#### 1. What is a VPN?

Ans: A VPN (Virtual Private Network) is a service that encrypts internet traffic and routes it through a secure server. This connection protects data from being intercepted by unauthorized parties.

# 2. How does a VPN protect privacy?

Ans: By masking the IP address, prevents location-based tracking.

# 3. Difference between VPN and proxy?

Ans: VPNs provide end-to-end encryption while a proxy server only redirects specific traffic through a different IP address.

## 4. What is encryption in VPN?

Ans: Process of converting data into a secure, unreadable format that can only be decrypted with the correct key.

### 5. Can VPN guarantee complete anonymity?

Ans: No as most VPN providers keep some level of logs or metadata.

# 6. What protocols do VPN use?

Ans: OpenVPN, IPsec

### 7. What are some VPN limitations?

Ans: Inducing potential speed reductions due to encryption overhead and server congestion.

## 8. How does VPN affect network speed?

Ans: introducing latency and reducing bandwidth due to encryption overhead.