**COA QUESTION BANK**

**EASY :**

**Q1). The Pentium processor was introduced** **in**

|  |  |
| --- | --- |
| A. | 1991 |
| B. | 1992 |
| C. | 1993 |
| D. | 1994 |

**ANS : C**

**Q2). The minimum time delay required between the initiation of two successive memory operations is called**

|  |  |
| --- | --- |
| A. | Memory cycle time |
| B. | Memory access time |
| C. | Transmission time |
| D. | Waiting time |

**ANS : A**

**Q3).MRI indicates**

|  |  |
| --- | --- |
| A. | Memory Reference Information |
| B. | Memory Reference Instruction |
| C. | Memory Registers Instruction |
| D. | Memory Register information |

**ANS : B**

**Q4).What is the correct sequence of time delays that happen during data transfer from a disk to memory?**

|  |  |
| --- | --- |
| A. | Seek time,access time,transfer time |
| B. | Seek time,Latency time,Transfer time |
| C. | Latency time,Seek time,Transfer time |
| D. | Latency time,Access time,Transfer time |

**ANS : D**

**Q5).Identify the addressing modes of below instructions and match them :  
(a) ADI          (1) Immediate addressing  
(b) STA          (2) Direct addressing  
(c) CMA        (3) Implied addressing  
(d) SUB         (4) Register addressing**

A. a – 1, b – 2, c – 3, d – 4

B. a – 2, b – 1, c – 4, d – 3

C.  a – 3, b – 2, c – 1, d – 4

 D.  a – 4, b – 3, c – 2, d – 1

**ANS : A**

Q6). A microprogram is sequencer perform the operation...  
  
A) read

B) write  
  
C) read and write  
  
D) read and execute

**Ans : D**

Q7. The I/O processor has a direct access to ....................... and contains a number of independent data channels.  
  
A) main memory  
  
B) secondary memory  
  
C) cache  
  
D) flash memory

Ans : A

**Q8).When CPU is executing a Program that is part of the Operating System, it is said to be in**  
 (A) Interrupt mode  (B) System mode  
 (C) Half mode       (D) Simplex mode  
   
**Ans: B**

**Q9).An n-bit microprocessor has**  
 (A) n-bit program counter  (B) n-bit address register  
 (C) n-bit ALU              (D) n-bit instruction register  
   
**Ans: D**

**Q10).Cache memory works on the principle of**  
 (A) Locality of data       (B) Locality of memory  
 (C) Locality of reference  (D) Locality of reference & memory  
   
**Ans: C**

**Q11).** **In computers, subtraction is carried out generally by**    
 (A) 1's complement method    
 (B) 2's complement method  
 (C) signed magnitude method  
 (D) BCD subtraction method  
   
**Ans: B**

**Q12).** **The main memory in a Personal Computer (PC) is made of**  
  (A)  cache memory.     (B)  static RAM  
  (C)  Dynamic Ram       (D)  both (A) and (B).  
   
**Ans: D**

**Q13).** **n bits in operation code imply that there are \_\_\_\_\_\_\_\_\_\_\_ possible distinct operators  
   ^=Raised to**  
   (A) 2n  (B) 2^n  
   (C) n/2  (D) n^2  
   
**Ans: B**

**Q14).** **The instruction ‘ORG O’ is a**  
   (A) Machine Instruction.     (B) Pseudo instruction.  
   (C) High level instruction.  (D) Memory instruction.  
**Ans: B**

**Q15).** A time sharing system imply

a. more than one processor in the system

b. more than one program in memory

c. more than one memory in the system

d. None of above

**Ans :b**

**Q16).** What is meant by a dedicated computer?

a. which is used by one person only

b. which is assigned to one and only one task

c. which does one kind of software

d. which is meant for application software only

**Ans : b**

**Q17).** **A floating point number that has a O in the MSB of mantissa is said to have**  
   (A) Overflow          (B) Underflow  
   (C) Important number  (D) Undefined  
   
**Ans: B**

**Q18).** **Logic gates with a set of input and outputs is arrangement of**  
   (A) Combinational circuit  (B) Logic circuit  
   (C) Design circuits        (D) Register  
   
**Ans: A**

**Q19).** **The time interval between adjacent bits is called the**    
   (A) Word-time         (B) Bit-time  
   (C) Turn around time  (D) Slice time  
     
**Ans: B**

**Q20).** **A microprogram sequencer**  
 (A)  generates the address of next micro instruction to be executed.  
 (B)  generates the control signals to execute a microinstruction.  
 (C)  sequentially averages all microinstructions in the control memory.  
 (D)  enables the efficient handling of a micro program subroutine.  
   
