

GLS UNIVERSITY
FCAIT
BCA SEM - III
Subject : Fundamentals Of Operating system
Subject Code : 0301304

Q. 1 Fill In the Blanks

1. A software layer between user and computer hardware is called _____
2. RTOS stands for _____
3. _____ OS is largely useful in defence applications.
4. Symbian OS is used in _____.
5. The concept of single program in a memory is called _____.
6. Number of jobs completed per unit time is called _____.
7. Number of programs in main memory is called _____.
8. The time between submission of a job to the system and its first reaction/response to the user is called _____
9. Network operating system is considered as _____ operating system.
10. In multi processing system one OS control all CPU and all CPU have equal rights. This system is called _____.
11. When a user wants to remotely log on to a system, wants to transfer a file etc, on a network system, _____ OS is chosen.
12. CORBA stands for _____.
13. _____ OS should be chosen which is applicable to systems that require time bound response.
14. DCOM stands for _____
15. RPC stands for _____.

Q. 2 True or False

1. RPC is a standardized language that supports different programming languages and different operating systems for distributed communication.
2. Transferring the data from one site to another site is called data migration.
3. Each node in a distributed system is a complete computer having full set of peripherals including operating system.
4. Computer system can work without operating system
5. In batch operating system, user intervention is not possible.
6. Multi programming means to place several programs or jobs in the main memory.
7. Through put will decrease if degree of multiprogramming is increase.
8. In multiuser time sharing system more than one user works on more than one CPU.
9. Better response time improves the productivity.
10. A single user works on multiple computers is called multi tasking.
11. Multiprocessing systems contain more than one processor and share other resources.

12. The system in which the response to a user request has to be immediate or within a fixed time frame is called real time operating system.
13. Video conferencing is an example of hard realtime operating system.
14. Embedded systems are specialized systems that tend to have very specific tasks.
15. Resource management is user point of view of operating system.

Q.3 Give answers of following questions.

1. Explain need of operating system.
2. Explain different functions of operating system from user and system view.
3. What is operating system ? Why we need different types of operating system ? List out types of operating system.
4. Explain batch processing system.
5. What is Multi Programming Operating System?
6. Give the difference between Distributed and Multi-Processing Operating System
7. What is Multi-Tasking Operating System?
8. Write a short note on Real Time OS and Embedded OS.
9. Explain Multi-User Time Sharing Operating System.
10. Write a Short note on Network Operating System.
11. What are the challenges for designing OS for mobile devices.
12. What are the differences between multiprocessing and multiprogramming?
13. What are the challenges of designing a Multiprocessing/ Distributed Operating System?
14. What are the differences between Real Time System and Timesharing System?
15. What is virtual machine? How does operating system function as a virtual machine manager?

Note: Q1 , Q2 are compulsory for all. You have to attempt Q-3 in following sequence -

| Roll No | Question Numbers from both section |
|---|------------------------------------|
| A1 to A10, B1 to B10 & C1 to C10 | 1,15,3,4 |
| A11 to A20, B11 to B20 & C11 to C20 | 2,15,7,5 |
| A21 to A30, B21 to B30 & C21 to C30 | 3,14,8,6 |
| A31 to A40, B31 to B40 & C31 to C40 | 4,13,9,7 |
| A41 to A50, B41 to B50 & C41 to C50 | 5,12,10,8 |
| A51 to A60, B51 to B60 & C51 to C60 | 6,11,1,9 |
| A61 to A70, B61 to B70 & C61 to C70 | 7,10,2,1 |
| A71 to A80, B71 to B80 & C71 to C80 | 8,9,3,5 |
| A81 to A90, B81 to B90 & C81 to C90 | 1,10,15,4 |
| A91 Onwards , B91 Onwards & C91 Onwards | 2,11,13,6 |