

Total No. of Questions : 8]

SEAT No. :

P3121

[Total No. of Pages : 2

[5670]-221

B.E. (E & TC)

WIRELESS NETWORKS (Elective - IV)

(2012 Pattern) (Semester - II)

Time : 2½ Hours]

[Max. Marks : 70

Instructions to the candidates :

- 1) Answer Q1 or Q2, Q3 or Q4, Q5 or Q6, Q7 or Q8.
- 2) Neat diagrams must be drawn wherever necessary.
- 3) Figures to the right indicate full marks.
- 4) Use of logarithmic tables slide rule, Mollier charts, electronic pocket calculator and steam tables is allowed.
- 5) Assume Suitable data if necessary.

Q1) a) Explain in short History and Growth of mobile communication. [7]

b) Explain with neat diagram concept of Hand off. Describe various types. [7]

c) Compare 3G technology with 4G technology. [6]

OR

Q2) a) Draw and explain the basic GSM network architecture. [7]

b) Differentiate between R3, R4 and R5 3GPP Network architectures. [7]

c) List advantages and disadvantages of Bluetooth technology. [6]

Q3) a) Draw and explain LTE architecture. [9]

b) Explain role of MIMO in LTE. [9]

OR

Q4) a) Write a short note on SONs. [9]

b) Write a short note on WiMAX spectrum. [9]

Q5) a) Write a short note on frequency planning in WiMAX networks and spectrum used in WiMAX Technology. [8]

b) Describe the evolution of WiMAX. Compare different variations of IEEE 802.16. [8]

P.T.O.

OR

- Q6)** a) List features of WiMAX. Explain QoS. [8]
b) Draw and Explain generic WiMAX architecture. [8]

- Q7)** a) What are the advantages of VoIP? [8]
b) Compare Distributed architecture and Media Gate Control. [8]

OR

- Q8)** a) Write a short note on : [8]
i) SS7
ii) VoIP challenges
b) Compare in detail the various protocols such as H.323, SIP, and MEGACO used for VoIP. [8]

