

# Cosmas Nyairo

[nyairocsmas@gmail.com](mailto:nyairocsmas@gmail.com) | +254799344215 | Nairobi, Kenya

## EXPERIENCE

---

### Safaricom PLC

January 2022 – Present

DevSecOps Engineer I

Nairobi, Kenya

- Implemented cloud infrastructure, cloud architectural designs and cloud adoption plans.
- Deployed scalable and secure cloud infrastructure using Terraform for production, beta, and testing environments that helped champion the Infrastructure as Code initiative within the company.
- Planned, architected and implemented end to end CI/CD pipelines and automation workflows for microservices, web and mobile applications.
- Addition of testing and code quality checks directly into the pipeline to ensure code meets set thresholds.
- Continuously integrated security best practices and tools into cloud applications and CI/CD pipelines, in order to catch vulnerabilities early and aid in shifting security left.

### Safaricom PLC

June 2021 – January 2022

DevOps Engineer

Nairobi, Kenya

- Worked on build and release pipelines for web and mobile applications that improved release frequencies and reduced manual deployments within squads.
- Maintenance of existing architecture through regular updates, setting up monitoring and alerting, aided in championing the Monitoring as Code initiative within the company using monaco.
- Utilized DevOps tools to orchestrate solutions for both on-premise and cloud applications.
- Leverage scripting to aid in automation of tasks in our pipelines and manual tasks done by different squads.
- Collaborated closely with squads towards the incorporation of agile and DevOps practices.

### Strathmore Africa Data Analytics Center

January 2020 – April 2020

Junior Developer

Nairobi, Kenya

- Developed a mobile application that aided in boosting the sales tracking as well as simplification of inventory by shopkeepers in Kenya.
- Trained on project development from design to deployment of the software as well as with Rest backend APIs.
- Worked on creation of UI designs for applications.

## EDUCATION

---

### Strathmore University

2017 – 2021

Bachelor of Informatics and Computer Science

Nairobi, Kenya

## TECHNICAL SKILLS

---

- Python, JavaScript, Golang, Terraform, Kubernetes, Docker, Bash Script, Jenkins, Git, Gitlab CI, Github Actions

## CERTIFICATIONS

---

- HashiCorp Certified: Terraform Associate
- Certified Kubernetes Application Developer (CKAD)

## PROJECTS

---

- Ehr Kenya - Electronic Health Records Storage Application using Blockchain Technology created using Python and Flutter: [Blockchain-EHR](#).
- Tembea Kenya - An application to explore places to visit in Kenya under various categories: [Tembea Kenya](#).
- Faida Estate Management System - A web-based application designed to assist residents and the management committee in their operations within a residential estate: [Faida Estate](#).
- Bisco Bike Sharing App - Part of a team that aimed to solve the high demand of public service vehicles by allowing users to rent out bicycles and drop them off at designated spots.

## ARTICLES

---

- Wrote a blog post on automated api gateway creation and management using terraform: <https://dev.to/cosmasnyairo/aws-rest-api-gateway-using-terraform-k76>.
- Co-Wrote a research paper regarding the project and presented it in the 17th ICT Conference (2019): [Automated Estate Services Management System](#).
- Wrote a medium article documenting the development of the Tembea kenya application: [Making a Places to Visit app using Python and Flutter](#).

## ACHIEVEMENTS

---

- |  |                   |
|--|-------------------|
| Aws UserGroup Kenya  | <b>2022</b>       |
| <ul style="list-style-type: none"><li>• Did a presentation on the three pillars of observability ( Metrics, Traces and Logs) using aws cloudwatch and how to automate it using terraform: <a href="https://www.youtube.com/watch?v=iS4GqFwEnRM&amp;ab_channel=AWSUsergroupKenya">https://www.youtube.com/watch?v=iS4GqFwEnRM&amp;ab_channel=AWSUsergroupKenya</a>.</li></ul> |                   |
| 17th ICT Conference, Strathmore University   | <b>March 2019</b> |
| <ul style="list-style-type: none"><li>• Co-presented a paper titled 'Automated Estate Services Management System' which demonstrated a web-based system that assists residential estate management committees in their operations.</li></ul>   |                   |
| Nairobi Tech Week Hackathon  | <b>2019</b>       |
| <ul style="list-style-type: none"><li>• Developed and presented the bike sharing application in the Nairobi Tech Week Hackathon.</li></ul>   |                   |