

## what is internet for interview questions

Here is a clean, interview-ready explanation of “What is the Internet?” along with interview questions and answers, simple definitions, and advanced concepts.

---

## ✓ What Is the Internet? (Interview-ready Definition)

The Internet is a global network of interconnected computers that communicate using standard protocols (mainly TCP/IP) to share information and resources.

It allows devices worldwide to send, receive, and access data such as websites, emails, files, videos, and applications.

---

## ✓ Simple Definition (Beginner Level)

Internet = International Network → a huge network of networks connecting computers all over the world.

---

## 🌐 Key Points to Mention in an Interview

- Massive network connecting millions of devices.
  - Uses TCP/IP protocol suite.
  - Enables services like WWW, email, FTP, VoIP, cloud computing.
  - No single owner; it is decentralized.
  - Uses infrastructure like routers, servers, ISPs, fiber cables.
  - Accessed through Internet Service Providers (ISPs) like Jio, Airtel, etc.
- 

## 📌 Interview Questions (With Answers)

---

### 1. What is the Internet?

**Answer:**

The Internet is a global network of interconnected computers that communicate using TCP/IP protocols to share information and resources.

## 2. Who invented the Internet?

**Answer:**

The Internet evolved from **ARPANET**, developed by the U.S. Department of Defense (DARPA) in the late 1960s.

## 3. What is the difference between Internet and WWW (World Wide Web)?

**Answer:**

- **Internet:** The actual network of computers.
- **WWW:** A collection of web pages and websites that run on top of the Internet using HTTP/HTTPS.

## 4. What is a Protocol?

**Answer:**

A protocol is a set of rules that define how data is transmitted between devices.

Example: TCP/IP, HTTP, FTP, SMTP.

## 5. What is TCP/IP?

**Answer:**

TCP/IP (Transmission Control Protocol/Internet Protocol) is the fundamental communication protocol used to connect devices on the Internet.

## 6. What is an IP Address?

**Answer:**

An IP address is a unique numerical identifier assigned to every device connected to the Internet.

## 7. What is DNS?

**Answer:**

DNS (Domain Name System) converts human-readable domain names (like google.com) into IP addresses that computers understand.

---

**8. What is a Router?****Answer:**

A router is a networking device that forwards data packets between networks.

---

**9. What is an ISP?****Answer:**

ISP (Internet Service Provider) is a company that provides Internet access (e.g., Jio, BSNL, Airtel).

---

**10. What is Bandwidth?****Answer:**

Bandwidth is the maximum amount of data that can be transmitted through an Internet connection per second (measured in Mbps or Gbps).

---

**11. What is Latency?****Answer:**

Latency is the time delay between sending and receiving data packets over the Internet.

---

**12. What is the difference between IPv4 and IPv6?****Answer:**

- **IPv4:** 32-bit address (e.g., 192.168.0.1)
  - **IPv6:** 128-bit address, much larger address space (e.g., 2001:db8::ff00:42:8329)
- 

**13. What is a Firewall?**

**Answer:**

A firewall is a security system that monitors and controls incoming and outgoing network traffic.

---

**14. What is a Server?****Answer:**

A server is a powerful computer that provides services, resources, or data to other devices (clients) on the network.

---

**15. How does the Internet actually work?****Answer (short):**

- Devices send data → Data is broken into packets
- Packets travel through routers and cables
- Packets reach the destination device
- Destination reassembles the packets

Uses TCP/IP to manage the process.

---

 **If you want, I can also prepare:**

- ✓ PDF Notes
- ✓ 20, 50, or 100 interview questions
- ✓ Diagram explaining how the Internet works
- ✓ MCQs with answers

Just tell me **"Make PDF"** or **"Give more questions"**.



full details and explanation all questions

Below is the **full, in-depth explanation** of all important Internet interview questions.  
This is **complete theory**, detailed enough for **B.Tech, MCA, software engineering**,

networking, IT support, and web developer interviews.

---



## INTERNET – Full Detailed Explanation for Interview

---



### 1. What is the Internet?

#### Definition:

The **Internet** is a global system of interconnected computer networks that communicate using the **TCP/IP protocol suite**.

It allows computers, servers, smartphones, and other devices around the world to exchange data and access online resources.

#### In simple words:

Internet = **Network of networks**.

#### What it provides:

- Websites
- Emails
- Online banking
- Cloud services
- Social media
- Online video streaming
- File transfer
- Gaming
- Web applications

#### Key features:

- Decentralized (not owned by a single organization)
  - Global connectivity
  - Uses TCP/IP
  - Millions of servers and routers
- 



### 2. Who invented the Internet?

#### Short Answer:

The Internet came from **ARPANET**, created by **DARPA** (Defense Advanced Research Projects Agency), USA, in **1969**.

