

## Group Formation Rules

- You may work individually or in a group of up to 3 members.
- Team collaboration is encouraged, but solo projects are equally allowed.
- Every participant is responsible for their contribution.

## Blue Team (Defensive Security)

- Adaptive Threat Intelligence Co-Pilot (ATICoPilot)
- Shadow-IT Detection & Local-Control Gateway
- Atomic Coverage Health Scanner (ACHS)
- Zero-Day Exposure Radar (ZDER)
- IoT Behavioral Whitelisting Gateway
- Resilience-Oriented Cyber Hygiene Simulator Purple Teaming (Red + Blue Collaboration)
- Simulate & Detect PowerShell Attacks
- Credential Dumping Monitoring (e.g., Mimikatz)
  - Malware Behavior Analysis (AnyRun/Cuckoo)
- USB Drop Attack Detection
- Phishing Simulation & Email Header Review
- Build Detection Rules using MITRE mapping
- Honeypot Setup & Log Analysis

- Full Kill Chain Simulation

## Network Security & Cybercrime Investigation

- Dark Web Threat Intelligence Platform
- IoT Forensic Toolkit
- OSINT Aggregator for Investigations
- AI-based Cybercrime Reporting Portal
- Cyberstalking Detection System

## Purple Teaming (Red + Blue Collaboration)

- Simulate & Detect PowerShell Attacks
- Credential Dumping Monitoring (e.g., Mimikatz)
- Malware Behavior Analysis (AnyRun/Cuckoo)
- USB Drop Attack Detection
- Phishing Simulation & Email Header Review
- Build Detection Rules using MITRE mapping
- Honeypot Setup & Log Analysis
- Full Kill Chain Simulation

## Red Teaming (Offensive Security)

- AI-Based Phishing Simulator

- Browser Credential Harvester Extension
- USB Payload Builder
- Active Directory Attack Lab
- Wi-Fi Evil Twin Simulator
- Insider Threat Emulation Toolkit
- Covert C2 Channels Framework
- Social Engineering Toolkit

## Project Proposals

- You are not restricted to the above ideas.
- You are free to propose your own unique project ideas if you are confident and comfortable doing so.
  - The project must align with cybersecurity, OSINT, digital forensics, or threat intelligence.

## Tools & Description Requirement

For every tool or technology used in the project, the following must be included:

- Tool Name
- Brief Description of its Purpose
- How it will be used in the project

- Mention any alternative tools considered for the same task or domain. This helps reflect your research and decision-making process

## Final Submission Checklist

- Project Title
- Abstract / Summary
- Tools & Tech Used
- GitHub Repo
- Final PPT/PDF Presentation
- Project Demo (video/report/screenshots)