**Ans: A**

**Q21).** **Write Through technique is used in which memory for updating the data**  
 (A) Virtual memory    (B) Main memory  
 (C) Auxiliary memory  (D) Cache memory  
   
**Ans: D**

**Q22).** **Generally Dynamic RAM is used as main memory in a computer system as it**  
 (A) Consumes less power     (B) has higher speed  
 (C) has lower cell density  (D) needs refreshing circuitary  
   
**Ans: B**

**Q23).** **Microinstructions are stored in control memory groups, with each group specifying a**  
   (A) Routine  (B) Subroutine  
   (C) Vector   (D) Address  
   
**Ans: A**

**Q24).** **(-27)\_10 can be represented in a signed magnitude format and in a 1’s complement format as  
\_=Base**  
 (A)   111011 & 100100   (B)  100100 &  111011  
 (C)   011011 & 100100   (D)  100100 & 011011  
   
**Ans: A**

**Q25).** **An interface that provides I/O transfer of data directly to and form the memory unit and peripheral is termed as**  
   (A) DDA.   (B) Serial interface.  
   (C) BR.    (D) DMA.  
   
**Ans: D**

**Q26).** **Which of the following interrupt is non maskable**  
 (A) INTR.      (B) RST 7.5.  
 (C) RST 6.5.   (D) TRAP.  
   
**Ans: D**

**Q27).** **The average time required to reach a storage location in memory and obtain its contents is called**  
 (A) Latency time.      (B) Access time.  
 (C) Turnaround time.   (D) Response time.  
   
**Ans: B**

**Q28).** Interrupts which are initiated by  an instruction are

a. internal

b. external

c. hardware

d. software

**Ans: b**

**Q29).** Memory access in RISC architecture is limited to instructions

a. CALL and RET

b. PUSH and POP

c. STA and LDA

d. MOV and JMP

**Ans: c**

**Q30).** Microprocessor 8085 can address location upto

a. 32K

b. 128K

c. 64K

d. 1M

**Ans: c**

**Q31).** When the RET instruction at the end of subroutine is executed,

a. the information where the stack is iniatialized is transferred to the stack pointer

b. the memory address of the RET instruction is transferred to the program counter

c. two data bytes stored in the top two locations of the stack are transferred to the program counter

d. two data bytes stored in the top two locations of the stack are transferred to the stack pointer

**Ans:c**

**Q32).** **The Second Generation Computer was based on \_\_\_\_\_\_\_\_.**A. Vacuum Tube  
B. Silicon Chips  
C. Transistor  
D. Bio Chips

**Ans:c**

**Q33).The Third Generation Computer was made with \_\_\_\_\_\_\_\_.**  
A. Vacuum Tube  
B. Discrete Components  
C. IC  
D. Bio Chips

Ans: c

Q34). **How was the generation of computer classified?**A. by the device used in memory & processor  
B. by the speed of computer  
C. by the model of the computer  
D. by the accuracy of computer

Ans: a

Q35). UNIVAC is

a. Universal Automatic Computer  
b. Universal Array Computer  
c. Unique Automatic Computer  
d. Unvalued Automatic Computer

Ans: a

Q36). IBM 1401 is

a. First Generation Computer  
b. Second Generation Computer  
c. Third Generation Computer  
d. Fourth Generation Computer

Ans: b

Q37).The capacity of 3.5 inch floppy disk is

a. 1.40 MB  
b. 1.44 GB  
c. 1.40 GB  
d. 1.44 MB

Ans: d

Q38). **The BIOS is the abbreviation of \_\_\_\_\_\_\_\_.**A. Basic Input Output System  
B. Best Input Output System  
C. Basic Input Output Symbol  
D. Base Input Output System

Ans: a

Q39). **Basic is \_\_\_\_\_\_\_\_ language.**A. a procedural  
B. an object oriented  
C. both A and B  
D. none of the above

Ans: a

Q40). **In \_\_\_\_\_\_\_\_ mode, the communication channel is used in both directions at the same time?**  
A. Full-duplex  
B. Simplex  
C. Half-duplex  
D. None of the above

Ans: a

Q41). Which of the following languages is more suited to a structured program?

