Set 1

1. Which of the following is/ are the part of operating system?

A) Kernel services

B) Library services

C) Application level services

D) All of the above

2. The system of ..... generally ran one job at a time. These were called single stream batch processing.

A) 40's

B) 50's

C) 60's

D) 70's

3. In ..... generation of operating system, operating system designers develop the concept of multi-programming in which several jobs are in main memory at once.

A) First

B) Second

C) Third

D) Fourth

4. State True or False.

i) In spooling high speed device like a disk is interposed between running program and low-speed device in Input/output.

ii) By using spooling for example instead of writing directly to a printer, outputs are written to the disk.

A) i-True, ii-False

B) i-True, ii-True

C) i-False, ii-True

D) i-False, ii-False

5. Which of the following is/are the functions of operating system?

i) Sharing hardware among users. ii) Allowing users to share data among themselves.

iii) Recovering from errors. iv) Preventing users from interfering with one another.

v) Scheduling resources among users.

A) i, ii, iii and iv only

B) ii, iii, iv and v only

C) i, iii, iv and v only

D) All i, ii, iii, iv and v

6. ..... executes must frequently and makes the fine grained decision of which process to execute the next.

A) Long-term scheduling

B) Medium-term scheduling

C) Short-term scheduling

D) None of the above

7. With ..... a page is brought into main memory only when the reference is made to a location on that page.

A) demand paging

B) main paging

C) prepaging

D) postpaging

8. ..... provides a larger sized of virtual memory but require virtual memory which provides multidimensional memory.

A) Paging method

B) Segmentation method

C) Paging and segmentation method

D) None of these

9. ..... is a large kernel containing virtually the complete operating system, including, scheduling, file system, device drivers and memory management.

A) Multilithic kernel

B) Monolithic kernel

C) Micro kernel

D) Macro kernel

10. ..... is a large operating system core provides a wide range of services.

A) Multilithic kernel

B) Monolithic kernel

C) Micro kernel

D) Macro kernel

Answers:

1. D) All of the above	**6. C) Short-term scheduling**
2. B) 50's	**7. A) demand paging**
3. C) Third	**8. B) Segmentation method**
4. B) i-True, ii-True	**9. B) Monolithic kernel**
5. D) All i, ii, iii, iv and v	**10. D) Macro kernel**

SET 2

1. The first batch operating system was developed in the ..... by General Motors for use on an IBM 701.

A) mid 1940's

B) mid 1950's

C) mid 1960's

D) mid 1970's

2. Process is .....

A) A program in execution

B) An instance of a program running on a computer.

C) The entity that can be assigned to and executed

D) All of the above.

3. ..... is a facility that allows programmers to address memory from a logical point of view, without regard to the main memory, physically available.

A) Visual memory

B) Real memory

C) Virtual memory

D) Secondary memory

4. ..... is a large kernel, including scheduling file system, networking, devicedrivers, memory management and more.

A) Monolithic kernel

B) Micro kernel

C) Macro kernel

D) Mini kernel

5. A ..... architecture assigns only a few essential functions to the kernel, including address spaces, Inter process communication(IPC) and basic scheduling.

A) Monolithic kernel

B) Micro kernel

C) Macro kernel

D) Mini kernel

6. State whether true or false.

i) Multithreading is useful for application that perform a number of essentially independent tasks that do not be serialized.

ii) An example of multithreading is a database server that listens for and process numerous client request.

A) i-True, ii-False

B) i-True, ii-True

C) i-False, ii-True

D) i-False, ii-False

7. With ..... only one process can execute at a time; meanwhile all other process are waiting for the processer. With ..... more than one process can be running simultaneously each on a different processer.

A) Multiprocessing, Multiprogramming

B) Multiprogramming, Uniprocessing

C) Multiprogramming, Multiprocessing

D) Uniprogramming, Multiprocessing

8. The two central themes of modern operating system are .....

A) Multiprogramming and Distributed processing

B) Multiprogramming and Central Processing

C) Single Programming and Distributed processing

D) None of above

9. ..... refers to the ability of multiple process (or threads) to share code, resources or data in such a way that only one process has access to shared object at a time.

A) Synchronization

B) Mutual Exclusion

C) Dead lock

D) Starvation

10. ..... is the ability of multiple process to co-ordinate their activities by exchange of information

A) Synchronization

B) Mutual Exclusion

C) Dead lock

D) Starvation

Answers:

1. B) mid 1950's	**6. B) i-True, ii-True**
2. D) All of the above.	**7. C) Multi.....Multiprocessing**
3. C) Virtual memory	**8. A) Multiprogra .....processing**
4. A) Monolithic kernel	**9. B) Mutual Exclusion**
5. B) Micro kernel	**10. A) Synchronization**

SET 3

1. Which of the following is not the function of Micro kernel?

A) File management

B) Low-level memory management

C) Inter-process communication

D) I/O interrupts management

2. Match the following.

i) Mutual exclusion a) A process may hold allocated resources while waiting assignment.

ii) Hold and wait b) No resource can be forcibly removed from a process holding it.

iii) No preemption c) Only one process may use a resource at a time.

