

All the Multiple Choice Question and Answer (MCQs) have been compiled from the books of Data Communication and Networking by the well known author **behrouz A forouzan**.

This Data Communication and Networking – **Virtual-Circuit Networks: Frame Relay and ATM** multiple choice Questions and Answers (MCQ) PDF covers the below lists of topics.

1. Virtual circuit switching Multiple Choice Question and Answer.
2. Frame Relay Multiple Choice Question and Answer.
3. Asynchronous Transfer Mode (ATM) Multiple Choice Question and Answer.
4. User-to-network interface (UNI) Multiple Choice Question and Answer.
5. Network-to-network interface (NNI) Multiple Choice Question and Answer.

Practice now to sharpen your concept.

1. _____ is a virtual-circuit wide-area network that was designed in response to demands for a new type of WAN in the late 1980s and early 1990s.

- A. X.25
- B. Frame Relay
- C. ATM
- D. none of the above

2. Frame Relay provides _____

- A. PVCs
- B. SVCs
- C. either (a) or (b)
- D. neither (a) nor (b)

- 3. VCIs in Frame Relay are called _____.**
- A. PVC
 - B. SVC
 - C. DLCIs
 - D. none of the above
- 4. In Frame Relay, when a _____ is selected, the corresponding table entry is recorded for all switches by the administrator**
- A. PVC
 - B. SVC
 - C. either (a) or (b)
 - D. neither (a) nor (b)
- 5. In Frame Relay, when. _____ is selected, it requires establishing and terminating phases**
- A. PVC
 - B. an SVC
 - C. either (a) or (b)
 - D. neither (a) nor (b)
- 6. Frame Relay has _____**
- A. only the physical layer
 - B. only the data link
 - C. the physical and data link layers
 - D. the physical, data link, and network layers
- 7. At the data link layer, Frame Relay uses a protocol that supports _____ control**

- A. flow
- B. error
- C. either (a) or (b)
- D. neither (a) nor (b)

8. In Frame Relay, an address can be _____ bytes

- A. only 2
- B. 2 to 3
- C. 2 to 4
- D. none of the above

9. In Frame Relay, the EA field defines the number of bytes; it is _____ in the last byte of the address

- A. 0
- B. 1
- C. 2
- D. 3

10. To handle frames arriving from other protocols, Frame Relay uses a device called a _____

- A. VOFR
- B. FRAD
- C. MUX
- D. none of the above

Answer key for MCQ SET- 1	
Q-1	Correct Answer :Frame Relay
Q-2	Correct Answer :either (a) or (b)
Q-3	Correct Answer :DLCIs
Q-4	Correct Answer :PVC

Q-5	Correct Answer :an SVC
Q-6	Correct Answer :the physical and data link layers
Q-7	Correct Answer :neither (a) nor (b)
Q-8	Correct Answer :2 to 4
Q-9	Correct Answer :1
Q-10	Correct Answer :FRAD

Virtual-Circuit Networks: Frame Relay and ATM MCQ Set-2

- 1. Frame Relay networks offer an option called _____ that sends voice through the network.**
- A. VOFR
 - B. FRAD
 - C. MUX
 - D. none of the above
- 2. _____ is the cell relay protocol designed by the corresponding Forum and adopted by the ITU-T**
- A. X.25
 - B. Frame Relay
 - C. ATM
 - D. none of the above
- 3. A _____ is defined as a small, fixed-size block of information**
- A. frame
 - B. packet
 - C. cell
 - D. none of the above

- 4. In ATM, a virtual connection is defined by _____**
- A. VPI
 - B. VCI
 - C. DLCI
 - D. a combination of (a) and (b)
- 5. The ATM standard defines _____ layers**
- A. two
 - B. three
 - C. four
 - D. five
- 6. The VPI of a UNI is _____ bits in length**
- A. 8
 - B. 12
 - C. 16
 - D. 24
- 7. The VPI of an NNI is _____ bits in length**
- A. 8
 - B. 12
 - C. 16
 - D. 24
- 8. The ATM data packet is a cell composed of _____ bytes**
- A. 40
 - B. 50
 - C. 52

D.53

9. _____ eliminates the varying delay times associated with different-size packets

- A. X.25
- B. Frame Relay
- C. ATM
- D. all of the above

10. A(n) _____ is the interface between a user and an ATM switch.

- A. UNI
- B. NNI
- C. NNN
- D. None of the above

Answer key for MCQ SET- 2	
Q-1	Correct Answer :VOFR
Q-2	Correct Answer :ATM
Q-3	Correct Answer :cell
Q-4	Correct Answer :a combination of (a) and (b)
Q-5	Correct Answer :three
Q-6	Correct Answer :8
Q-7	Correct Answer :12
Q-8	Correct Answer :53
Q-9	Correct Answer :ATM
Q-10	Correct Answer :UNI

Virtual-Circuit Networks: Frame Relay and ATM MCQ Set-3

- 1** _____ is the interface between two ATM switches.
- A. UNI
 - B. NNI
 - C. NNN
 - D. none of the above
- 2.** In ATM, connection between two endpoints is accomplished through _____
- A. TPs
 - B. VPs
 - C. VCs
 - D. all of the above
- 3.** In ATM, the _____ layer accepts transmissions from upper-layer services and maps them into ATM cells
- A. physical
 - B. ATM
 - C. AAL
 - D. none of the above
- 4.** In ATM, the _____ layer provides routing, traffic management, switching, and multiplexing services
- A. physical
 - B. ATM
 - C. AAL
 - D. none of the above
- 5.** In ATM, the _____ layer defines the transmission medium, bit transmission, encoding, and electrical-to-optical transformation

- A. physical
- B. ATM layer
- C. AAL
- D. none of the above

6. The AAL is divided into _____ sublayers

- A. two
- B. three
- C. four
- D. none of the above

7. In ATM, _____ is for constant-bit-rate data.

- A. AAL1
- B. AAL2
- C. AAL3/4
- D. AAL5

8. In ATM, _____ is for short packets

- A. AAL1
- B. AAL2
- C. AAL3/4
- D. AAL5

9. In ATM, _____ is for conventional packet switching (virtual-circuit approach or datagram approach).

- A. AAL1
- B. AAL2
- C. AAL3/4
- D. AAL5

10. In ATM, _____ is for packets requiring no sequencing and no error control mechanism.

- A. AAL1
- B. AAL2
- C. AAL3/4
- D. AAL5

Answer key for MCQ SET- 3	
Q-1	Correct Answer :NNI
Q-2	Correct Answer :all of the above
Q-3	Correct Answer :AAL
Q-4	Correct Answer :ATM
Q-5	Correct Answer :physical
Q-6	Correct Answer :two
Q-7	Correct Answer :AAL1
Q-8	Correct Answer :AAL2
Q-9	Correct Answer :AAL3/4
Q-10	Correct Answer :AAL5