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | PL/1 |
| [B.](javascript:%20void%200;) | FORTRAN |
| [C.](javascript:%20void%200;) | BASIC |
| [D.](javascript:%20void%200;) | PASCAL |
| [E.](javascript:%20void%200;) | None of the above |

Ans : d

Q42). A computer assisted method for the recording and analyzing of existing or hypothetical systems is

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Data transmission |
| [B.](javascript:%20void%200;) | Data flow |
| [C.](javascript:%20void%200;) | Data capture |
| [D.](javascript:%20void%200;) | Data processing |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q43). **.** VIRUS stands for

A. Very Important Resource Under Search

B. Virtual Information Resource Under Seize

C. Verify Interchange Result Until Source

D. Very Important Record User Searched

**Answer: B**

**Q44).** The processing of an application takes place between a client and a \_\_\_\_ processor.

A. Front end                                 B. Back end  
C. Both A and B                          D. none of these

**Answer: C**

Q45). Which of the following program is not a utility?

A. Debugger                                  B. Editor  
C. Spooler                                      D. all of the above

**Answer: C**

Q46). Which technology is used in a CDROM Drive?

A. Mechanical                              B. Electromechanical

C. Optical                                     D. Fiber Optical

**Answer: C**

Q47). What is the name of the 64-bit Microprocessor developed by AMD?

A. Opteron                                   B. RISC-9000

C. iMac                                        D. Athlon

**Answer: A**

Q48). Programs stored in ROM are called \_\_\_

a. Hardware                                 B. Firmware

C. Software                                  D. None of these

**Answer: B**

Q49). The tracks on a disk which can be accessed without repositioning the R/W heads is

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Surface |
| [B.](javascript:%20void%200;) | Cylinder |
| [C.](javascript:%20void%200;) | Cluster |
| [D.](javascript:%20void%200;) | All of the above |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q50). Which access method is used for obtaining a record from a cassette tape?

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Direct |
| [B.](javascript:%20void%200;) | Sequential |
| [C.](javascript:%20void%200;) | Random |
| [D.](javascript:%20void%200;) | All of the above |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q51). Punched cards were first introduced by

A. Powers                                      B. Pascal

C. Jacquard                                    D. Herman Hollerith

**Answer: D**

Q52). Cursor is a \_\_\_\_

A. Pixel                                          B. Thin blinking line

C. Pointing device                          D. None of these

**Answer: B**

Q53). ATM stands for?

A. Automatic Talking Machine

B. Automatic Teller Machine

C. Analog Teller Machine

D. Automatic Ticketing Machine

**Answer: C**

Q54). What type of printers are Dot Matrix Printers?

A. Laser                                         B. Inkjet

C. Impact                                       D. Drum

**Answer: C**

Q55). Which of the following are the cheapest memory devices in terms of Cost/Bit?

A. Semiconductor memories          B. Magnetic Disks

C. Compact Disks                          D. Magnetic Tapes

**Answer: C**

Q56). Who built the first Mechanical Calculator

A. Joseph Marie Jacquard              B. John Mauchly

C. Blaise Pascal                             D. Howard Aiken

**Answer: C**

Q57). The earliest calculating devices are

A. Abacus                                      B. Clock

C. Difference Engine                  D. None of these

**Answer: A**

Q58). Any type of storage that is used for holding information between steps in its processing is

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | CPU |
| [B.](javascript:%20void%200;) | Primary storage |
| [C.](javascript:%20void%200;) | Intermediate storage |
| [D.](javascript:%20void%200;) | Internal storage |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **C**

Q59). A name applied by Intel corp. to high speed MOS technology is called

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | HDLC |
| [B.](javascript:%20void%200;) | LAP |
| [C.](javascript:%20void%200;) | HMOS |
| [D.](javascript:%20void%200;) | SDLC |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **C**

Q60). Which output device is used for translating information from a computer into pictorial form on paper.

