

National Institute of Technology Calicut  
Department of Computer Science and Engineering  
Test # 1 Exam, Monsoon Semester August/September '2021  
CS4049D Advanced Computer Networks [E]

Time: 2 Hour

Maximum Marks:30

Name: \_\_\_\_\_ Roll No: \_\_\_\_\_

Answer All Questions

1. Draw and explain standard Ethernet 802.3 frame format and the MAC addressing. 4M
2. How does the MAC layer of wireless LANs support both the ordinary asynchronous bursty traffic and the time sensitive high priority traffic? 4M
3. What is the significance of preamble field in an Ethernet MAC frame? Analyze the advantage of having the FCS field in the trailer of the frame than in the header? 4M
4. Compare fast Ethernet to gigabit Ethernet? 3M
5. The OSI standard has how many layers, write them? 4M
6. Discuss a port based VLAN architecture highlighting its advantages. 4M
7. Which wireless protocol would you expect to provide a better foundation for a packet-based telephony service: 802.11 (Wi-Fi) or 802.16 (WiMAX)? Why? 3M
8. When a cell phone moves from an area served exclusively by a single base station to an area where the cells of several base stations overlap, how is it determined which base station will control the phone? 4M

\*\*\*All The Best\*\*\*