Reg. No.

B.Tech. DEGREE EXAMINATION, MAY 2019

Seventh Semester

EC0401 – COMPUTER COMMUNICATION

(For the candidates admitted from the academic year 2007-2008 to 2012-2013)

Time: Three hours   Max. Marks: 100

Answer **ALL** Questions

PART – A (10 × 2 = 20 Marks)

1. What are the major components of a telephone network?
2. There are 4 sources, each creating 250 characters/sec. if the interleaved unit is a character and 1 synchronizing bit is added to each frame, find the data rate of each source and duration of each character in each source.
3. Specify the IEEE standards for the following
   Ethernet, token bus, token ring.
4. What is piggy backing in the ARQ schemes?
5. How are the classful addressing classified?
6. List out the differences between the static and dynamic routing tables.
7. What are the applications of user datagram protocol?
8. Draw the ATM layers.
9. Discuss in short about Multipurpose Internet Mail Extensions (MIME).
10. Write about what happens in JPEG process.

PART – B (5 × 16 = 80 Marks)

11. a. Lit out the various multiplexing schemes. Explain them in detail.

(OR)

b.i. Write about circuit switching. Describe the two techniques to implement circuit switching.   (10 Marks)

ii. Brief the different types of network topologies.   (6 Marks)

12. a. Explain in detail about the different layers of OSI model.

(OR)

b. Write in detail about the different station types, configurations and frame formats of HDLC protocol.

13. a. What is congestion in a network? Explain the different techniques for congestion control in a network.

(OR)

b. Describe the addressing methods in network layer.

14. a. Explain in detail about TCP.

(OR)

b.i. Write in detail about the different data compression techniques.

ii. Explain the bit level data encryption standard DES.

15. a. Describe in detail about ISDN.

(OR)

b. Explain about the ATM adaptation layers used for supporting constant bit rate and variable bit rate applications.

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