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Mouse |
| [B.](javascript:%20void%200;) | Plotter |
| [C.](javascript:%20void%200;) | Touch panel |
| [D.](javascript:%20void%200;) | Card punch |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q61). A technique used by codes to convert an analog signal into a digital bit stream is known as

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Pulse code modulation |
| [B.](javascript:%20void%200;) | Pulse stretcher |
| [C.](javascript:%20void%200;) | Query processing |
| [D.](javascript:%20void%200;) | Queue management |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **A**

**INTERMEDIATE :**

**Q1). CPU generally handles an interrupt by executing an interrupt service routine**

|  |  |
| --- | --- |
| A. | as soon as an interrupt is raised |
| B. | by checking the interrupt register at the end of fetch cycle |
| C. | by checking the interrupt register after finishing the executing the current instruction |
| D. | by checking the interrupt register at fixed time intervals |

Ans : C

**Q2).The cost for storing a bit is minimum in**

|  |  |
| --- | --- |
| A. | Cache |
| B. | Register |
| C. | RAM |
| D. | Magnetic tape |

ANS : D

**Q3).P : “Program is a step by step execution of the instructions”. Given P, which of the following is true ?**

|  |  |
| --- | --- |
| A. | Program is a subset of an instruction set. |
| B. | Program is a sequence of a subset of an instruction set. |
| C. | Program is a partially ordered set of an instruction set. |
| D. | All of the above |

ANS : B

**Q4).Which of the following is a set of general purpose internal registers?**

|  |  |
| --- | --- |
| A. | Stack |
| B. | Scratch pad |
| C. | Address register |
| D. | Status register |

ANS : B

Q5). The channel which handles the multiple requests and multiplexes the data transfers from these devices a byte at a time is known as .....  
  
A) multiplexor channel  
  
B) the selector channel  
  
C) block multiplex channel  
  
D) both A and C

Ans : A

Q6. The address mapping is done, when the program is initially loaded is called ......  
  
A) dynamic relocation  
  
B) relocation  
  
C) static relocation  
  
D) dynamic as well as static relocation

Ans : C

Q7. State whether the following statement is True or False for cache memory.  
  
i) [Cache memories](http://en.wikipedia.org/wiki/CPU_cache) are high-speed buffers which are inserted between the processors and main memory.  
  
ii) They can also be inserted between main memory and mass storage.  
  
iii) It can be used as [secondary memory](http://en.wikipedia.org/wiki/Computer_data_storage).  
  
A) i- True, ii- False, iii-True  
  
B) i- False, ii- True, iii-True  
  
C) i-True, ii-True, iii-False  
  
D) i- False, ii- False, iii-True

Ans: C

Q8). **PSW is saved in stack when there is a**  
 (A) interrupt recognised    
 (B) execution of RST instruction  
 (C) Execution of CALL instruction  
 (D) All of these  
   
**Ans: A**

**Q9).** **Memory unit accessed by content is called**  
   (A) Read only memory  (B) Programmable Memory  
   (C) Virtual Memory    (D) Associative Memory  
**Ans: D**

Q10). **The BSA instruction is**  
(A) Branch and store accumulator  
(B) Branch and save return address  
(C) Branch and shift address  
(D) Branch and show accumulator  
   
**Ans: B**

**Q11).** **An instruction pipeline can be implemented by means of**    
   (A) LIFO buffer  (B) FIFO buffer  
   (C) Stack         (D) None of the above  
   
**Ans: B**

Q12). **Von Neumann architecture is**  
 (A) SISD  (B) SIMD  
 (C) MIMD  (D) MISD  
**Ans: A**

Q13). **In signed-magnitude binary division, if the dividend is (11100)\_2  and divisor is (10011)\_2 then the result is  
\_= Base**  
  (A) (00100)\_2  
  (B) (10100)\_2  
  (C) (11001)\_2  
  (D) (01100)\_2  
   
**Ans: B**

**Q14).** **In a program using subroutine call instruction, it is necessary to**  
 (A) initialise program counter    
 (B) Clear the accumulator  
 (C) Reset the microprocessor  
 (D) Clear the instruction register  
   
**Ans: D**

**Q15).** **If the main memory is of 8K bytes and the cache memory is of 2K words.  It uses associative mapping.  Then each word of cache memory shall be**  
 (A) 11 bits  (B) 21 bits  
 (C) 16 bits  (D) 20 bits  
   
**Ans: C  
   
Q16).** Which of the following code is used in present day computing was developed by IBM corporation?

a. ASCII

b. Hollerith Code

c. Baudot code

d. EBCDIC code

**Ans: d**

**Q17).** The first computer introduced in Nepal was

a. IBM 1400  
b. IBM 1401  
c. IBM 1402  
d. IBM1402

Ans: d

Q18). Which of the following computer language is used for artificial intelligence?

