NAVYA JAIN

+91-8826143872 | navya08jain@gmail.com

www.linkedin.com/in/navya-jaiin | https://github.com/nxvyx | https://tryhackme.com/p/nxvyxx

Cyber Security Enthusiast | Certified Ethical Hacker

Objective

Aspiring Cybersecurity Professional with hands-on experience in phishing detection, steganography, and ethical hacking. Proficient in Python, Linux, and vulnerability assessment. Strong background in developing secure systems using encryption, steganography, and ML algorithms. Passionate about securing digital assets and reducing threats through practical, research-based solutions.

Work Experience

Deloitte Australia Cyber Job Simulation on Forage *June 2025*

- Completed a job simulation involving reading web activity logs
- Supported a client in a cyber security breach
- Answered questions to identify suspicious user activity

Mastercard Cybersecurity virtual experience program on Forage *June 2025*

- Completed a job simulation where I served as an analyst on Mastercard's Security Awareness Team
- Helped identify and report security threats such as phishing
- Analyzed and identified which areas of the business needed more robust security training and implemented training courses and procedures for those teams

AI Intern

Zigguratss Artwork LLP | Remote *June 2024 – November 2024*

- Contributed to the Visual Search team, enhancing image-based search functionality.
- Improved the accuracy of image recognition models and **optimized feature extraction techniques for performance** on large-scale image datasets.
- Implemented website data scraping pipelines to gather training data for visual AI and phishing detection models.
- Collaborated on integrating visual AI features with phishing detection use cases for advanced threat identification.

Skills

- **Programming Languages:** Python, SQL, C++
- **Database Systems**: MySQL, Microsoft Server, NoSQL
- **Data Science & Machine Learning**: TensorFlow, PyTorch, Pandas, Matplotlib, OpenCV, Seaborn
- **Cloud Technologies**: Amazon AWS
- **Cyber Security**: Penetration Testing, Ethical Hacking, Threat Analysis, Vulnerability Assessment, SOC Analysis
- **Networking**: TCP/IP networking fundamentals, OSI Model, Networking Protocols, Secure Protocols
- **Libraries:** PyTorch, Pandas, Numpy, Scikit-learn, Requests, Flask, BeautifulSoup, Scrapy, Streamlit
- **Other Tools & Technologies**: Nmap, Wireshark, theHarvester, GIT, h3ping, VMware, ChatGPT, Burpsuite
- **Systems & OS:** Linux, Window, Bash Shell Scripting

Certifications

EC-Council: Certified Ethical Hacker, Google Cybersecurity, Improving Deep Neural Networks: Hyperparameter Tuning, Regularization and Optimization, Managing Network Security, Operating Systems and You: Becoming a Power User By Google, Algorithmic Toolbox, Exploratory Data Analysis for Machine Learning, Software Engineering

Projects

• StegoShield: Image-based Steganography Tool

Tools: Python, OpenCV, Tkinter, Cryptography, NumPy, PIL *November 2022*

- Built a GUI-based steganography tool using Python to securely embed and extract text messages within image files.
- Implemented Least Significant Bit (LSB) technique to hide data in pixel values without altering image quality.
- Enabled password-protected message encryption before embedding, enhancing overall security.
- Used Tkinter for intuitive user interface and OpenCV/PIL for image manipulation and preview.
- Supported multiple image formats and ensured lossless embedding and decoding of hidden messages.
- Integrated input validation, error handling, and basic logging to ensure robust performance.

• PhishGuard: Machine Learning-based Phishing Website Detector

Tools: Python, scikit-learn, Pandas, NumPy, Flask, BeautifulSoup, Requests, joblib *Feb 2024 - April 2024*

- Developed a phishing website detection system using supervised machine learning techniques.
- Trained multiple models (Logistic Regression, Random Forest, SVM) using scikit-learn and evaluated performance with accuracy, precision, recall, and F1-score.
- Selected Random Forest Classifier for deployment based on its superior accuracy, low false positive rate, and **optimized performance for real-time prediction.**
- Built a simple Flask web application that takes a URL input and predicts phishing probability in real-time.
- Exported and loaded trained models with joblib for fast inference and minimal latency.

• EncryptX: Advanced File Encryption Tool

Tools: Python, PyQt5, PyCryptodome, AES-GCM, AES-EAX *November 2024*

- Developed EncryptXpert, a cross-platform encryption tool with both GUI (PyQt5) and CLI support for secure file handling.
- Integrated AES-GCM and AES-EAX encryption algorithms for high-assurance cryptographic protection, **with an emphasis on efficient and secure system programming practices.**
- Designed a secure key database system for safe storage and retrieval of encryption keys and nonces.
- Implemented robust error handling, logging, and user-friendly prompts to enhance usability and security.
- Ensured compatibility across Windows, Linux, and macOS platforms.
- Drafted a comprehensive security policy addressing access control, secure storage, logging, compliance, and incident response.

Involvement

Tech Head – Quantum Computing Club (QCC)

Bennett University *September 2023 - August 2024*

- Led technical initiatives and project planning within the club
- Mentored peers and junior members, conducted workshops, and fostered a collaborative learning environment.
- Contributed to the strategic growth of the club's technical vision and hands-on learning ecosystem.

Volunteer Content Creator

Team Everest | Remote *May 2021 – June 2021*

- Created educational content to support **digital literacy** among underprivileged students.
- Developed and aligned materials with the **CBSE curriculum**, focusing on accessibility and student needs.

Education

• Bennett University ***September, 2022 - June, 2026***

Bachelor of Technology - Computer Science Greater Noida, Uttar Pradesh, India

• Lancers Convent *2021-2022*

CBSE 12th Grade Rohini, Delhi