6th Sem / Branch : Electronics & Instrumentation
Sub. : Data Communication Networks

Time : 3Hrs.   M.M. : 100

SECTION-A

Note: Multiple choice questions. All questions are compulsory   (10x1=10)

Q.1   What does a set of rules define?
a)   SMTP   b)   FTP
c)   IMAP   d)   Protocol

Q.2   OSI stands for _____?
a)   Operating system interface
b)   Optical service implementation
c)   Open system interconnection
d)   Open service internet

Q.3   Identify the full form of HTTP?
a)   Hyper text transfer protocol
b)   Hyper text transfer package
c)   Hyper transfer text package
d)   Hyper transfer text practice

Q.4   _____ cable consists of two insulated copper wires twisted together?
a)   Coaxial   b)   Twisted-pair
c)   Fiber-optic   d)   None of the above

Q.5   What is the length of the Ipv4 address?

Q.30   What do mean subnetting? What are its various advantages?

Q.31   Differentiate between Client server and peer to peer networking.

Q.32   Distinguish between guided and unguided media.

Q.33   Explain the layer task of sender and receiver.

Q.34   Distinguish between FM & FSK modulation techniques.

Q.35   Explain third generation cellular telephony.

SECTION-D

Note: Long answer type questions. Attempt any two questions out of three questions.   (2x10=20)

Q.36   Explain OSI reference model with diagram in detail. Also give the functions of each layer.

Q.37   Distinguish between 1st, 2nd and 3rd generation.

Q.38   Explain the architecture of IEEE 802.11, and its addressing mechanism.

a) 8 bits   b) 16 bits
c) 32 bits   d) 128 bits

Q.6 Bluetooth transceiver devices operate in _____ band.
a) 2.45 Ghz ISM   b) 2.50 Ghz ISM
c) 2.60 Ghz ISM   d) 2.70 Ghz ISM

Q.7 What is the shape of the cell present in the cellular system?
a) Circular   b) Square
c) Hexagonal   d) Triangular

Q.8 Which of the following specifies a set of MAC and physical layer specifications for implementing WLANs?
a) IEEE 802.16   b) IEEE 802.11
c) IEEE 802.3   d) IEEE 802.15

Q.9 Which of the following are two method for generating FM signal?
a) Indirect method
b) Non coherent method
c) Zero-crossing method
d) Product detector

Q.10 In which modulation technique does the phase of the carrier signal is changes by varying sine and cosine inputs at a particular time.
a) frequency modulation
b) Phase shift keying modulation
c) Analog modulation
d) Amplitude shift keying

SECTION-B

Note: Objective type questions. All questions are compulsory.   (10x1=10)

Q.11 What is baud rate?
Q.12 What is hand-off?
Q.13 Define the term "Internet".
Q.14 What is the full form of ASK?
Q.15 What is full form of MAC?
Q.16 What is full duplex mode of communication?
Q.17 Name the lowermost layer of OSI model.
Q.18 Give full form of MODEM.
Q.19 What are radio waves?
Q.20 What is the full form of HTML.

SECTION-C

Note: Short answer type questions. Attempt any twelve questions out of fifteen questions.   (12x5=60)

Q.21 What is a computer network? Write its uses.
Q.22 Explain IPV4 packet formats.
Q.23 What are different classes of IP addressing?
Q.24 What are the Wi-Fi Technology Standards?
Q.25 Write short notes on Geo satellite.
Q.26 Explain uses of Bluetooth technology.
Q.27 Distinguish between active and passive hub.
Q.28 Classify network on the basis of geographical area.
Q.29 What is modem? Explain its types .