Khawaja Azfar Asif

Associate Software Engineer

Lahore, Pakistan | +92-3098287841 | khawajaazfar2000@gmail.com | Linkedin.com | Github.com PROFESSIONAL EXPERIENCES

Digimark Developer - Associate Software Engineer

August 2025 - Present

- Designed and developed RESTful APIs using FastAPI, ensuring high performance and scalability.
- Implemented **authentication**, **error handling**, **and logging** in FastAPI for secure and reliable API workflows.

Dubizzle Labs – Data Specialist

September 2024 - December 2024

- Assisted in creating a comprehensive dataset for a new product by developing Python scripts for web scraping from diverse source and verifying data using Dubai-based platforms.
- Manage and verified data in Google sheets, automating data collection using python to boost project efficiency.

InvoZone - Machine Learning intern

February 2024- May 2024

- Fine-tuned transformer-based NLP models (BERT, RoBERTa) using PyTorch/TensorFlow to enhance inference accuracy.
- Developed API-integrated ML pipelines to enhance inference accuracy and accelerate AI prototyping.

DevSinc – Software Engineering Intern

July 2023 – September 2023

- Developed and deployed responsive web pages using HTML, CSS, and Bootstrap.
- Contributed to backend development by implementing Django framework essentials (MVT, ORM) and building RESTful APIs using Django REST Framework.
- Applied core Django concepts to real-world projects by building interactive management system and deployed it.

PROJECTS

Dental Enumeration and Diagnosis on Panoramic X-Rays – (Final Year Project)

- Built an end-to-end **object detection system** for dental enumeration and disease diagnosis on panoramic X-rays.
- Achieved **96% accuracy of teeth** detection and **75% of teeth diseases** detection using **YOLOv8 deep learning** for model training.
- Leveraged Pandas, NumPy, Matplotlib, Seaborn, and Scikit-learn for data handling and analysis.
- Deployed the system on GCP.

Pneumonia X-Ray Classifier – Machine Learning Project

- Developed **deep learning** system for the **classification** of pneumonia from chest X-ray images.
- Leveraged Convolutional Neural Networks (CNNs) built with TensorFlow/Keras for robust model training, achieving 95% diagnostic accuracy.
- Deployed the interactive diagnostic application on **Streamlit Cloud**.

E-commerce RAG System for Internal Communications – Retrieval Augmented Generation Project

- Developed a RAG solution using Pgvectorscale, Python and utilizing OpenAI's text-embedding-3-small model for embeddings.
- Utilized **Docker** for environment setup and managed database interactions with a **PostgreSQL** GUI client for seamless development and deployment.

EDUCATION

Lahore Garrison University (LGU)

February 2020 - March 2024

- Bachelor of Science | Software Engineering | CGPA: 3.0 / 4.0
- Core Courses: Software requirements, Software Construction & Development, Software Project Management, Artificial Intelligence, Machine Learning, Deep Learning, Linear Algebra, Statistics.

LEADERSHIP ACTIVITIES

Event Society of Software Engineering, Lahore Garrison University - President

September 2023 - March 2024

- Organized university first Job Fair, Onboard 20+ companies and single-handed manages them throughout the event.
- Arrange multiple Industrial visits for student so they can know about latest trends and technology of industry.

DevSinc – Ambassador

Loading Ambassador of DovSins, representing the company at my university.

April 2023 – February 2024

- Leading Ambassador of DevSinc, representing the company at my university.
- Organized and conducted various events to promote Advance Technology on campus.
- Developed and nurtured relationships with students, faculty, and staff.

CERTIFICATIONS

- Machine Learning A-Z: Al, Python & R(Udemy)
- Open-source LLMs: Uncensored & secure AI locally with RAG

PROFESSIONAL SKILLS

Languages: Python (Intermediate), C++

Technologies: SQL, Git/ GitHub, Docker, AWS, GCP, HTML, CSS, Postgresql (Beginner), GCP, RAG, YOLO, Streamlit,

Libraries & Frameworks (Python): FastAPI, Django, Pandas, NLTK, OpenCV, scikit-learn, PIL, NumPy, Matplotlib, Plotly, Streamlit.