Title: Cybersecurity + Blockchain + Trading Roadmap 2026 (Uganda Edition, Updated for Nov 2025)

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1. Overview

This document outlines a **12-month roadmap** for beginners to become highly employable in **Cybersecurity, Blockchain, and Trading**, optimized for **Uganda** and updated for **November 2025**. It includes **weekly milestones, project ideas, verified free resources**, and a **mobile app concept** for structured learning.

Target Device: Lenovo ThinkPad T460 (8GB RAM, 256GB SSD)

Study Commitment: 40 hours/week, free resources only (with optional paid tools clearly noted)

Goal: By the end of 12 months, the learner will be:

- Proficient in basic cybersecurity tools and techniques
- Capable of deploying and auditing blockchain smart contracts
- Experienced in trading strategies, integrating blockchain knowledge
- Ready for employment or freelance opportunities in Uganda and globally

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2. 12-Month Learning Roadmap (Updated 2025)

Phase 1: Foundations (Weeks 1–12)

Week	Focus	Tasks/Projects	Verified Free Resources	Notes
1–2	Linux Basics	Install Ubuntu/Kali VM; navigate file system, practice commands	Ubuntu Linux Tutorials, LinuxCommand.org	Free
3–4	Networking Fundamentals	TCP/IP, DNS, ports; set up home network lab	Cisco Networking Basics	Free

5–6	Cybersecurity Intro	Security concepts, encryption, firewalls	Cybrary Free Courses, Blue Team Labs Online Free Labs	Free
7–8	Python Basics	Variables, loops, functions, file I/O	Automate the Boring Stuff, freeCodeCamp Python	Free
9–10	Blockchain Fundamentals	Bitcoin/Ethereum basics, wallets, consensus	Binance Academy, CryptoZombies	Free
11–12	Git & Version Control	Git commands, GitHub setup, first repo	Git Handbook	Free

Projects: Set up VM snapshots, document home network, automate simple tasks with Python

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Phase 2: Core Skills (Weeks 13–24)

Week	Focus	Tasks/Projects	Verified Free Resources	Notes
13–14	Kali Linux Tools	Install Kali; explore Nmap, Wireshark, Netcat	Kali Docs	Free
15–16	Ethical Hacking Basics	Scanning, enumeration, penetration testing	TryHackMe Free Rooms	Free (some advanced labs require subscription)
17–18	Blockchain Dev	Hardhat, Truffle, first Solidity contract	CryptoZombies, Remix IDE	Free
19–20	Web3 Security Basics	Smart contract vulnerabilities	Consensys Smart Contract Best Practices	Free
21–22	Python for Trading/Security	Scripts to fetch crypto prices, basic backtesting	freeCodeCamp Python APIs	Free
23–24	GitHub Portfolio	Upload Python scripts & Solidity projects	GitHub Guides	Free

Projects: Scan home network for open ports, deploy simple smart contract on testnet, Python script to fetch crypto prices

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Phase 3: Intermediate Projects (Weeks 25–36)

Week	Focus	Tasks/Projects	Verified Free Resources	Notes
25–26	Pen Testing Labs	Metasploit, DVWA, Metasploitable labs	VulnHub Labs	Free
27–28	Smart Contract Auditing	Deploy contract with intentional bugs, practice auditing	Ethernaut	Free
29–30	Advanced Python	Automate trade analysis; connect to Binance API	Binance Testnet API	Free
31–32	Simulated DeFi Security	Testnet DeFi protocols; detect vulnerabilities	Remix IDE	Free
33–34	Crypto Security Scripts	Python scripts to monitor wallet transactions	freeCodeCamp Python APIs	Free
35–36	Portfolio Projects	Combine trading bot + smart contract + security audit example	GitHub	Free

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Phase 4: Specialization & Portfolio (Weeks 37–52)

Week	Focus	Tasks/Projects	Verified Free Resources	Notes
37–38	Advanced Security Labs	SOC monitoring, vulnerability assessment	TryHackMe Intermediate Paths	Free (some advanced labs optional paid)
39–40	Solidity Advanced	Full smart contract project on testnet	CryptoZombies / Remix IDE	Free
41–42	Trading + Blockchain Integration	Automate trades based on smart contract events	Binance Testnet + Python	Free
43–44	Security Audits	Audit sample smart contract, document findings	Consensys Best Practices	Free

45–46	Portfolio Refinement	Upload all projects to GitHub & LinkedIn	GitHub / LinkedIn	Free
47–48	Mock Freelance Projects	Offer free audits or small freelance tasks	Upwork / Fiverr (free to join)	Optional
49–50	Resume & Job Prep	Cybersecurity + Blockchain + Trading CV	Canva / LinkedIn	Free
51–52	Capstone Project	Deploy smart contract, simulate trades, secure system, document report	GitHub + YouTube demo	Free

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3. Mobile App Concept (Updated for 2025)

App Name: CyberSec + Blockchain + Trading 2026

Core Features:

- Interactive modules per phase/week
- Progress tracker and reminders
- Project planner & portfolio builder
- Free resources library (verified 2025 links)
- Quizzes & mini challenges
- Offline mode for lessons & resources
- Optional community/discussion boards

Recommended Additions:

- Gamification: badges for completing weeks/projects
- Calendar integration for study scheduling
- Export progress & portfolio as PDF
- Push notifications for deadlines & quizzes
- Optional crypto-tracking widget for trading practice

Design Requirements:

- Lightweight, modular design for low-spec devices
- Dark & light mode
- Fully functional offline/online mode
- Android 8+ compatibility

Outcome:
Users follow a **structured roadmap**, complete **portfolio projects**, and become ready for **employment or freelancing** in Uganda or globally.

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4. Additional Tips for Success

- Follow **40hrs/week schedule**, divided into focused sessions
- Prioritize **hands-on projects over theory**
- Use **free labs, testnets, and open-source tools** for practice
- Document all projects on **GitHub + LinkedIn**
- Join **Uganda blockchain and cybersecurity communities**
- Build a **portfolio and CV** alongside learning

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5. Free Resource Summary (Updated 2025)

Skill	Resource
Linux	Ubuntu Tutorials, LinuxCommand.org
Networking	Cisco Networking Basics (NetAcad)
Cybersecurity	TryHackMe (free rooms), Cybrary Free Courses, Blue Team Labs Online (free labs)
Python	Automate the Boring Stuff, freeCodeCamp Python
Blockchain	Binance Academy, CryptoZombies, Remix IDE
Smart Contract Security	Consensys Best Practices, Ethernaut
Trading	TradingView free plan, Binance Testnet API
Version Control	GitHub Guides
Labs/Practice	VulnHub, Metasploitable, DVWA

End of Document (Updated for Nov 2025)