Time: Three Hours

Reg.	No

Name.....

LIBRAR

## B.TECH. DEGREE EXAMINATION, MAY 2016

## Sixth Semester

Branch: Computer Science and Engineering/Information Technology
COMPUTER NETWORKS (RT)

(Old Scheme-Prior to 2010 Admissions)

[Supplementary/Mercy Chance]

Maximum: 100 Marks



Answer all questions.

Each question carries 4 marks.

- 1. What is a router? List the functions performed by a router.
- 2. When a satellite is said to be geostationary? Discuss.
- 3. How pure ALOHA protocol works? Discuss.
- 4. Explain the working of carrier sense multiple access protocol.
- 5. Compare virtual circuits and datagrams.
- 6. What is flooding? Discuss.
- 7. State the major functions performed by the transport layer.
- 8. How connection between two endpoints is accomplished in asynchronous transfer mode (ATM)?
- 9. What is a domain name system (DNS)? Discuss with an example.
- 10. Explain piconet and scatternet in bluetooth architecture.

 $(10 \times 4 = 40 \text{ marks})$ 

## Part B

Answer all questions.

Each question carries 12 marks.

11. Explain with diagrammatic illustration the ISO OSI reference model.

(12 marks)

Or

12. What is integrated services digital network (ISDN)? With a neat sketch discuss the architecture ISDN.

(12 marks)

Turn over

13. Explain with example error detection in the data link layer.

(12 marks)

Or

14. Discuss IEEE 802.3 LAN standard.

(12 marks)

15. Explain link state routing protocol with example and diagrammatic illustrations.

(12 marks)

Or

16. What is congestion control? Explain any two congestion control algorithms.

(12 marks)

17. List and discuss the transport service primitives.

(12 marks)

Or

18. Explain with diagrammatic illustrations connection establishment and connection release in transmission control protocol (TCP).

(12 marks)

19. Discuss how simple mail transfer protocol (SMTP) works? Can multimedia messages be transmitted using SMTP? Discuss.

(12 marks)

Or

20. How logical link control and adaptation protocol (L2CAP) works? Discuss.

(12 marks)

 $[5 \times 12 = 60 \text{ marks}]$ 

