

TE/IT/V (REV) CTNC

28/5/2012

Con. 4415-12.

GN-8210

(3 Hours)

[Total Marks : 100

N.B. : (1) Question No. 1 is **compulsory**.

(2) Attempt any **four** questions from **remaining**.

(3) **Each** question carries **equal** maximum marks.

1. (a) Discuss the different types of stations defined by HDLC. How a communication channel in HDLC that is used by a station can be configured. **5**
- (b) Describe the characteristics of 3G system. **5**
- (c) Compare different multiplexing techniques. **5**
- (d) Compare SDMA, FDMA, TDMA and CDMA. **5**
2. (a) Explain classification of signalling techniques. **10**
- (b) Explain 3G UMTS network. **10**
3. (a) Explain traffic management in ATM. Also explain ATM traffic policing. **10**
- (b) Classify different switching architectures. Discuss one of them. **10**
4. (a) Describe in brief BPSK modulator and demodulator. Also calculate probability of error. **10**
- (b) Explain Hanoff Algorithm. **10**
5. (a) What are different types of traffic ? Explain leaky bucket algorithm in brief. **10**
- (b) Explain different traffic descriptors used in ATM. **10**
6. (a) Explain ISDN protocol stack in detail with neat sketches. **10**
- (b) What do you mean by ancyption ? Explain symmetric key and asymmetric key methods in detail. **10**
7. Write short notes on any two :— **20**
 - (a) TMN
 - (b) LLC Sublayer
 - (c) Spreading codes and Scrambling process.