Curriculum Vitae

AZZOUZ SAOUSSEN

27/12/1992

azzouz.saoussen2712@gmail.com

+216 58 070 777

Taieb Mhiri , 5000 , Monastir

HTTPS://GITHUB.COM/AZOUZSAOUSSEN

https://www.linkedin.com/in/saoussen-azzouz-2209b1241/

HARD SKILLS

WEB TECHNOLOGIES: JEE, Angular, Sprintboot , NET, symfony2, RestAPI, JAVA, Python, Django, Flask, Javascript, ReactJs

MOBILE TECHNOLOGIES : Android Studio, Flutter.

DATA BASE : Oracle SQL, PLSQL MySQL, Firebase, PostgreSQL, MongoDB.

ARTIFICIAL INTELLIGENCE: Machine Learning, Deep Learning, TensorFlow Keras, Python, R Programmation.

CLOUD COMPUTING: Microsoft Azure Fundamentals, AI Fundamentals, AWS.

EDUCATION AND TRAINING

2020 - 2023 • Private Polytechnic School of Monastir

Engineering Cycle in Computer Science: Software Engineering.

2018 – 2020 • Private Polytechnic School of Monastir

Preparatory Cycle, Physics - Chemistry.

2012 • Said-Boubakir High School - Monastir (Tunisia)

BACCALAUREATE, Mathematics Sciences

PROFESSIONAL EXPERIENCE

TRAINEE • RLANTIS LABORATORY, UNIVERSITY OF MONASTIR

July 2023 - December 2023

This project was carried out as part of the final project of the computer engineering cycle at the RLANTIS Laboratory of the University of Monastir, under the supervision of Dr. ZRIGUI Mounir. I began this project by conducting research on the state of the art in the field of computer vision, followed by a more specific study of the subdomain of image segmentation, particularly focusing on MRI images of brain tumors. Subsequently, I decided to adopt a hybrid approach by creating a UNET-type neural network with an attention mechanism, inspired by Transformers in natural language processing (NLP). This decision was made after testing several neural networks and achieving the best performance with the aforementioned combination. The chosen algorithm was trained on Colab Pro++ with Tesla V100. Using the Pickle library in Python, we were then able to use it in our JavaScript segmentation platform.

Keywords: Python, Kaggle API, Deep Learning (CNN, ViT), Scikit-learn,

DEVOPS: Docker, Docker-compose, Vagrant, Virtual Box, VMware, Kubernetes, Jenkins, CI/CD, Ansible.

IOT: Arduino IDE, RemoteXY, Wokwi.

TEST & VALIDATION: Junit5, Pipeline Jenkings, Sélénium, SonarQube, BDD, TDD.

SYSTEM & NETWORK ADMINISTRATION: Windows Server 2012/2016(Active Directory, DNS, DHCP, HyperV, Backup and recovery solutions), Linux servers, Cisco, VLANs, TCP/IP, HTTP/HTTPS, SNMP.

SKILLS

- Enthusiastic, dynamic, with pedagogical skills,
- Relational quality,
- Team work,
- Problem-solving abilities
- Adaptability and flexibility
- Time manangement
- Creativity
- Attention to details
- Critical thinking
- Conflict resolution skills
- Langues :
  - Arabe : Excellent
  - Français : Moyen
  - Anglais : Excellent
  - Italien : Excellent

CERTIFICATIONS

IBM Data Engineer 2021 Mastery Award.

UNIQUE ID: 2056-1664-0090-4080

MONAI, Google Colab Pro++ Tesla V100, TensorFlow, Keras, Multimodal MRI medical images (T1, T2, T1ce, Flair), BraTS2020, 3D UNET architecture, Attention mechanism.

TRAINEE • RLANTIS LABORATORY, UNIVERSITY OF MONASTIR

March 2022 – June 2022

This project was carried out as part of my artificial intelligence course in computer science at the RLANTIS Laboratory of Monastir University, supervised by Dr. ZRIGUI Mounir. I started this project by researching the state-of-the-art in sentiment analysis in Arabic. Then, I decided to test the Machine Learning approach for classifying Arabic tweets from Twitter as "positive" or "negative" by creating a model based on Machine Learning algorithms such as Logistic Regression, Naive Bayes, Linear SVM, RBF-SVM, Random Forest, MLP, AdaBoost, and Gradient Boosting to compare the performance of the algorithms in terms of precision, recall, and F-measure.

Keywords: Twitter API, Farasapy, Machine Learning, Scikit-learn, Google Colab, Flask, Ngrok, Python.

TRAINEE • ASTROLAB AGENCY, SOUSSE

July 2022 – August 2022

This project was part of a web software. The objective was to build a system that can accurately classify unpublished news articles into the correct category using Machine Learning: Random Forest, Logistic Regression, KNeighbors Classifier, Decision Tree, and GaussianNB.

Keywords: Python, pandas, scikitlearn, seaborn, pickle, nltk, tf-idf.

ACADEMIC PROJECTS

DEVELOPPEMENT WEB : SPRING BOOT APPLICATION EN UTILISANT L'ARCHITECTURE MICROSERVICES

October 2022 – January 2023

This personal professional project was carried out as part of my DevOps course, supervised by Mr. Hatem JARBOUA. After building our four microservices, inter-process communication was established between the ordering service, investment service, and notification service. Then, we created a discovery service using NETFLIX Eureka to manage communication between all instances of the services. After implementing the API gateway using Spring Cloud Gateway, we secured the microservices using Keycloak and implemented a circuit breaker to have resilient communication between our services. Additionally, we implemented distributed tracing using Spring Cloud Sleuth and Zipkin to trace the client request from start to finish to detect failure points, and event-driven architecture using Kafka. Finally, our main goal was to containerize our application using Docker Compose, and we refactored the Docker Compose to use Kubernetes deployment. Finally, we refactored the microservices to utilize Kubernetes features instead of relying on features like Spring Cloud Gateway.