



R20 Regulation *Subject code: 3P5EC*
TKR COLLEGE OF ENGINEERING AND TECHNOLOGY
(Autonomous, Accredited by NAAC with 'A' Grade)

B.Tech V Semester Supplementary Examinations, June/July 2023

COMPUTER NETWORKS
(Computer Science & Engineering)

Maximum Marks: 70

Date: 28.06.2023 Duration: 3 hours

- Note:
1. This question paper contains two parts A and B.
 2. Part A is compulsory which carries 20 marks. Answer all questions in Part A.
 3. Part B consists of 5 Units. Answer any one full question from each unit which carries 10M.
 4. Each question carries 10 marks and may have a, b, c, d as sub questions.

Part-A

All the following questions carry equal marks

(10x2M=20 Marks)

- 1 Distinguish the Narrow Band ISDN and Broad band ISDN.
- 2 Group the OSI Layers by its function.
- 3 Define Error Detection and Correction.
- 4 List out the types of CSMA Access modes.
- 5 Write a short note on Hierarchical Routing protocol.
- 6 Discuss the characteristic of Distance vector Routing protocol.
- 7 What are the two congestion control algorithm?
- 8 What are the function of ATM Adaption layer 5?
- 9 Define Application layer.
- 10 What is Generic Domains?

Part-B

Answer All the following questions.

(5X10M=50Marks)

- 11 A. Explain the topologies of the network. (5)
B. Explain the categories of network. (5)

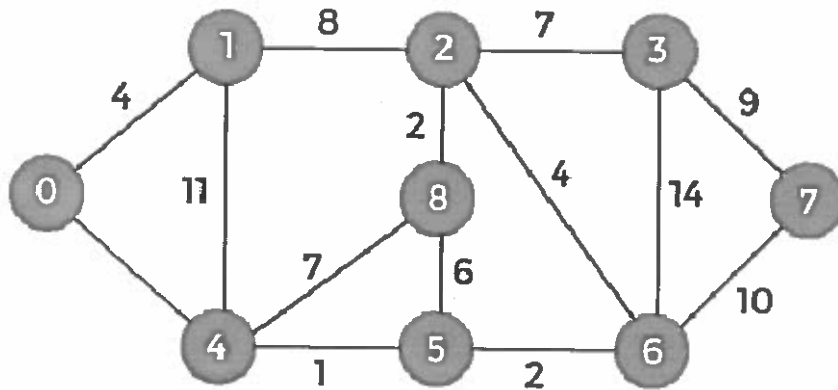
OR

- 12 Explain the ISO/OSI Reference Model with suitable diagram. (10)
- 13 Write a short note on the error detection and error correction techniques.
A. Cyclic redundancy check (2)
B. Hamming code (2)
C. Burst Error correction (2)
D. Checksum (2)
E. Single bit error correction (2)

OR

- 14 Describe IEEE 80.X Standard Ethernet Format. (10)

15



Find the shortest path algorithm from source Node 0 Using Dijkstra's algorithm.

OR

16 Define Routing and Explain Distance vector routing and Link state Routing algorithm. (10)

17 A. Explain Transmission Control protocol (5)

B. Explain User Datagram protocol (5)

OR

18 Explain in detail about congestion control policies. (10)

19 Explain in detail about Electronic mail. (10)

OR

20 A. Write a short note on File Transfer Protocol (5)

B. Discuss in detail about Domain naming system (5)