Q1. What are the different types of networks?

Ans :- LAN → Local area network   MAN→ metropolitan area network wan- wide are network

Q2 Explain the shielded twisted pair(STP) and Unshielded twisted pair (UTP)

Ans :- Shielded twisted pair cable (STP) has the individual pairs of wires wrapped in foil, which are then wrapped again for double protection. Unshielded twisted pair cable (UTP) has each pair of wires twisted together. Those wires are then wrapped in tubing without any other protection

Q 03 What is difference between baseband and broadband transmission?

Ans :- The major difference between broadband transmission and baseband transmission is that the baseband transmission uses the complete bandwidth for transmitting the signals and occupy the whole cable while in broadband transmission, at the same time, multiple signals can be transmitted using multiple frequencies using only

Q04 What is the difference between a hub, modem, router and a switch?

Ans :- A **hub** works on the physical layer (Layer 1) of OSI model while **Switch** works on the data link layer (Layer 2). ... A **switch** can join multiple computers within one LAN, and a **hub** just connects multiple Ethernet devices together as a single segment. **Switch** is smarter than **hub** to determine the target of the forwarding data.

Q05 When you move the NIC cards from one PC to another PC, does the MAC address gets transferred as well?

Ans :- When **you move the NIC cards from one PC to another PC**, **does the MAC address gets transferred as well**? Yes, that's because **MAC addresses** are hard-wired into the **NIC** circuitry, not the **PC**. This also means that a **PC** can have **a different MAC address** when **another one** replaced the **NIC card**.

Q06 When troubleshooting computer network problems, what common hardware-related problems can occur?

Ans :- **When troubleshooting computer network problems, what common hardware-related problems can occur**? A large percentage of a **network** is made up of **hardware**. **Problems** in these areas **can** range from malfunctioning hard drives, broken NICs, **and** even **hardware** startups

Q07 In a network that contains two servers and twenty workstations, where is the best place to install an Anti-virus program?

Ans- **In a network that contains two servers and twenty workstations, where is the best place to install an Anti-virus program**? The **best** solution is to **install anti-virus** on all the computers in the **network**.

Q08 Define Static IP and Dynamic IP? Discuss the difference between IPV4 and IPV6.

Ans - **What is the difference between** a **dynamic** and **static IP** address? When a device is assigned a **static IP** address, the address does not change. Most devices use **dynamic IP** addresses, which are assigned by the network when they connect and change over time.

Q09 Discuss TCP/IP model in detail.

Ans- TCP/IP, or Transmission Control Protocol/Internet Protocol, is a suite of communication protocols used to interconnect network devices on the internet. TCP/IP can also be used as a communications protocol in a private computer network (an intranet or extranet).

The entire IP suite -- a set of rules and procedures -- is commonly referred to as TCP/IP. TCP and IP are the two main protocols, though others are included in the suite.The TCP/IP protocol suite functions as an abstraction layer between internet applications and the routing/switching fabric.

Q10 What is a Web Browser (Browser)? Give some example of browsers.

Ans :- A web browser, or simply 'browser,' is an application used to access and view websites. Common web browsers include Microsoft Edge, Internet Explorer, Google Chrome, Mozilla Firefox, and Apple Safari.

Q11 What is a search engine? Give example.

Ans- A search engine is a web-based tool that enables users to locate information on the World Wide Web. Popular examples of search engines are Google, Yahoo!, and MSN Search.

Q12 What is the Internet & WWW? What are the uses of internet in our daily life?

Ans - the **internet** has become unavoidable in **our daily life**. Appropriate **use** of the **internet** makes **our life** easy, fast and simple. The **internet** helps us with facts and figures, information and knowledge for personal, social and economic development

Q13 What is an Internet Service Provider? Give some example of ISP in India.

Ans- The examples of some internet service providers are Hathway, BSNL, Tata teleservices, Verizon, Reliance Jio, ACT Fibernet and many more working in India as well as worldwide. Internet service providers or ISPs are responsible for providing services for using the Internet

Q14 Discuss the difference between MAC address, IP address and Port address.

ANs- The main **difference between MAC** and **IP address** is that, **MAC Address** is used to ensure the physical **address** of computer. It uniquely identifies the devices **on a** network. While **IP address** are used to uniquely identifies the connection of network with that device take part **in a** network.