Cape Coast,
Ghana.
UTC±00

Lawrence Ephrim

+233 505 621 042
ephrimlawrence11@gmail.com
github.com/ephrimlawrence
gitlab.com/ephrimlawrence

Work Experience

Snr. Software Engineer (Remote)   **Amplio, USA/Ghana**   **May 2023 – Present**

- Maintained a desktop application for managing talking book program audio contents (including content synchronization to S3, performing device firmware updates, content updates and statistics collection).
- Developed an Android app used by field agents to update talking book device firmware, upload new audio content and collect statistics.
- Developed an AI-powered web app for creating Social Behavioral Change programs for marginalized communities.
- Re-architected and redesigned a web app for managing talking book programs. This included functionalities for monitoring device usage, visualizing statistics through Tableau dashboards and program specification management.
- Developed a web app for creating surveys and analyzing user feedback (voice recordings) collected from talking book devices in the field.
- Managed CI/CD pipelines (Github and AWS) for deployment of Amplio applications.
- Administered AWS infrastructure including EC2, S3, RDS and Lambda to ensure smooth running of Amplio applications.
- Led the re-architecting of critical Amplio software infrastructure, including the Audio Content Manager, Talking Book Loader, Amplio Suite and statistics processing services.
- Provided technical support for software issues encountered by field agents and Amplio partners across Africa.

Software Engineer (Contract)   **Pareto, USA**   **June 2025**

- Developed automated verification scripts to validate computer tasks performed by AI Trainers, such as creating Excel sheets, Word documents and database operations. These scripts ensure tasks are completed correctly according to instructions and meet the evaluation criteria defined in project rubrics.

Software Engineer (Remote)   **Insurerity Digital, Ghana**   **October 2019 – 2023**

- Lead developer for REST API services and backend infrastructure, which processes over 10,000 requests and payment transactions daily.
- Worked on the REST API for Complaint Management and Bureau Services (CMAB) tickets management system.
- Developed a USSD application for StarMicro Insurance and SanLam Insurance, which allows users to buy life insurance policies and make payments. Currently used by over 3000 clients.
- Managed CI/CD pipelines (Github and Google Cloud)
- Administered and maintained server infrastructure supporting critical services.

Teaching and Research Assistant   **University of Cape Coast**   **October 2021 – October 2022**

- Tutor for database management system course at the Computer Science department

Software Engineer (Remote)   **Npontu Technologies Limited**   **May 2018 – December 2019**

- Worked on Kedabah Enterprise Resource Planning (ERP) system, which is used by over 50 enterprises in Ghana.
- Developed a web dashboard for the MTN Business Manager mobile app.
- Developed REST APIs for MTN Business Manager mobile application.

Software Engineer, Intern   **Kyta IT Solutions, Ghana**   **May 2017 – September 2017**

- Developed the backend system for physical identity tracking system web application.

Education

Cape Coast, Ghana	**University of Cape Coast**	**2023 – Present**

- **MPhil Computer Science**
- **Thesis:** Developing a NodeJs/Typescript framework for building USSD applications, with focus on developer productivity, simplicity and scalability.

Cape Coast, Ghana	**University of Cape Coast**	**2017 – 2021**

- B.Sc. Information Technology, October 2021. GPA: 3.6 (First Class).

Cape Coast, Ghana	**University Senior High School**	**2013 – 2016**

- Studied Business with Elective mathematics.

Technical Experience

Projects

- **Teaching Timetable Management System** A system which automates the scheduling and management of teaching timetables for the University of Cape Coast, Ghana.
- **Afiewura: Room Search & Rent Financing App** (1000+ downloads). An app which makes it easier to apply for rent finance, pay rent monthly, request maintenance, or reserve amenities in Ghana.
- **Microsoft Office Suite Questions App** (1000+ downloads). An app which makes practicing Microsoft Word, Office, PowerPoint and Access quiz questions very easy, with 1800+ solved questions available offline.

Additional Experience

Research Publications

- Ephrim, L., Blewudzi, A. K., Umar, H., Haruna, C. R., & Asante, A. (2022). Class Attendance System using WiFi Direct. International Journal of Computer Applications, 183(51), 1–5. https://doi.org/10.5120/ijca2022921929
- Effah, E., Aggrey, G., Oteng, F., Ephrim, L., Kyei, D. A., Darkwah, A. A., Junior, A. J., & Agbodemegbe, E. K. (2024). Survey: The Evolution and Applications of Turing Machine. International Journal of Computer Science and Information Security (IJCSIS), Vol. 22, No. 3, June 2024.

Languages and Technologies

- Typescript; Python; Dart; PHP; SQL; Crystal; JavaScript; Elixir; Java; Kotlin; Ruby; C/C++; Go; .NET (C#)
- Laravel; Ruby on Rails; Django; ExpressJS; NodeJS; NestJS; Lucky; Vue.js; Angular; React; SolidJS; Flask; Tauri; FastAPI
- Android (Java/Kotlin); Flutter
- Linux; Git; Shell; Docker; CI/CD; Nginx; Ansible; Terraform; Kubernetes
- Google Cloud (Storage, Cloud Run, Cloud Build, etc.); Amazon Web Services (Lambda, S3, ECR, etc.); Firebase; Arduino
- PostgreSQL; MySQL; MongoDB; DynamoDB; Redis; RabbitMQ;
- Tableau; Paystack; Mobile Money Integrations; QuickBooks