Omer Ebead

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SUMMARY

Full-stack software engineer with a strong foundation in electrical and electronic engineering and a current focus on Artificial Intelligence for Science through a Master's program at Stellenbosch University. Experienced in designing and developing full-stack solutions, predictive models, and satellite data analysis systems. Recognized for collaborative problem-solving, technical expertise, and leadership potential, as demonstrated by projects ranging from recommender systems to sustainability analysis.

EDUCATION

Stellenbosch University — AIMS South Africa   Sep. 2024 – Sep. 2025
Masters degree in AI for science   *Cape Town, South Africa*
University of Khartoum   Aug. 2016 – May 2021
Bachelors degree in Electrical and Electronic Engineering   *Khartoum, Sudan*

EXPERIENCE

Freelancer   Apr. 2023 – Sep. 2024
Software Engineer   *Riyadh, Saudi Arabia*
- Designed and developed user interface, server and database for Customer's Ideas

AmunData   Apr. 2022 – Apr. 2023
Software Engineer   *Khartoum, Sudan*
- Designed and developed user interface, server, database, data preparation, data processing, and data predictions.
- Built systems to extract vegetation indexes from Satellite images and built models for predictions.
- Collaborated with data analysis team for data visualization tasks using PowerBi.

OROOMA   Jan. 2021 – Apr. 2022
Software Engineer   *Khartoum, Sudan*
- Designed and developed user interface and server for multiple websites.

PROJECTS

Recommender System | *Python*   Nov 2024
- Built and developed movies recommender system using ALS algorithm

Clinical | *React, Nextjs*   May 2023
- Developed and designed the user interface of an online clinic's appointment website in UAE.

Rewash | *React, Nextjs*   May 2023
- Developed and designed the user interface of a washing company's dashboard.

Temporal Analysis of Regional Sustainability Using CNNs and Satellite Data | *Python, Pytorch* May 2020
- Developed a system to calculate region's biocapacity.

SunSeek EV | *Arduino, C++*   April 2018
- Built a self-charging solar car that tracks sunlight to charge its battery and then moves to shade to protect its components.

GloveControl | *Arduino, C++*   April 2017
- Built a sensor-equipped glove that lets users control a computer with hand movements.

Awards

Google Deepmind Scholarship to study Masters at AIMS South Africa Sep. 2024

Technical Skills

Languages: Java, Python, C/C++, SQL (Postgres), JavaScript, HTML/CSS
Frameworks: React, Nextjs, Node.js, Flask, Django, Material-UI
Developer Tools: Git, Docker, AZURE, VS Code, Visual Studio, PyCharm, IntelliJ, Eclipse
Libraries: pandas, NumPy, Matplotlib, Pytorch, TensorFlow, Keras, JAX

Soft Skills

Languages: English : IELTS 7.0
Programs: Hasso Plattner d-school Afrika - Design Thinking, McKinsey Forward Program - Leadership

References

Academic and professional references are available upon request.