

2214/A24

OCTOBER 2011

OPERATING SYSTEM

Time : Three hours

Maximum : 100 marks

PART A — (6 × 5 = 30 marks)

Answer any SIX questions.

1. Explain about early operating system in detail.
2. Write short notes on I/O protection.
3. Explain any one CPU scheduling algorithm in detail.
4. What are the necessary conditions to hold for a deadlock to occur?
5. Explain the concept of segmentation.
6. Explain FIFO page replacement algorithm.
7. Mention the differences between disks, drums and tapes.
8. Write short notes on Indexed sequential access methods.
9. What is INODES? Explain.
10. How bad disk sectors are handled in Windows Operating System?

PART B — (4 × 10 = 40 marks)

Answer any FOUR questions.

11. Explain abstract view of a computer system in detail.
12. Explain inter process communication in detail.
13. What is paging? How it is implemented?
14. Explain the following disk scheduling algorithms :
 - (a) SCAN
 - (b) FCFS
15. What are the type of disks? Explain.
16. Write short notes on pipelines, filters and shell scripts in UNIX.

PART C — (2 × 15 = 30 marks)

Answer any TWO questions.

17. Explain Readers/Writers problem in detail.
18. Explain any two CPU scheduling algorithms in detail.

19. Explain the following :

- (a) semaphore
- (b) signals
- (c) shell.