## 2007 JAWAHARLAL NEHRU UNIVERSITY [JNU] B.TECH ELECTRONIC & COMMUNICATION ENGINEERING

OPERATING SYSTEM

**JUNE 2007** 

TIME: 3 HOUR MARK: 80

## ANSWER ANY FIVE QUESTIONS ALL QUESTIONS CARRY EQUAL MARKS

- 1. With the help of neat block diagram, describe the computer components with an example.
- 2. (a) Explain the reasons for process terminations.
- (b) Describe the single blocked queue and multiple blocked queues with an exam
- 3. Explain the various mechanisms provided by UNIX for inter process communication and synchronization in detail.
- 4. How the deadlocks can be avoided? Explain with the help of necessary algorithms.
- 5. (a) Enumerate the reasons for allowing two or more processes to, all have access to particular region of memory.
- (b) In a fixed partitioning scheme, what are the advantages of using unequal size partitions?
- (c) What is the difference between internal and external fragmentation?
- (d) What are the distinctions among logical, relative and physical addresses?
- 6. (a) Discuss about various criteria used for short-term scheduling. (b) Discuss about fair share scheduling method.
- 7. (a) What do you understand by a ?le directory?
- (b) Explain brie?y the information elements of a ?le directory
- . (c) Explain what is tree-structured directory?
- 8. Write notes on:
- (a) intrusion detection
- (b) password protection.