

APRIL 2024

51335/SZ24A/
SE25A/SU26A

Time : Three hours

Maximum : 75 marks

PART A — (10 × 2 = 20 marks)

Answer any TEN questions.

1. Define- "LAN".
2. What are the functions of physical layer?
3. What is magnetic media?
4. What do you mean by microwave transmission?
5. Mention the services provided to the network layer.
6. Define "Error Control".
7. Write down the protocol using Go-Back-N.
8. Show the data link layer in the internet.
9. Give the concept of store-and-forward packet switching.

PART C — (3 × 10 = 30 marks)

Answer any THREE questions.

20. Explain the OSI reference models with neat diagram
21. Discuss the implementation of error-detecting codes.
22. Illustrate the applications and architecture of Bluetooth.
23. What are the internet control protocols? Explain.
24. Outline the connection establishment of transport protocols.

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10. What is routing in Ad Hoc networks?

11. Write a note on cryptography.

12. What is the purpose of substitution ciphers?

PART B — (5 × 5 = 25 marks)

Answer any FIVE questions.

13. Summarize the theoretical basis for data communication.
14. Draw and explain the architecture of coaxial cable.
15. Describe the functions of geostationary satellites.
16. Elaborate the trunks and multiplexing in telephone system.
17. Write down the simplex stop-and-wait protocol for an error-free channel.
18. Explain the need of shortest path algorithm.
19. What are the primitives of transport service? Explain.

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