A) i-a, ii-b, iii-c

B) i-a, ii-c, iii-b

C) i-b, ii-c, iii-a

D) i-c, ii-a, iii-b

3. A direct method of deadlock prevention is to prevent the occurrences of .....

A) Mutual exclusion

B) Hold and wait

C) Circular waits

D) No preemption

4. The methods or algorithms which are used to increase the performance of disk storage sub-system is called .....

A) Disk performing

B) Disk scheduling

C) Disk storing

D) Disk extending

5. ..... is the time required to move the disk arm to the required track.

A) Seek time

B) Rotational delay

C) Latency time

D) Access time

6. The ..... policy restricts scanning to one direction only.

A) SCAN

B) C-SCAN

C) N-Step SCAN

D) Both A and B

7. ..... policy selects the disk I/O request that requires the least movement of the disk arm from its current position.

A) FSCAN

B) SSTF

C) SCAN

D) C-SCAN

8. ..... refers to the ability of an operating system to support multiple threads of execution with a single process.

A) Multithreading

B) Multiprocessing

C) Multiexecuting

D) Bi-threading

9. State whether the following statement is true.

i) It takes less time to terminate a thread than a process.

ii) Threads enhance efficiency in communication between different executing programs.

A) i-True, ii-False

B) i-True, ii-True

C) i-False, ii-True

D) i-False, ii-False

10. ..... is a special type of programming language used to provide instructions to the monitor simple batch processing schema.

A) Job control language (JCL)

B) Processing control language (PCL)

C) Batch control language (BCL)

D) Monitor control language (MCL)

Answers:

1. A) File management	**6. B) C-SCAN**
2. D) i-c, ii-a, iii-b	**7. B) SSTF**
3. C) Circular waits	**8. A) Multithreading**
4. B) Disk scheduling	**9. B) i-True, ii-True**
5. A) Seek time	**10. A) Job control language (JCL)**

SET 4

1. ..... refers to a situation in which a process is ready to execute but is continuously denied access to a processor in deference to other processes.

A) Synchronization

B) Mutual Exclusion

C) Dead lock

D) Starvation

2. Which of the following is not the approach to dealing with deadlock?

A) Prevention

B) Avoidance

C) Detection

D) Deletion

3. Which of the following are the states of a five state process model?

i) Running ii) Ready iii) New iv) Exit v) Destroy

A) i, ii, iii and v only

B) i, ii, iv and v only

C) i, ii, iii, and iv only

D) All i, ii, iii, iv and v

4. State which statement is true for Suspended process?

i) The process is not immediately available for execution.

ii) The process may be removed from suspended state automatically without removal order.

A) i only

B) ii only

C) i and ii only

D) None

5. Following is/are the reasons for process suspension.

A) Swapping parent process

B) Inter request

C) Timing

D) All of the above

6. The different types of tables maintained by the operating system are .....

A) memory, logical , I/O file

B) memory, I/O, file, physical

C) memory, I/O, file, process

D) memory, logical, I/O, physical

7. Which of the following information not included in memory table?

A) The allocation of main memory to process.

B) The allocation of secondary memory to process

C) Any information needed to manage virtual memory

D) Any information about the existence of file

8. Process Management function of an operating system kernel includes.

A) Process creation and termination.

B) Process scheduling and dispatching

C) Process switching

D) All of the above

9. The typical elements of process image are .....

i) User data ii) System Data iii) User program iv) System stack

A) i, iii and iv only

B) i, ii, and iv only

C) ii, iii, and iv only

D) All i, ii, iii, and iv

10. Match the following mechanisms for interrupting the execution of a process and their uses.

i) Interrupt	a) Call to an operating system function
ii) Trap	b) Reaction to an asynchronous external event
iii) Supervisor Call	c) Handling of a error or an exception condition

A) i-a, ii-b, iii-c

B) i-c, ii-a, iii-b

C) i-b, ii-c, iii-a

D) i-a, ii-c, iii-b

Answers:

1. D) Starvation	**6. C) memory, I/O, file, process**
2. D) Deletion	**7. D) Any information..... of file**
3. C) i, ii, iii, and iv only	**8. D) All of the above**
4. A) i only	**9. A) i, iii and iv only**
5. D) All of the above	**10. C) i-b, ii-c, iii-a**

SET 5

. The unit of dispatching is usually referred to as a ……..

