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Professional Software Engineer

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OVERVIEW

As a highly skilled full-stack software developer with a proven ability to adapt and thrive in fast-paced environments. With a strong foundation in software engineering, including both professional and freelance experience, I bring a unique blend of technical expertise and creative problem-solving. My work spans various industries, where I have successfully delivered web and mobile applications, managed cross-functional teams, and continuously improved software solutions. I am particularly passionate about collaborating on international projects, and my experience in managing development processes, combined with my excellent communication skills, positions me well to contribute effectively to your initiatives.

🎓 Degrees and Majors

2021.08 – 2025.04	**Bachelor of Science in Software Engineering** Murang'a University Of Technology Pending ….
October 18, 2023	**Introduction to Data Science** Issued by Cisco https://www.credly.com/badges/9ac4a9cf-57a6-4468-93f8-d00a132e5c58
October 21, 2023	**Introduction to IoT** Issued by Cisco https://www.credly.com/badges/231057f2-8c67-4211-a725-2bf6ac766fff
February 07, 2024	**Operating Systems Basics** Issued by Cisco https://www.credly.com/badges/99bc5645-a771-4d90-9058-2ccd6325bed9

April 06, 2024	**Networking Devices and Initial Configuration** Issued by Cisco https://www.credly.com/badges/6017b48c-81db-42d0-ba58-fbd40b20df88

2024.04 – 2024.07 **Harmosoft** **Intern and Software Developer** **Project:** HBS (Book Store) Project **Duration:** (4 months) **Role:** Lead Developer (Intern)	**Main Functionalities & Technologies Used:** **Functionalities:** ➢ Online book catalog with search and filtering options ➢ User authentication and role-based access control ➢ Shopping cart and order management system ➢ Payment gateway integration for seamless transactions ➢ Admin dashboard for inventory and sales tracking
Technologies Used: **Frontend:** Next.js (TypeScript), Tailwind CSS **Backend:** Django REST Framework (DRF), PostgreSQL **Authentication:** Django Allauth **Deployment & DevOps:** Docker, AWS (EC2 & S3), GitHub Actions for CI/CD	

Achievements:

➢ Led the development lifecycle from planning to deployment, ensuring timely delivery.
➢ Collaborated with cross-functional teams to enhance performance and system security.
➢ Integrated modern coding best practices to optimize functionality and improve maintainability.
➢ Reduced page load time by **30%** through efficient API design and frontend optimizations.
➢ Implemented CI/CD pipelines, reducing deployment time by **50%**.

GitHub Repository: 🔗 **HBS (Book Store) Project Repo**

2025.01 – 2025.01 **Tovu Sacco Admin Dashboard & Mobile App** **Full-Stack Developer** **Project:** Tovu Sacco Admin Dashboard & Mobile Application (**Duration:** 1 month) **Role:** Full-Stack Developer	**Main Functionalities & Technologies Used:** **Functionalities:** ➢ Comprehensive admin dashboard for managing users, loans, investments, transactions, and financial operations ➢ Secure authentication system for role-based access ➢ Interactive financial data visualization
Technologies Used: **Frontend:** Next.js (TypeScript), Tailwind CSS,	

shadcn/ui **Backend:** Django REST Framework (DRF), PostgreSQL **Mobile App:** React Native (Expo Router) **Security & Deployment:** Django Allauth, AWS, Docker	• and real-time insights ➢ Mobile app for users to access financial services on the go

Achievements:

- Successfully developed and deployed the system within a short timeline.
- Ensured secure authentication mechanisms and real-time data synchronization.
- Improved user experience with a clean UI and efficient API responses.

