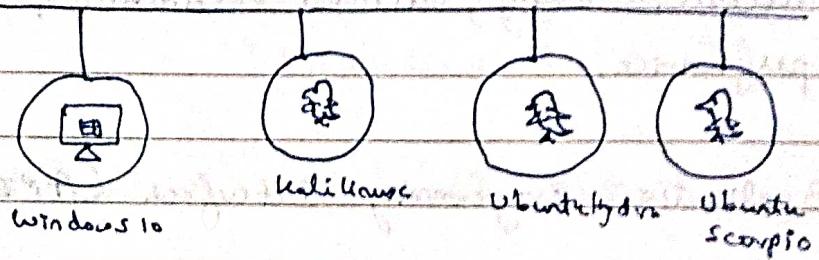


Cyber Security

- Basic Computer and Networking Concepts
- Common Networking Terminology

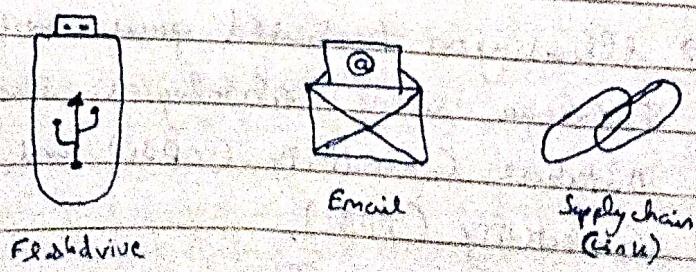
Test Network



Test Network Options

- Raspberry pi on your home Network
- Virtual Box test Network on your Computer
- VMware test Network on your Computer
- proxmox virtual Machine manager.

weapons (Weaponization)

