

IT Fundamentals Guided Notes (ANSWER KEY)

Lesson 2.7.2 - Basic Network Concepts

1. What is a MAC address?

A media access control address is a unique identifier for network interfaces

2. What is an IP address?

An Internet Protocol address is a numerical label assigned to each device connected to a computer network that uses the Internet Protocol for communication

3. Which address is volatile and which address is permanent? Why?

A MAC address is permanent because it is linked to the physical hardware of the machine. An IP address is volatile, your ISP could change their network infrastructure, or you could connect at a different location, generated a different IP address

4. Which protocols are responsible for receiving email? Which protocol is responsible for sending email?

POP3 and IMAP receive email, SMTP sends email

5. What are the differences between HTTP and HTTPS?

Hypertext Transfer Protocol is used for network file transfers on the world wide web environment and uses port 80. HTTP over Secure Sockets Layer is a secure form of HTTP and uses port 443

6. How are host names resolved into an IP address?

Domain Name Service/Server (DNS) is a TCP/IP name resolution system that translates a host name into an IP address