GitHub Repository: 🔗 **Tovu Sacco Repo**

2024.07 – 2024.07 **Community Guardian (Mobile App) – Mobile App Developer** **Project:** Community Guardian Mobile App (**Duration:** 1 month) **Role:** Mobile App Developer	**Main Functionalities & Technologies Used:** **Functionalities:** ➢ Anonymous reporting system for crime prevention ➢ Emergency alert system for real-time notifications ➢ Direct updates from local law enforcement agencies
Technologies Used: **Mobile App:** React Native (Expo) **Backend:** Django REST Framework (DRF), PostgreSQL **Security:** End-to-end encryption for secure communication	

Achievements:

- Designed an intuitive and secure platform for community engagement.
- Ensured privacy protection for users reporting incidents.

GitHub Repository: 🔗 **Community Guardian Repo**

2024.08 – 2024.08 **Immunity Shield (Intrusion Detection System) – AI Developer** **Project:** Immunity Shield (**Duration:** 1 month) **Role:** AI Developer	**Main Functionalities & Technologies Used:** **Functionalities:** ➢ Real-time anomaly detection for cybersecurity threats ➢ Automated response mechanism to isolate potential threats
Technologies Used:	➢ Machine learning models for intrusion

AI & ML: Python (Scikit-learn, TensorFlow) **Backend:** Django REST Framework (DRF) **Security & Deployment:** Docker, AWS Lambda	pattern recognition
Achievements: Developed an AI-driven IDS with **85% accuracy** in detecting threats. • Integrated real-time alerts and automated security measures. **GitHub Repository:** 🔗 **Immunity Shield Repo**	

2024.09 – 2024.09 **CarIgnition (Prototype for Vehicle Security) – IoT Developer** **Project:** CarIgnition (**Duration:** 1 month) **Role:** IoT Developer	**Main Functionalities & Technologies Used:** **Functionalities:** ➢ Remote vehicle start and stop functionality ➢ Encrypted communication channels for security ➢ Mobile app integration for user-friendly control
Technologies Used: **IoT Hardware:** Raspberry Pi, Arduino **Software:** Python (Flask), MQTT Protocol **Mobile App:** React Native (Expo)	
Achievements: • Successfully developed a prototype for vehicle automation. • Implemented secure encrypted communication channels for safety. **GitHub Repository:** 🔗 **CarIgnition Repo**	

2024.12 – 2025.01 **Swift Traders (Mobile App) – Mobile App Developer** **Project:** Swift Traders Mobile App (**Duration:** 2 months) **Role:** Mobile App Developer	**Main Functionalities & Technologies Used:** **Functionalities:** ➢ Interactive trading lessons for financial literacy ➢ Simulated trading environment for hands-on learning ➢ User progress tracking and personalized recommendations
Technologies Used: **Mobile App:** React Native (Expo) **Backend:** Django REST Framework (DRF), PostgreSQL **Analytics:** Firebase, Google Charts	
Achievements:	

- Developed a user-friendly educational app for financial literacy.
- Integrated a real-time trading simulator to enhance learning.

GitHub Repository: 🔗 **Swift Traders Repo**

🎖 Technical Skills

-Programming Languages: Python, JavaScript, TypeScript, SQL, C++

-Web Development: Django (REST Framework), React, Next.js, HTML, CSS, Tailwind CSS, Bootstrap, Express.js

-Mobile Development: React Native, Expo Router

-Database Management: MySQL Workbench, PostgreSQL (PgAdmin), SQLite

-API Development & Integration: RESTful APIs, JSON

-Tools & Technologies: Visual Studio Code, Apache, Nginx, Docker, Git & GitHub, Postman, Node.js

-Cloud & Deployment: Heroku, Digital Ocean, Python Anywhere, Infinity Free

-Operating Systems: Windows, Ubuntu (Linux), WSL

-Version Control: Git, GitHub, GitLab

-CI/CD & DevOps: Docker Compose, GitHub Actions (if applicable)

-Other Skills: Figma, Canva, CorelDRAW ,Postman

-Security & Networking: Basic Cybersecurity Concepts, Intrusion Detection Systems, Isolation Forest Algorithm, Networking Essentials

-Machine Learning (Basic): Scikit-learn, Data Analysis, Introduction to AI