

Khalil Kurdi

khalil.kurdi11@gmail.com | +961 81275462 | linkedin.com/in/khalil-kurdi | github.com/LiloZ95 | Lebanon

PROFESSIONAL EXPERIENCE

AIODS | Back-End Developer & AI Specialist

Remote · Feb 2026 – Present

- Designed the full database schema for the platform using PostgreSQL, ensuring scalability and data integrity across all services.
- Architected and documented external REST APIs with Swagger/OpenAPI specifications, enabling clear integration guidelines for third-party consumers.
- Integrated Stripe payments with automated installment billing for cemetery services, including webhook handling and payment lifecycle management.
- Built and deployed the full back-end using Node.js on a DigitalOcean Droplet, managing server configuration, environment setup, and production readiness.
- Developed scheduled cron jobs for automated data processing and system maintenance tasks.
- Implemented an automated email notification system to keep users informed of account activity, payment updates, and application status changes.
- Built an AI Copilot using the OpenAI SDK that processes hardship applications end-to-end — analyzing submitted PDFs, images, and form data to assess severity and automatically flag emergency cases for immediate attention.

ZAKA MadeBy | AI Engineer

Beirut, Lebanon · Oct 2025 – Present

- Designed the end-to-end architecture for Eshmun, a privacy-preserving AI strategy-consultant chatbot, built as part of an internal enterprise automation pipeline.
- Developed the full LLM workflow using PydanticAI, OpenAI SDK, and Qwen local LLMs, iterating across multiple models to improve reasoning quality, response structure, and accuracy.
- Increased response accuracy by ~20–30% and reduced average inference latency by ~35% through prompt engineering, model selection, and output validation.
- Built and deployed an ERP AI Agent using FastAPI and Docker, exposing secure APIs for enterprise workflow automation.
- Deployed ERP Agent to AWS EC2, handling containerization, environment configuration, and production readiness for internal company use.
- Built a PPTX report-generation tool that automated slide assembly, reducing manual report creation time by ~90% for strategy teams.

ZAKA | ML Specialization Course

Beirut, Lebanon · Mar 2025

- Applied core ML algorithms (Gradient Descent, AdaBoost) to improve model convergence and performance across multiple supervised learning tasks.
- Built and evaluated CNN-based face mask detection and Seq2Seq translation models, achieving production-grade accuracy benchmarks on validation datasets.
- Fine-tuned pre-trained models using PyTorch and TensorFlow, experimenting with hyperparameters to improve generalization.
- Implemented end-to-end ML pipelines including preprocessing, EDA, error analysis, and evaluation using accuracy, MSE, precision/recall, and confusion matrices.

Interphase | Full-Stack Developer

Tripoli, Lebanon · Jun 2024 – Oct 2024

- Designed and implemented an interactive terminal interface using Angular, enabling user-friendly command-line input and real-time feedback.
- Developed functionalities to save, edit, and organize sections, questions, and other hierarchical data effectively.
- Integrated RESTful APIs to enable seamless communication between the frontend and backend, ensuring efficient data retrieval and updates.

- Collaborated in a fast-paced Agile environment, participating in daily standups, sprint planning, and iterative development cycles.

PROJECT EXPERIENCE

Adventura – AI-Powered Travel Platform (Senior Project)

- Led development of a full-stack travel booking platform built with Flutter, Node.js, and PostgreSQL.
- Integrated EVA, a custom AI chatbot, to recommend activities and answer queries via natural language.
- Built a Trip Generator that produces personalized multi-day itineraries from user preferences, reducing manual planning effort by ~80%.
- Designed a recommendation system using collaborative filtering and interaction-based signals to improve activity relevance.
- Implemented booking flows, availability logic, notifications, and automated cron jobs to ensure data freshness and system reliability.

EVA – Interactive Chatbot (Zaka Capstone Project)

- Designed and deployed EVA, a domain-specific chatbot optimized for Lebanon's tourism industry using Llama 4 as the underlying LLM.
- Implemented RAG-based retrieval to surface real-time activities from a structured database, delivering results via one-click interactive cards.
- Integrated direct booking flows through Adventura's infrastructure, turning recommendations into actionable outcomes.
- Constrained out-of-domain requests to keep the assistant focused on tourism-related queries.

TECHNICAL SKILLS

Programming: Python, JavaScript, TypeScript, Dart, Java, SQL

AI / ML: Scikit-Learn, Pandas, NumPy, Transformers, PyTorch, TensorFlow, PydanticAI, Diffusers, FAISS, LangChain, LangGraph

Deployment & Backend: FastAPI, Node.js, Docker, AWS EC2, DigitalOcean, PostgreSQL, REST APIs, Stripe, Swagger/OpenAPI

Web Development: Angular, Flutter

Tools: Git/GitHub, Google Colab, Figma

Methodologies: Agile (Scrum)

CERTIFICATIONS

- Data Analysis Bootcamp, Khwarizme — 2025
- Machine Learning Specialization, Zaka Academy — 2025
- Keras Deep Learning Seminar, IEEE BAU Tripoli — 2024
- Standalone ECU Mapping/Tuning, DSG Automotive — 2023
- Advanced Mechanical Tuning, DSG Automotive — 2023

EDUCATION

Beirut Arab University — Tripoli, Lebanon | Sep 2022 – May 2025

Bachelor's Degree in Computer Science | GPA: 3.6/4