BHARATI VIDYAPEETH INSTITUTE OF TECHNOLOGY

QUESTION BANK

Unit Test-II

Program: - Computer Engineering Group Program Code: **IF**

Course Title: Wireless and Mobile Network Semester: - VI

Course Abbr. & Code: -WMN (316325) Scheme: K

==========

CHAPTER 3 Wireless application protocols and 3G mobile services (CO3) 12 Marks

2 Marks

1. Enlist features of VoLTE (CO3)
2. List two advantages of 3G technology. (CO3)
3. State quality of services in 3G network. (CO3)
4. State any two applications of 4G technology. (CO3)

4 Marks

5. Compare the features of 3G and 4G. (CO3)
6. Draw the architecture of 4G and explain. (CO3)
7. Compare WCDMA and CDMA 2000 on the basis of channel bandwidth, chip rate, duplex mode, modulation, frame length, power control rate. (CO3)
8. Draw the architecture of UMTS and explain. (CO3)

CHAPTER-4 Introduction to 5G Technology (CO4) 14 Marks

2 Marks

9.What is 5G. (CO4)
10.State two advantages of 5G. (CO4)
11.List main components of 5G technology. (CO4)
12.Define network slicing in 5G. (CO4)
13.List any two IMT 2020 standard specifications. (CO4)
14.Name two Indian telecom providers offering 5G services. (CO4)
15. List any two IMT 2020 standard features. (CO4)
16. List any two advantages of Network Slicing for IoT Ecosystem. (CO4)

Marks 4

17. Explain 5G network slicing architecture with suitable diagram. (CO4)
18. Discuss the challenges in 5G spectrum allocation and management in India (CO4)
19. Explain in brief the beamforming in 5G (CO4)
20.Explain the 5G network architecture with a simple diagram. (CO4)

CHAPTER-5 Wireless Network Technologies (CO5) 16 Marks

2 Marks

21.State two applications of MANET. (CO5)
22. State two applications of WSN. (CO5)
23. State any two features of MANET. (CO5)
24. State two limitations of delta modulation. (CO5)
25.State any two design challenges in MANET. (CO5)
26. List two characteristics of MANET. (CO5)

4 Marks

27.Encode the data stream 1011000101 using the following techniques RZ Bipolar, AMI. Manchester, NRZ -Unipolar (CO5)
28.Draw architecture of WSN and explain. (CO5)
29. Draw MANET topology and explain. State two applications of MANET. (CO5)
30.Draw a block diagram of a sensor node in WSN and state the function of various components. (CO5)
31.State different types of WSN architecture and explain any one type with diagram. (CO5)
32.Explain home agent and foreign agent in mobile IP. (CO5)
33.Explain Pulse Code Modulation. (CO5)
34.Explain Delta Modulation. (CO5)
35.Draw the waveform for data stream 10110010 for following digital modulation techniques ASK-Amplitude shift keying and BPSK-Binary phase shift keying. (CO5)
36.Eplain BASK, BPSK, BFSK. (CO5)