Task 8: VPN Configuration and IP Address Verification Report

Objective: Understand the role of VPNs in protecting privacy and security by configuring and verifying VPN functionality.

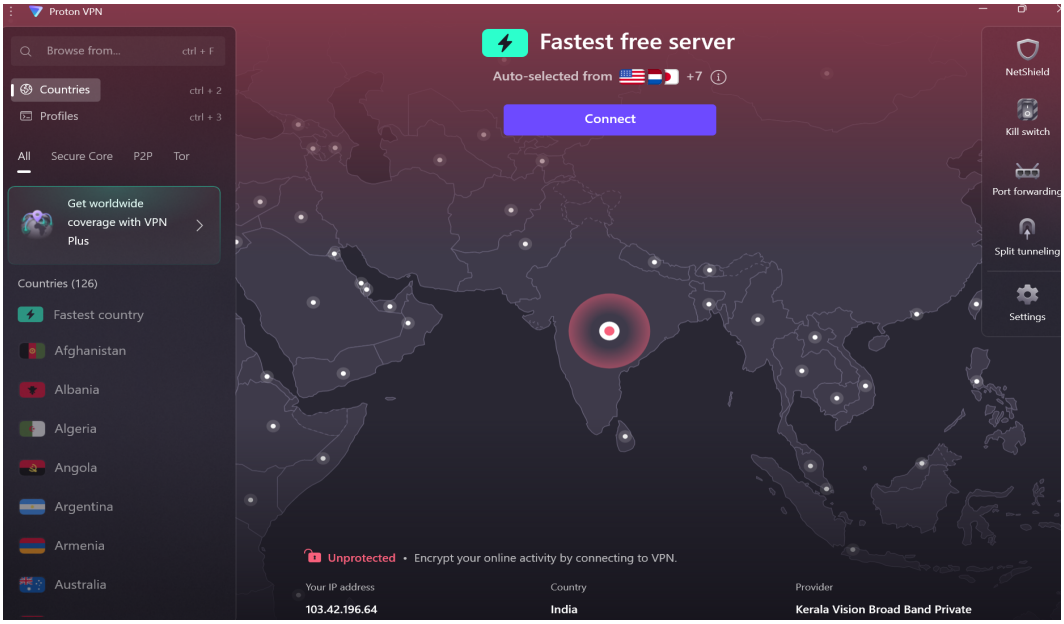
Tools Used: ProtonVPN (Free Tier), whatismyipaddress.com

Steps Performed:

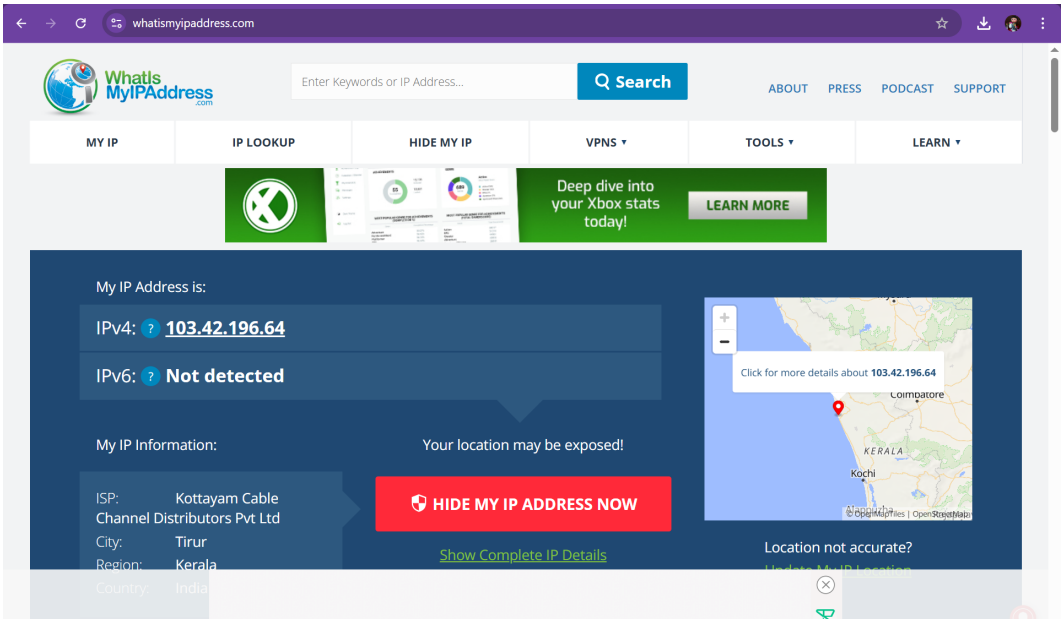
1. Chose ProtonVPN as the free VPN service and signed up for an account.
2. Downloaded and installed the ProtonVPN desktop client.
3. Launched ProtonVPN and selected the ‘Fastest free server’ option.
4. Verified the IP address before connecting to the VPN using whatismyipaddress.com.
5. Connected to a VPN server located in Zurich, Switzerland.
6. Checked the IP address again after connecting to confirm the change.
7. Compared the two IP addresses to confirm that the VPN successfully masked the original IP.
8. Noted the changes in speed, location, and ISP information.

