

B. Sc DEGREE END SEMESTER EXAMINATION - OCT. 2020 : JAN 2021
SEMESTER 3 : COMPUTER APPLICATION
COURSE : 19U3CRCAP5 : DATA COMMUNICATION AND COMPUTER NETWORKS
(For Regular - 2019 Admission)

Time : Three Hours

Max. Marks: 75

PART A
Answer All (1 mark each)

1. Define ISO/OSI.
2. Which protocol layer uses protocols like WWW, HTTP, FTP, SMTP, email etc.?
3. Define WDM.
4. List out the types of unguided transmission media.
5. Define noiseless channel.
6. Explain CSMA.
7. List out five generations of cellular networks.
8. Define DHCP.
9. Define name space.
10. List out the types of cryptography.

(1 x 10 = 10)

PART B
Answer any 8 (2 marks each)

11. Explain the functions of Application Layer of OSI model.
12. Which of the following is unreliable – Ethernet, IP, TCP, UDP? Explain why.
13. Explain distortion in transmission impairment.
14. Illustrate TDM.
15. Distinguish forward error correction and retransmission.
16. Define hamming distance.
17. Differentiate WLAN, WPAN and WMAN.
18. Explain ICMP.
19. Write about IP address.
20. Define public cloud.

(2 x 8 = 16)

PART C
Answer any 5 (5 marks each)

21. Illustrate bus topology with its merits and demerits.
22. Classify the transmission media. Give examples for each.
23. Distinguish the propagation methods of electromagnetic spectrum.
24. Explain linear block codes.
25. How parity check can be performed?.
26. Differentiate between unicast, multicast and broadcast.
27. Distinguish between authentication and authorization.

(5 x 5 = 25)

PART D

Answer any 2 (12 marks each)

28. Illustrate ISO/OSI model with functions of layers.
29. Explain the merits and demerits of guided transmission media.
30. Define framing. Explain its protocols.
31. Explain mobility management.

(12 x 2 = 24)