



SMARTER THAN 2024

- **Problem Statement ID – 1684**
- **Problem Statement Title-** Agent-less
Windows System Vulnerability and Network
Scanner
- **Theme-** Blockchain & Cybersecurity
- **PS Category-** Software
- **Team ID-**
- **Team Name : Code breakers**



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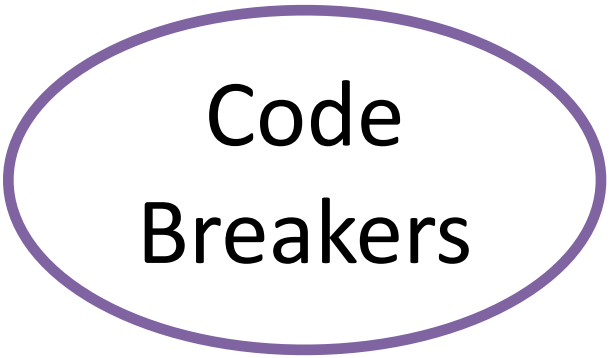
Agent-WindowSystemVulnerabilityandNetworkScanner

Detailed explanation of the proposed solution

- Our solution is an agent-less vulnerability and network scanner for Windows OS, using **blockchain, cybersecurity**, and **AI/ML** technologies.
- It leverages native tools like WMI and PowerShell to perform system and network-level vulnerability assessments by analyzing configurations, user accounts, firewall rules, and open ports.
- It integrates with threat intelligence databases like ExploitDB and CVE to identify known vulnerabilities and provide remediation steps.
- Using blockchain for secure logging ensures tamper-proof records, while AI/ML models perform anomaly detection and risk prediction to improve detection accuracy.
- The findings are compiled into a comprehensive PDF/HTML report with mitigation strategies, offering a smart, secure, and innovative solution for system security.

How it addresses the problem

- **Addresses Vulnerabilities:** Identifies outdated or misconfigured Windows systems to prevent security risks.
- **Agent-less Deployment:** No installation needed, reducing complexity and minimizing attack surfaces.
- **Proactive Security:** Maps system and network vulnerabilities to help users secure their systems.
- **Automated Reporting:** Ensures continuous monitoring and quick remediation of vulnerabilities.



Code
Breakers



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Innovation and uniqueness of the solution

- **Agent-less Approach:** Operates without requiring an agent, reducing system overhead and integrating seamlessly with native tools like PowerShell and WMI.
- **Blockchain Integration:** Ensures tamper-proof, immutable logging of scans, enhancing data integrity in cybersecurity.
- **AV/EDR Friendly:** Complements existing AV and EDR tools, working alongside them for comprehensive security coverage.
- **AI/ML and Threat Intelligence:** Uses AI/ML for anomaly detection and integrates threat intelligence for real-time vulnerability identification and patching.
- **Comprehensive Scanning:** Provides system and network assessments with automated reports for easy remediation.