

**Roll No.**

Total No. of Pages : 02

**Total No. of Questions : 09**

**B.Tech. (CSE) (Sem.-7/8)**

## ADHOC AND WIRELESS SENSOR NETWORKS

**Subject Code : BTCS716-18**

**M.Code : 90507**

Date of Examination : 13-01-23

**Time : 3 Hrs.**

Max. Marks : 60

**INSTRUCTIONS TO CANDIDATES :**

1. SECTION-A is COMPULSORY consisting of TEN questions carrying TWO marks each.
2. SECTION-B contains FIVE questions carrying FIVE marks each and students have to attempt any FOUR questions.
3. SECTION-C contains THREE questions carrying TEN marks each and students have to attempt any TWO questions.

## SECTION-A

1. Write briefly :
- a) What are the functions performed by the node in WSN ?
  - b) Routing Protocol for Adhoc Wireless Network.
  - c) IEEE 802.15.4
  - d) What is a contention based protocol?
  - e) What is proactive routing?
  - f) How the table driven protocols work in adhoc network?
  - g) Why MAC protocol is used in wireless sensor network?
  - h) What is SPINS?
  - i) List five applications of WSN.
  - j) What do you mean by Wakeup concepts?

### SECTION-B

2. Outline the issues in designing a routing protocol for Adhoc networks.
3. Explain MAC protocols for wireless sensors Networks.
4. Differentiate DSDV and AODV.
5. What are the designs challenges in Ad hoc and sensor Networks?
6. Explain in briefly :
  - a) S-MAC
  - b) LEACH

### SECTION-C

7. What are the various challenges for wireless Sensor Networks, explain?
8. Explain the layer wise attack in wireless sensor network.
9. What is TCP? Discuss with example TCP over Ad hoc wireless network.