

Roll No.

24471

B. Tech. 7th Semester (CSE) Examination – June, 2016 DISTRIBUTED OPERATING SYSTEM

Paper: CSE-423-F

Time: Three Hours]

[Maximum Marks: 100

Before answering the questions, candidates should ensure that they have been supplied the correct and complete question paper. No complaint in this regard, will be entertained after examination.

Note: Attempt five questions. Q. 1 is compulsory. Select one question from each Section.

- 1. Write short notes on:
 - (a) True distributed system
 - (b) Clock synchronization
 - (c) Naming transparency
 - (d) Shared variable distributed shared memory
 - (e) Layered protocol

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P. T. O.

SECTION - A

- 2. (a) What do you mean by Distributed Operating System? Explain its design issue.
 - (b) Explain bus based multiprocessor and bus based multicomputer.
- **3.** (a) What is group communication? What are the various design issue for it.
 - (b) What is RPC? Explain different class of failure that can occur in RPC system and how to deal it.

SECTION - B

- **4.** (a) What is mutual exclusion? Compare various algorithm for mutual exclusion.
 - (b) Discuss the following election n algorithm:
 - (i) The Bully algorithm
 - (ii) Ring algorithm
- 5. What is deadlock? How it can be handled in Distributed system? Explain.

SECTION - C

- **6.** (a) What is real time distributed system? Also explain design issue in real time distributed system.
 - (b) What is thread? Describe the thread usage.

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7. How distributed file system implemented? Explain.

SECTION - D

- **8.** What is the need of consistency in distributed system? Explain various consistency model briefly.
- **9.** Describe the concept of process management in MACH.

(3)

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