

B.TECH. DEGREE EXAMINATION, NOVEMBER 2010**Sixth Semester**

Branch : Computer Science and Engineering / IT

COMPUTER NETWORKS (R,T)

(Prior to 2007 admissions only)

[Supplementary]

Time : Three Hours

Maximum : 100 Marks

*Answer all questions.***Part A**

1. Compare ISO-OSI Reference Model with TCP/IP Reference Model.
2. What is meant by geostationary satellite ?
3. What are the design issues of Data link layer ?
4. What is CSMA with collision detection ?
5. Describe datagrams.
6. What is flooding ? What are the problem associated with flooding ?
7. Explain the elements of transport protocols.
8. Explain the difference between TCP and UDP.
9. Discuss the operation of DNS.
10. Write notes on Bluetooth.

(10 × 4 = 40 marks)

Part B

11. Draw the block diagram of ISO-OSI reference model and explain each block in it.

(12 marks)

Or

12. Explain different transmission media in physical layer.

(12 marks)

13. Describe in detail the link layer protocols and their structures.

(12 marks)

*Or***Turn over**

14. Derive and draw the throughput characteristics of various ALOHA Schemes. (12 marks)
15. Explain the following : —
- (i) Virtual circuits.
 - (ii) Distance vector routing.

(6 + 6 = 12 marks)

Or

16. (i) What is congestion ? List the reason behind congestion. (6 marks)
- (ii) Explain leaky bucket algorithm. (6 marks)
17. Explain the various layers of TCP/IP model and list the protocols used in each. (12 marks)

Or

18. Write notes on ATM network. (12 marks)
19. What is meant by domain name ? How is a domain name translated to an equivalent IP address ? Explain. (12 marks)

Or

20. Explain MIME protocol. (12 marks)

(5 × 12 = 60 marks)