

# Shubham Avhad

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Detail-oriented Cyber Security professional with hands-on experience in **network security**, **cloud computing**, and **vulnerability assessment**. Seeking to leverage my expertise in **AWS services** (EC2, Lambda, S3), security tools (**Wireshark**, **Metasploit**), and **scripting** (Python, Bash) at Amazon to enhance **system security** and protect organizational assets from emerging threats.

## PROFESSIONAL EXPERIENCE

[Zyduz](#): Cyber Security Engineer | Mumbai, India

Aug 2019 - Nov 2023

- Assisted in implementing **network security** measures using **Snort** and **Suricata**, analyzing traffic patterns to identify **vulnerabilities** and potential **threats**. Developed **Python scripts** to automate data collection and analysis from various security tools, improving **incident response** time by 20% and reducing manual workload.
- Participated in **vulnerability assessments** and **penetration testing** using **Metasploit**, documenting findings and providing actionable recommendations for remediation. Conducted security audits on web applications, identifying and addressing vulnerabilities such as **SQL injection** and **cross-site scripting (XSS)**.
- Designed and deployed **server less applications** using **AWS Lambda** and **API Gateway**, ensuring scalability, cost-effectiveness, and high availability. Developed and maintained an automated deployment **pipeline** using **AWS CloudFormation** and **AWS CodePipeline**, streamlining application deployment processes.
- Implemented monitoring and **logging solutions** using **AWS CloudWatch** and **Kibana**, enabling real-time visibility into application performance and security events. Conducted **cost analysis** and optimization strategies for **cloud resources**, resulting in a **15% reduction** in monthly expenses.

[Essel Group](#): Web Developer Intern | Mumbai, India

Apr 2018 - Jun 2018

- Integrated **RESTful APIs** to dynamically display data, managed state using **Redux** and **Context API**, and improved code quality by following best practices in coding standards and **version control (Git)**.
- Built and optimized responsive web pages using **HTML5**, **CSS3**, and **JavaScript** to enhance user experience and ensure cross-browser compatibility. Worked on **MySQL** and **MongoDB** database integrations, helped manage data flow between the **client-side application** and the **database** securely.

## PROJECTS

[Azure Cloud](#) Cloud Security Project

- Provisioned an **Azure VM** and deployed a **secure scalable web server** with **SSL/TLS encryption** and **firewall configurations**. Applied **Network Access Controls** and **RBAC Principles** to restrict database access and configured **Azure Backup** with **Geo-redundancy** for **disaster recovery**. Implemented autoscaling and load balancing to ensure high availability and optimal performance during peak loads.

[Network Intrusion Detection System \(NIDS\)](#)

- Developed a robust **network intrusion detection system** using **Snort** to monitor and analyze **real-time network traffic**. Conducted extensive testing and optimization of the NIDS, resulting in a reduction of false positives by 30% and enhancing overall detection accuracy. Created a detailed report on detected threats, providing actionable insights and recommendations for improving network security.

[Cloud-Based Access Control System](#)

- Architected a **cloud-based access control system** utilizing **AWS Lambda**, **DynamoDB**, and **API Gateway** to manage user permissions and authentication for a web application. Utilized **AWS IAM** policies to enforce strict security measures and ensure that only authorized users had access to sensitive data and functions.

[Capture The Flag](#)

- Participated in Capture the Flag (CTF) competitions to hone skills in penetration testing and vulnerability assessment.

## TECH STACK

**Programming:** Python, JavaScript, Java, C, HTML, CSS, Kotlin

**Frameworks:** Angular, Express, Next, React, Unreal, Android SDK, Firebase, Jetpack, PowerShell

**Tools:** Azure (AAD, Firewall, Defender, ASC), Git, Github, Microsoft Office, Office 365

**Platforms Services:** Azure Cloud, Azure Sentinel, AWS (EC2, Lambda, S3, DynamoDB, SQS), Linux Command Line, MacOS, Windows

**Certifications:** Microsoft Cyber Security Analyst, Red Hat Enterprise Linux,

**Core:** Cloud Security & IAM (AWS, Azure AD), Incident Response Management, SIEM Management Splunk, Azure Cloud SQL DB

**Security Domain:** Access-control systems, application and system development security

## EDUCATION

George Washington University, School of Engineering, Washington, DC

Master of Science in Cyber Security in Computer Science

Dec. 2025

GPA: 3.5

