## Parvatibai Chowgule College of Arts and Science Autonomous

B.Voc. Semester End Examination, January/February 2022

Semester: III

Subject: Software Development

Title: Skill Based Component - Computer Networks

Duration: 1 Hours Max. Marks: 25

**Instructions:** 1. All questions are compulsory

2. Figures to the right indicate full marks.

## Q.1. Answer ANY THEE of the following.

(3 \* 3 = 9)

A. Explain how routing algorithms are classified as Adaptive and non adaptive.

- B. Differentiate between persistent and non persistent CSMA
- C. Discuss IPV6 protocol in brief
- D. Discuss services offered by the data link layer to the network layer.

## Q.2. Answer ANY TWO of the following.

(4 \* 2 = 8)

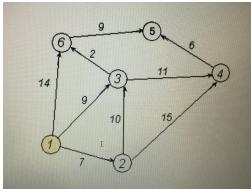
A. With respect to the protocols used at the Data Link Layer explain the following.

- 1. Stop and wait protocol
- 2. Sliding Window Protocol
- B. Explain the concept of Framing, laying emphasis on the methods used.
- C. Discuss any three address mapping protocols in detail.

## Q.3. Answer ANY TWO of the following.

(4 \* 2 = 8)

- A. With respect to the OSI model discuss
  - 1. Physical Layer
  - 2. Session Layer
- B. Discuss TCP Segment header in detail.
- C. Using Link State Routing Algorithm prepare routing tables for all the nodes in the following graph.



\*\*\*\*\*\*\*\*\*\*\*\*\*\*