

**DIPLOMA EXAMINATION IN ENGINEERING/TECHNOLOGY/
MANAGEMENT/COMMERCIAL PRACTICE, APRIL – 2020**

COMPUTER NETWORKS

[Maximum Marks: 75]

[Time: 2.15 Hours]

PART-A

(Answer *any three* questions in one or two sentences. Each question carries 2 marks)

- I. 1. If we want to connect two or more different networks, which addressing you will prefer?
2. Define DHCP.
3. Define Pushing.
4. Name the components of URL.
5. Define Proxy server. (3 x 2 = 6)

PART-B

(Answer any *four* of the following questions. Each question carries 6 marks)

- II 1. Explain any two LAN connecting devices.
2. Explain any two mechanisms that alleviate congestion after it happens.
3. List & explain any two TCP services.
4. Explain Dynamic DNS.
5. Explain IEEE standards for wired LAN.
6. Explain the Stop-and-Wait protocol.
7. Explain Hyper Text Transfer Protocol. (4 x 6 = 24)

PART-C

(Answer *any of the three units* from the following. Each full question carries 15 marks)

UNIT – I

- III (a) Explain TCP/IP protocol suite with a neat diagram. (9)
(b) Explain any two network topologies. (6)

OR

- IV (a) Explain the architecture of wireless LAN. (9)
(b) Briefly explain Virtual LAN. (6)

UNIT – II

V (a) Explain IP V4 datagram format. (9)

(b) Distinguish between unicasting and multicasting. (6)

OR

VI (a) Explain Distance Vector routing algorithm. (8)

(b) Explain class full addressing. (7)

UNIT- III

VII (a) With a neat diagram explain TCP segment format. (9)

(b) Explain the connection establishment in TCP. (6)

OR

VIII (a) Explain the User Datagram format. (8)

(b) Explain the Go-Back-N protocol with a neat diagram. (7)

UNIT - IV

IX (a) Explain the E-MAIL architecture. (9)

(b) Explain Simple Mail Transfer Protocol. (6)

OR

X (a) With a neat diagram explain the architecture of WWW. (9)

(b) Explain File Transfer Protocol. (6)
