

NPTEL Cloud Computing – Week 0

1. Which software does prevent external access to a system?

a) Firewall

b) Gateway

c) Router

d) Virus checker

2. Which classes are used for connection-less socket programming?

a) Datagram Socket

b) Datagram Packet

c) Both Datagram Socket & Datagram Packet

d) Server Socket

3. Which of the following is most appropriate about Threads? Threads of a process share

a) only global variables.

b) only heap.

c) neither global variables nor heap.

d) both heap and global variables.

4. What is the maximum number of hosts under class B addresses?

a) 65536

b) 65534

c) 65535

d) 254

5. Consider a system with 2 level caches. Access times of Level 1 cache, Level 2 cache, and main memory are 1 ns, 10ns, and 400 ns, respectively. The hit rates of Level 1 and Level 2 caches are 0.8 and 0.9, respectively. What is the average access time of the system ignoring the search time within the cache?

a) 12.6 ns

b) 11.2 ns

c) 10.6 ns

d) 12.4 ns

6. Using a larger block size in a fixed block size file system leads to

a) better disk throughput but poorer disk space utilization

b) better disk throughput and better disk space utilization

c) poorer disk throughput but better disk space utilization

d) poorer disk throughput and poorer disk space utilization

7. Transport layer is implemented in the Firmware of a computer system.

a) True

b) False

8. A computer's processor sends 32 bit addresses to the cache controller. It has a 512 KByte, 8-way set associative, write back data cache with block size of 32 Bytes. In addition to the address tag, each cache tag directory entry contains 3 valid bits and 1 modified bit. Find the size of the cache tag directory.

a) 212 Kbits

b) 320 Kbits

c) 160 Kbits

d) 120 Kbits

9. Flow control is mainly implemented in

a) Physical Layer

b) Application Layer

c) Transport Layer

d) Session Layer

10. Where does the swap space reside?

a) RAM

b) Disk

c) ROM

d) On-chip cache