MAHATMA GANDHI UNIVERSITY
M.C.A DEGREE EXAMINATION
MODEL QUESTION PAPER
(2011 Revised Syllabi)
Second Semester
MCA 204 Operating Systems

Time: 3 hrs **Max: 75 Marks**

Part A

Answer any ten questions.
Each question carries 3 marks.

1. Explain about process state transition diagram.
2. Explain about system calls.
3. Explain critical section.
4. Discuss the necessary conditions of deadlock.
5. Explain about swapping.
6. Explain the terms first-fit, best fit, and worst fit.
7. Explain about overlays.
8. What is meant by virtual memory?
9. Explain about Thrashing.
10. Explain about disk structure.
11. Explain about file attributes.
12. Differentiate between sequential and direct file access methods.

(10 x 3 = 30 marks)

Part B

***All questions carry equal marks*.**

13. a. Explain the various scheduling algorithms.

OR

b. Explain about different types of operating system.

14. a. Discuss busy-wait implementation of semaphore

OR

b. Explain deadlock avoidance with Banker's algorithm.

15. a. Explain about paging.

OR

b. Explain about segmentation

16. a. Explain Demand Paging.

OR

b. Explain various Disk Scheduling algorithms.

17. a. Explain all file allocation methods

OR

b. Discuss file system implementation.

(5 X 9 = 45 marks)