Screenshots:

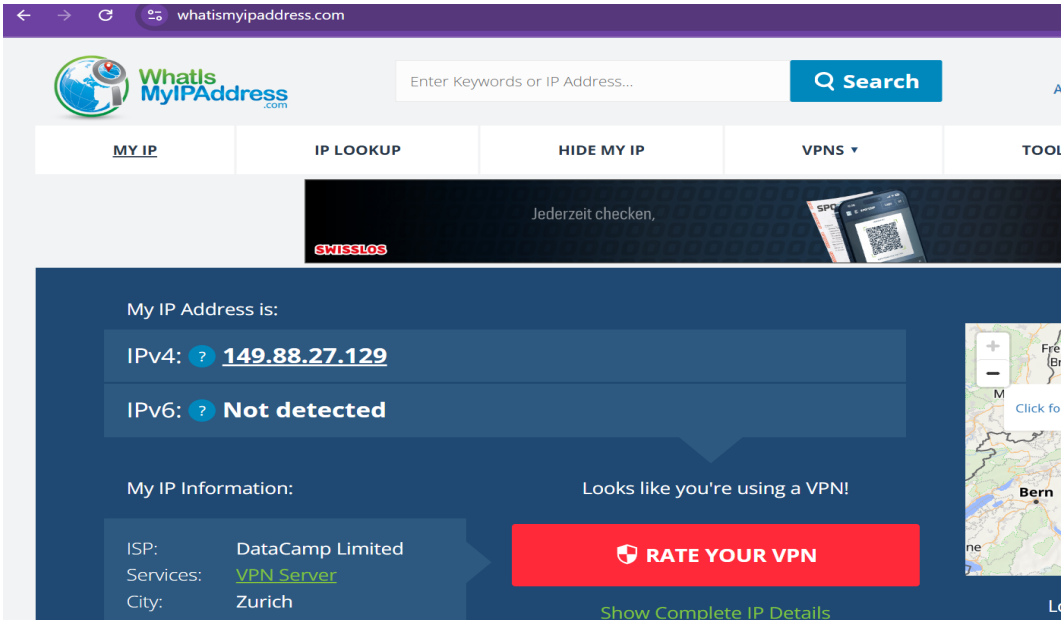
Below are the screenshots showing the VPN setup and IP address verification process.



ProtonVPN interface before connection



IP address before connecting to VPN



IP address after connecting to VPN

Summary:

Using ProtonVPN, the IP address was successfully changed from an Indian ISP to a Swiss server IP. This confirms that the VPN encrypts traffic and hides the user's real IP address, enhancing privacy and security. However, the VPN connection slightly reduced browsing speed due to encryption overhead. Overall, VPNs are effective for maintaining online anonymity and securing communication channels.