Department of Intelligent Mechatronics Engineering Sejong University

Computer Networks

Course # 003284 Ouiz # 2

Credit Hours:03Semester:2025-1Quiz Date:June 4, 2025Total Marks:10

Course Instructor: Prof. Amad Zafar Quiz Time: 15 Minutes

- 1) The TTL field of the IP datagram has a value of 10. How many routers (max) can process this datagram?
 - a) 11
 - b) 5
 - **©**10
 - d) 1
- 2) What is the header size of the IP datagram with TCP as an upper-layer protocol?
 - (a) 40 bytes
 - b) 20 bytes
 - c) 28 bytes
 - d) Both a) & b)
- 3) Longest prefix match performed using
 - a) TCAMs
 - b) RAM
 - c) ROM
 - d) None of the above
- 4) In classful addressing, the address space of IPv4 is divided in
 - (a) 5 Classes
 - b) 3 Classes
 - c) 4 Classes
 - d) 2 Classes
- 5) The port number of the DHCP server is.
 - a) 68
 - **b)** 67
 - c) 57
 - d) None of the above
- 6) A Network Address Translator (NAT gateway) changes the following fields of a packet going from the internal (local area) network to the external (wide area) network
 - a) Source IP address
 - (b) Source IP address and port number
 - c) Destination IP address
 - d) Destination IP address and port number

- 7) OSPF routing uses
 - a Dijkstra algorithm
 - b) Distance vector protocol
 - c) BGP
 - d) None of the above
- 8) In inter-AS routing, which protocol is used to propagate reachability information to all AS-internal routers.
 - a) eBGP
 - (b) iBGP
 - c) NAT
 - d) SDN
- 9) Which protocol do SDN switches use for communication with the SDN controller?
 - a) OSPF
 - b) BGP
 - © OpenFlow
 - d) IP
- 10) In classful addressing, the IP address like 190.159.5.20 has a network ID portion of:
 - a) 8 bits long
 - b)16 bits long
 - c) 24 bits long
 - d) None of the above