

# ISAAC MAINA

## PROFESSIONAL SUMMARY

Mid-level Django Backend Developer with 2+ years of hands-on experience building scalable backend systems, RESTful APIs, and production-ready applications using Python, Django, and Django REST Framework. Proven ability to design efficient database schemas, optimize performance, and deploy containerized applications using Docker and AWS.

Experienced in collaborating with international and distributed teams, participating in agile workflows, and translating client requirements into reliable technical solutions. Passionate about building impactful platforms, with growing exposure to AgriTech, data-driven systems, and scalable cloud architectures.

## TECHNICAL SKILLS

- **Languages:** JavaScript (ES6+), TypeScript, Python
- **Backend & APIs:** NodeJS, Django, Django Rest Framework, FastAPI (basic), REST API design, authentication, documentation
- **Databases:** PostgreSQL, MYSQL, MongoDB, Database schema design, query optimization, indexing
- **Async & Background Tasks:** Celery, RabbitMQ, Redis (basic)
- **DevOps & Cloud:** Docker, GitHub Actions, AWS, Render
- **Version Control & Collaboration:** Git, GitHub, code reviews, agile/scrum workflows
- **Testing & Quality:** Unit and integration testing (Django test framework)
- **Web & Integration:** HTTP, REST, third-party API integrations (Stripe, OpenAI)

## WORK EXPERIENCE

### SOFTWARE ENGINEER (FREELANCE & CONTRACTS)

Remote - Various clients

2023 – Present

- Designed, developed, and maintained backend features using Django and Django REST Framework for production applications.
- Built and documented RESTful APIs supporting web and third-party client integrations.
- Designed efficient PostgreSQL schemas, optimized queries, and improved application performance for scalable workloads.
- Integrated third-party services and APIs (Stripe payments, OpenAI, external REST APIs).
- Implemented background task processing using Celery and RabbitMQ for asynchronous workflows.
- Containerized applications using Docker and deployed to AWS (EC2, S3) and Render.
- Collaborated with international teams through GitHub, pull requests, code reviews, and agile sprints.
- Wrote clean, maintainable, and well-documented code following backend best practices

### FRONTEND SOFTWARE DEVELOPER (INTERN)

Upscale Technologies (Remote)

February 2024 – July 2024

- Worked with backend teams to integrate GraphQL and REST APIs into frontend modules.
- Enhanced platform reliability through better documentation, code reviews, and automated testing (Jest, Cypress).
- Gained exposure to CI/CD pipelines, version control, and collaborative agile workflows..

## PROJECTS

**Sacco Management System (React + Django + AWS)** - Role-based auth, loan/finance management, responsive UI.

**Freelance Job Portal (Django + WebSockets)** - Implemented real-time chat and role-based user access.

**E-Commerce Backend (Django + Celery + RabbitMQ + Stripe)** – Implemented asynchronous order processing with Celery and

RabbitMQ, secure Stripe payments, and PostgreSQL database management for products and users.

**AI-Powered Chatbot SaaS (Node.js + Express + PostgreSQL + Next.js + Shadcn UI)** – Developed backend API, integrated web scraping scripts for automated data collection, and built a responsive dashboard and chat widget prototype for real-time support.

## EDUCATION

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### MACHAKOS UNIVERSITY

September 2019 – May 2024

Bachelor of Science in Mathematics and Computer Science (Second Class honours - Upper Division)

Communication Skills, Artificial Intelligence, Critical and Creative Thinking, Discrete Mathematics, Data Structures and Algorithms, Calculus, Linear Algebra, Computer Graphics, Object-Oriented Programming, Web Development, Neural Networks, Database Systems, System Design Analysis

## CERTIFICATIONS

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- Postman API Fundamentals Student Expert - Postman October 2023
- Back End Development and APIs (MERN stack) - Freecodecamp November 2023
- Fundamentals of AI Agents - Hugging Face March 2025

## WRITING AND KNOWLEDGE SHARING

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- Medium blog: A Step-by-Step Guide to Building Subscription Payments in Next.js with Stripe([link](#))
- Medium blog: Build embeddable chat widget using React and Vite([link](#)) - A comprehensive tutorial that guides developers on building an embeddable chat widget that can be embedded on any website.
- User Guides & Quick References: Upscale ERP documentation([link](#)) - Wrote and maintained user-centered guides and quick reference materials to assist users in adopting the ERP.