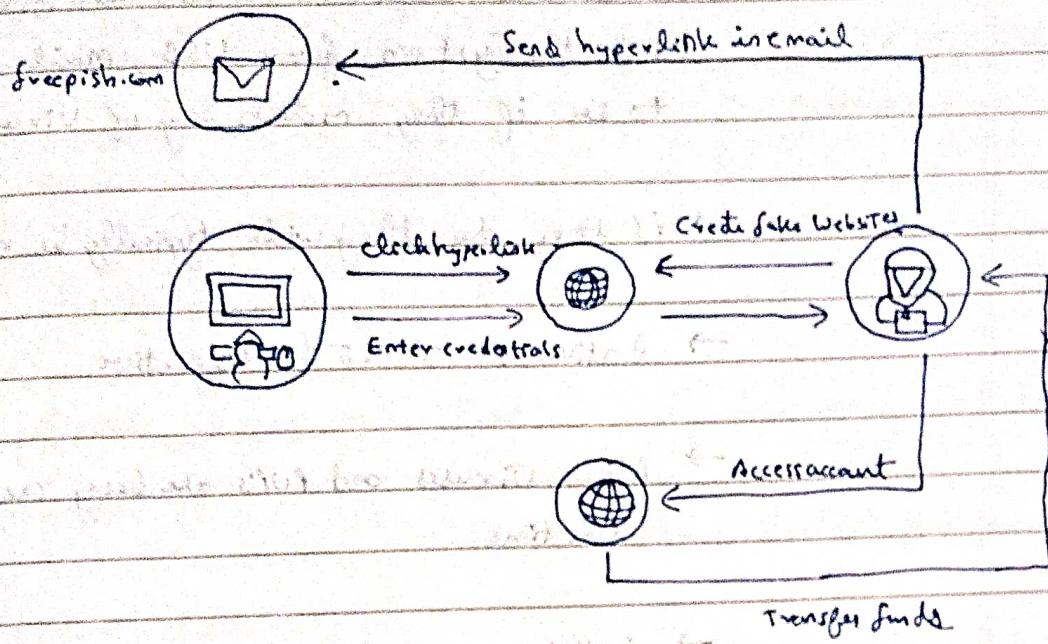


COMMON FORMS OF CYBERATTACK

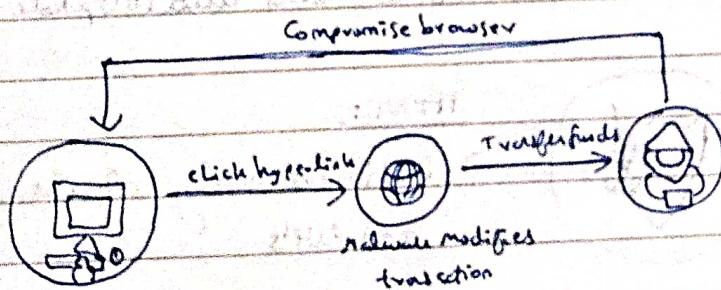
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DATE

FAKE WEBSITES:-



MAN IN THE BROWSER:-



Adware + Spyware → PUP's
(Potentially Unwanted Programs)

Antivirus Software.

→ Antivirus Software checks all files Coming into the System from USB, Mail or Website to see if they match any of Viruses or PUP's

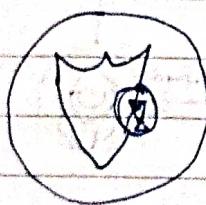
→ If they do, they will typically be removed.

→ Antivirus → 95% Effective

→ New Viruses and PUP's are being created all the time

→ Antivirus → Needs to be updated Regularly

→ Business used to Update Antivirus every 4 hours
Home users used to update Once a week.



HINT:

→ Antivirus only checks existing Virus and PUP's

To check new one we have to Update

Artificial Intelligence.

→ Using AI → To Enhance Security Network

→ Using AI → To Develop Security Tools

Microsoft Defender Antivirus (Inbuilt)

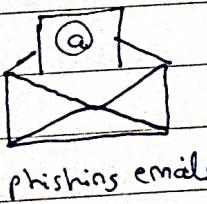
Start → Windows Security → Microsoft Defender
Antivirus

Ransomware → Enable

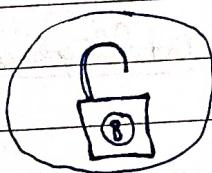
Protect folder → Protects only selected folder

Exclusion → ~~protects~~ Leaves the selected folder.

Cyber attack



phishing emails



Unprotected Network

Firewall Basic

→ Mediate access from one computer to another

→ Block or allow access to services

→ Rep. entries to internal computer addresses

We can use cmd to chat with other computer by typing IP address.

user: > nc 192.160.173.124

Hello...

Network Scanning: Nmap

Nmap Scan → Cybersecurity
(Software)

OWASP → Security Software.

Artificial Intelligence

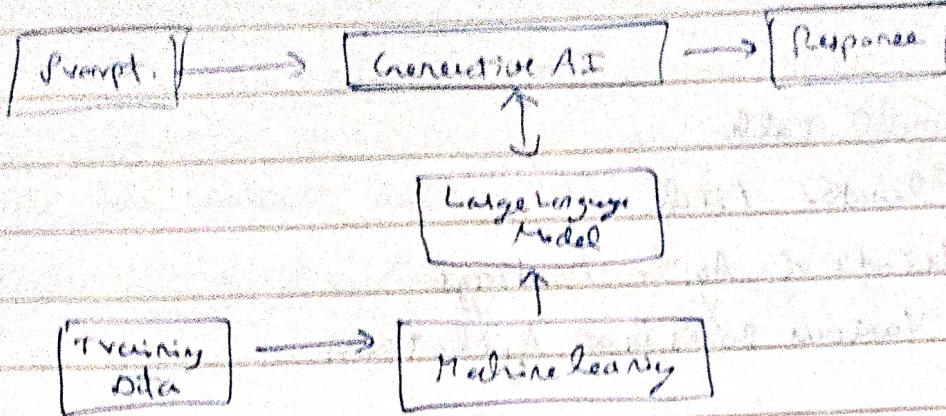
Industrial application

Voice generation, image recognition

Problem Solving for Specific user

Robotics area

Cognition

Generative AI

Attacker → wants to break your code



Security-minded
Developer