


National University of Computer and Emerging Sciences, Lahore Campus

	Course Name:	Computer Networks	Course Code:	CS 3001
	Program:	BS (Software Engineering)	Semester:	Spring 2024
	Duration:	15 minutes	Total Marks:	15
	Paper Date:	25-Apr-2024	Section	BSE-6A
	Exam Type:	Quiz 5 - Chapter 5	Page(s):	2

Student Name

Roll No.

Section:

Q1. Encircle the correct option:

[5 marks] [CLO 3]

1. In BGP, what is the purpose of the AS Path attribute?
 - a) Specifies the length of the Autonomous System
 - b) Lists the Autonomous Systems through which the route has passed
 - c) Defines the administrative distance of the route
 - d) Determines the cost of the route

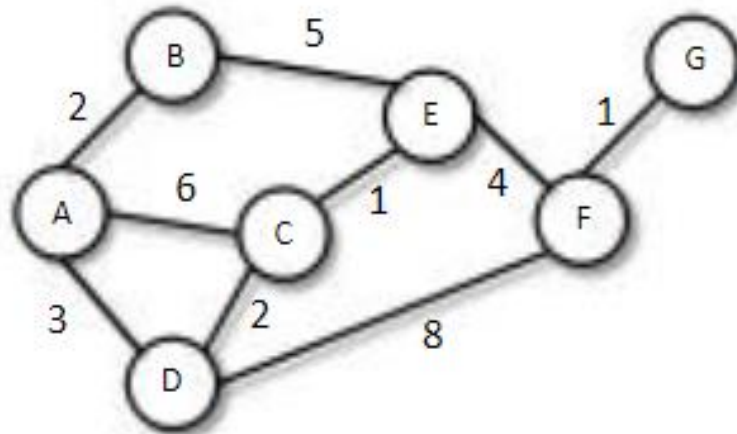
2. In distance vector routing algorithm, the routing tables are updated
 - a) by exchanging information with the neighbours
 - b) automatically
 - c) using the backup database
 - d) by the server

3. How do the routers exchange external routing information between ASs?
 - a) Inject the routes into IGP
 - b) Through IBGP
 - c) Through EBGp
 - d) Advertise local routing information to other AS through static route

True/False:

4. IGP protocols, like Bellman Ford, use Dijkstra's algorithm to calculate the shortest path to a destination. [T / F]
5. It is necessary that every autonomous system use the same intra-AS routing algorithm. [T / F]

Question 2: Consider the network given below. The numbers indicate the link costs. For the indicated link costs, use Dijkstra's algorithm to find the shortest paths from node **A** to all other nodes. **[10 Marks] [CLO 3]**



Step	N'	D(B),P(B)	D(C),P(C)	D(D),P(D)	D(E),P(E)	D(F),P(F)	D(G),P(G)