### Full Explanation:

- The first network was **ARPANET**.
- It connected four universities: UCLA, Stanford, UC Santa Barbara, University of Utah.
- Scientists like **Vint Cerf** and **Bob Kahn** invented the TCP/IP protocol, known as the **"fathers of the Internet."**

### ✓ 3. What is the difference between Internet and World Wide Web (WWW)?

Internet	World Wide Web
Physical network of computers, cables, routers	Collection of websites and web pages
Uses TCP/IP	Uses HTTP/HTTPS
Infrastructure	Service built on the Internet
Example: sending email, FTP, VoIP	Opening google.com

### Conclusion:

WWW is **one service** that runs **on top of the Internet**.

### ✓ 4. What is a Protocol?

A **protocol** is a set of rules that define how data is sent and received over a network.

### Examples:

- **HTTP/HTTPS** → For web pages
- **FTP** → For file transfer
- **SMTP** → Email sending
- **TCP/IP** → Basic communication

Protocols ensure communication between devices even if they are built by different manufacturers.

## ✓ 5. Explain TCP/IP.

**TCP/IP = Transmission Control Protocol / Internet Protocol**

It is the **fundamental communication protocol** of the Internet.

**TCP does:**

- Breaks data into packets
- Ensures error-free transmission
- Reassembles packets on the receiver side

**IP does:**

- Assigns IP addresses
- Routes packets from sender to receiver
- Chooses best path

**Layers of TCP/IP model:**

1. Application Layer
  2. Transport Layer
  3. Internet Layer
  4. Network Access Layer
- 

## ✓ 6. What is an IP Address?

An **IP Address** (Internet Protocol Address) is a **unique identifier** assigned to every device connected to the Internet.

**Example:**

- IPv4 → 192.168.1.1
- IPv6 → 2001:db8::ff00:42:8329

**Types:**

- Public
  - Private
  - Static
  - Dynamic
- 

## ✓ 7. What is DNS?

## DNS = Domain Name System

It converts human-readable names into IP addresses.

### Example:

When you type **google.com**, DNS → **142.250.182.110**

### Why needed:

Humans remember names

Computers understand only numbers.

### Hierarchy:

- Root server
  - TLD server (.com, .in, .org)
  - Authoritative DNS
- 

## ✅ 8. What is a Router?

A **router** is a networking device that forwards data packets between networks.

### Functions:

- Connects local network with the Internet
- Assigns IP addresses
- Provides routing
- Ensures communication between devices

### Home Wi-Fi router =

Modem + Router + Switch (built-in)

---

## ✅ 9. What is an ISP?

ISP = Internet Service Provider

A company that provides Internet access.

### Examples:

- Jio
- Airtel

- BSNL
- Vodafone

### Services provided by ISP:

- Internet connection
  - Email services
  - Web hosting
  - Domain registration
  - FTP services
- 

### ✓ 10. What is Bandwidth?

**Bandwidth = Maximum data transfer capacity of a network per second.**

Measured in:

- Mbps
- Gbps

**Higher bandwidth = Faster downloads & uploads.**

---

### ✓ 11. What is Latency?

**Latency = Time delay between sending and receiving data.**

**Low latency = Good for:**

- Gaming
- Video calls
- Real-time communication

**High latency causes:**

- Lag
  - Buffering
- 

### ✓ 12. What is IPv4 and IPv6?

**IPv4:**

- 32-bit

- 4 billion addresses
- Example: 192.168.0.1

**IPv6:**

- 128-bit
- Trillions of addresses
- Example: 2001:db8::1

**Difference:**

IPv4	IPv6
32-bit	128-bit
Limited addresses	Huge address space
Human readable	Complex
Uses NAT	No need for NAT

 **13. What is a Firewall?**

A **Firewall** is a security system that monitors and filters incoming and outgoing network traffic.

**Purpose:**

Protects network from:

- Viruses
- Hackers
- Unauthorized access

**Types:**

- Hardware firewall
- Software firewall
- Cloud firewall

 **14. What is a Server?**

A **server** is a computer that provides services or data to other computers (clients).

## Examples:

- Web server (serves websites)
- Database server
- File server
- Application server

## Client-Server Model:

Client → Request

Server → Response

---

## ✓ 15. How does the Internet work? (Detailed Explanation)

### Step-by-step process:

- 1 You type **google.com** in browser.
  - 2 Browser sends request to **DNS** to get IP address.
  - 3 DNS returns Google's IP address.
  - 4 Browser sends a **TCP/IP request** to Google's server.
  - 5 Packets travel through:
    - Routers
    - Switches
    - Fiber cables
    - Undersea cables
  - 6 Google's server processes the request.
  - 7 Sends back the webpage as packets.
  - 8 Your browser reassembles packets → Displays website.
- 



## Want More?

I can also create:

- ✓ 100 Internet Interview Questions (with Answers)
- ✓ Diagrams (How the Internet Works)
- ✓ PDF Format Notes
- ✓ MCQs for practice

Just tell me: "Make PDF", "Give more questions", or "Explain with diagram".