A) Thread

B) Lightweight process

C) Process

D) Both A and B

2. …….. is a example of an operating system that support single user process and single thread.

A) UNIX

B) MS-DOS

C) OS/2

D) Windows 2000

3. State true or false.

i) Unix, support multiple user process but only support one thread per process.

ii) A java run time environment is an example of a system of one process with multiple threads.

A) True, False

B) True, True

C) False, True

D) False, False

4. …… are very effective because a mode switch is not required to switch from one thread to another.

A) Kernel-level threads

B) User-level threads

C) Alterable threads

D) Application level threads

5. …… is a condition in which there is a set of concurrent processes, only one of which is able to access a given resource or perform a given function at any time.

A) Mutual Exclusion

B) Busy Waiting

C) Deadlock

D) Starvation

6. ……. Techniques can be used to resolve conflicts, such as competition for resources, and to synchronize processes so that they can cooperate.

A) Mutual Exclusion

B) Busy Waiting

C) Deadlock

D) Starvation

7. ……. Can be defined as the permanent blocking of a set of processed that either complete for system resources or communicate with each other.

A) Deadlock

B) Permanent lock

C) Starvation

D) Mutual exclusion

8. The following conditions of policy must be present for a deadlock to be possible.

i) Mutual exclusion ii) Hold and wait

iii) No preemption iv) Circular wait

A) i, ii and iii only

B) ii, iii and iv only

C) i, iii and iv only

D) All i, ii, iii and iv

9. A direct method of deadlock prevention is to prevent the occurrence of ……..

A) Mutual exclusion

B) Hold and wait

C) Circular waits

D) No preemption

10. State true of false.

i) With paging, each process is divided into relatively small, fixed-size pages.

ii) Segmentation provides for the use of pieces of varying size.

A) True, False

B) True, True

C) False, True

D) False, False

Answers:

1.	**D) Both A and B**	**6.**	**A) Mutual Exclusion**
2.	**B) MS-DOS**	**7.**	**A) Deadlock**
3.	**A) True, False**	**8.**	**D) All i, ii, iii and iv**
4.	**B) User-level threads**	**9.**	**C) Circular waits**
5.	**A) Mutual Exclusion**	**10.**	**B) True, True**

SET 6

1. ……. Involves treating main memory as a resource to be allocated to and shared among a number of active processes.

A) Partition management

B) Memory management

C) Disk management

D) All of the above

2. A process that execute only in main memory is referred to as …… and that allocated in disk is referred to a …….

A) virtual memory, true memory

B) virtual memory, real memory

C) real memory, virtual memory

D) imaginary memory, real memory

3. In process scheduling, …… determines when new processes are admitted to the system.

A) long term scheduling

B) medium term scheduling

C) short term scheduling

D) none of the above

4. In process scheduling, …… determines which ready process will be executed next by processor.

A) long term scheduling

B) medium term scheduling

C) short term scheduling

D) none of the above

5. The sum of the seek time, and the rotational delay is called the ……..

A) reached time

B) access time

C) arrived time

D) common time

6. The …….. policy segments the disks request queue into sub queues of the length N.

A) SCAN

B) C-SCAN

C) N-Step SCAN

D) FSCAN

7. Which of the following are the functions of operating system?

i) recovering from errors ii) facilitating input/output

iii) facilitating parallel operation iv) sharing hardware among users

v) implementing user interface

A) i, ii, ii, and v only

B) i, ii, iii, and iv only

C) ii, iii, iv and v only

D) All i, ii, iii, iv and v

8. File management function of the operating system includes

i) File creation and deletion ii) Disk scheduling

iii) Directory creation iv) Mapping file in secondary storage.

A) i, ii and iii only

B) i, iii and iv only

C) ii, iii and iv only

D) All i, ii, iii and iv

9. The ……. Determines when a page should be brought into main memory.

A) Fetch policy

B) Placement policy

C) Replacement policy

D) Resident set management

10. With ……. A page is written out to secondary memory only when it has been selected for replacement.

A) pre-cleaning

B) demand cleaning

C) required cleaning

D) fast cleaning

Answers:

1.	**B) Memory management**	**6.**	**C) N-Step SCAN**
2.	**C) real . virtual memory**	**7.**	**D) All i, ii, iii, iv and v**
3.	**A) long term scheduling**	**8.**	**B) i, iii and iv only**
4.	**C) short term scheduling**	**9.**	**A) Fetch policy**

5. B) access time	**10. B) demand cleaning**