🗹

• Developed a comprehensive bot solution with a wide range of functionalities, including launching Windows applications, English-to-Arabic translation via transformer pipelines, and seamless interaction with Google's BARD chatbot using the PALM model.

Arabic Text Summarization <a>Image: Image of the control of the co

• Designed a succinct Arabic topic summarization mechanism employing the T5-small model, Accomplished a loss of 0.44 over three training epochs, enabling efficient content condensation.

${\bf Predict\text{-}Closed\text{-}Question\text{-}StackOverFlow} \ \underline{\square}$

Engineered a predictive model using NLP techniques and neural networks to determine the closure status of StackOverflow
questions, showcasing expertise in question classification.

Handwritten English Letter Detection ☑

Pioneered a deep learning solution inspired by Google's research papers to recognize handwritten English letters using Convolutional Neural Networks (CNN). Applied as an Optical Character Recognition (OCR) tool, achieving an impressive 95% accuracy on test data.

Courses

- Natural Language Processing Specialization From Deep Learning AI
- Custom Models, Layers, and Loss Functions with TensorFlow From Coursera
- Artificial Intelligence Virtual Experience
 Program From Cognizant.

 ☐
- Deep Learning Specialization From Coursera
- Data Science and Machine Learning Bootcamp with Python (Udemy)
- Hugging Face NLP Course
- Natural Language Processing with Attention Models From Deep Learning AI

Skills

Deep Learning Pandas PyTorch LLM SQL Python Keras & TensorFlow Mathmatics AWS Statistics LangChain HuggingFace OpenCV Chatbots Numpy Sklearn Git Flask Google Cloud – GCP Algorithms Seaborn Docker Data Structures OOP Google DialogFlow RASA