

FACULTY OF ENGINEERING

B. E. 4/4 (CSE) I-Semester (**New**) (**Main**) Examination,
November / December 2009

Subject : **Adhoc & Sensor Networks** (Elective – I)

Time : 3 Hours

Max. Marks: 75

Note: Answer all questions of Part-A and any **Five** questions from Part-B.

Part – A (25 Marks)

1. Define Mobile Adhoc Network. 3
2. Differentiate between proactive and on-demand routing protocols for MANETS. Give examples for both the types of protocols. 3
3. What is Multicasting? How is it different in MANETS in comparison to wired networks? 3
4. What are the approaches to improve transport layer performance in Adhoc Networks? 3
5. What are the reasons for designing QoS enabled MANETS. 2
6. List out feul important potential attacks in MANETS. 2
7. What is a sensor Network? List out feul important applications of W.S.Ns in the domain of Medical and scientific areas. 3
8. What are the resource constraints of sensor nodes. 2
9. Differentiate between wi-fi and Wimar technologies. 2
10. What are the strategies used to solve the problem of shared medium access in WSN. 3

Part – B (5 x 10 = 50 Marks)

- 11.a) Give an account on the applications of MANETS in different domains. 4+6
- b) Explain the working mechanism of AODV routing protocol. 4+6
- 12.a) Explain the classification of Malticas protocols in MANETS. 5+5
- b) With neat sketches, explain the various fields of join query and join reply packet formats of ODMRP. 5+5
- 13.a) Write a note on modified TCP. 4+6
- b) Discuss core extraction based distributed Adhoc routing protocol. 4+6
- 14.a) Write a note on Intrusion detection techniques in MANETS. 6+4
- b) What is wireless sensor network and wireless sensor system? 6+4

15. Give a brief account of available wireless technologies. 10
- 16.a) Discuss the issues involved in the design of MCA protocols in WSN.
- b) What is cross-layering ; discuss. 5+5
17. Write notes on any Two of the following : 5+5
- a) Dynamic Source Routing
 - b) QoS issues at MAC layer in MANETS
 - c) Sensor Node Technology
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