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | FORTRAN |
| [B.](javascript:%20void%200;) | PROLOG |
| [C.](javascript:%20void%200;) | C |
| [D.](javascript:%20void%200;) | COBOL |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q19). Poor response times are usually caused by

A. Process busy                             B. High I/O rates  
C. High paging rates                     D. Any of the above

**Answer: D**

Q20). Swapping

A. Works best with many small partitions  
B. Allows many programs to use memory simultaneously  
C. Allows each program in turn to use the memory  
D. Does not work with overlaying

**Answer: C**

Q21). Which technology is used in Compact disks?

A. Mechanical                               B. Electrical

C. Electro Magnetic                    D. Laser

**Answer: D**

Q22). The radian of a number system

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Is variable |
| [B.](javascript:%20void%200;) | Has nothing to do with digit position value |
| [C.](javascript:%20void%200;) | Equals the number of its distinct counting digits |
| [D.](javascript:%20void%200;) | Is always an even number |

**Answer:** Option **C**

Q23).   Which type of system puts the user into direct conversation with the computer through a keyboard?

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Real time processing |
| [B.](javascript:%20void%200;) | Interactive computer |
| [C.](javascript:%20void%200;) | Batch processing |
| [D.](javascript:%20void%200;) | Time sharing |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q24). The term referring to evacuating the content of some part of the machine is known as

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Dump |
| [B.](javascript:%20void%200;) | Enhancement |
| [C.](javascript:%20void%200;) | Down |
| [D.](javascript:%20void%200;) | Compiler |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **A**

Q25). A single packet on a data link is known as

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Path |
| [B.](javascript:%20void%200;) | Frame |
| [C.](javascript:%20void%200;) | Block |
| [D.](javascript:%20void%200;) | Group |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q26).   The process of communicating with a file from a terminal is

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Interactive |
| [B.](javascript:%20void%200;) | Interrogation |
| [C.](javascript:%20void%200;) | Heuristic |
| [D.](javascript:%20void%200;) | All of the above |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q27). A systems programming language for microcomputers in the Intel family is

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | PL/C |
| [B.](javascript:%20void%200;) | PL/CT |
| [C.](javascript:%20void%200;) | PL/M |
| [D.](javascript:%20void%200;) | PLA |
| [E.](javascript:%20void%200;) | None of the above |

An**swer:** Option **C**

Q28). A datum that indicates some important state in the content of input or output is

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Sequence |
| [B.](javascript:%20void%200;) | Sentinel |
| [C.](javascript:%20void%200;) | SIO |
| [D.](javascript:%20void%200;) | Sibling |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q29). Which is a non-standard version of a computing language?

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | PROLOG |
| [B.](javascript:%20void%200;) | APL |
| [C.](javascript:%20void%200;) | Army |
| [D.](javascript:%20void%200;) | PL/1 |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **C**

Q30).   Which of the following is still useful for adding numbers?

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | EDSAC |
| [B.](javascript:%20void%200;) | ENIAC |
| [C.](javascript:%20void%200;) | Abacus |
| [D.](javascript:%20void%200;) | UNIVAC |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **C**

Q31). A number that is used to control the form of another number is known as

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | Map |
| [B.](javascript:%20void%200;) | Mask |
| [C.](javascript:%20void%200;) | Mamtossa |
| [D.](javascript:%20void%200;) | Marker |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

Q32). The microcomputer, Intel MCS-80 is based on the widely used Intel

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | 8080 microprocessor |
| [B.](javascript:%20void%200;) | 8085 microprocessor |
| [C.](javascript:%20void%200;) | 8086 microprocessor |
| [D.](javascript:%20void%200;) | 8082 microprocessor |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **A**

Q33).   A program that is employed in the development, repair or enhancement of other programs is known as

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | System software |
| [B.](javascript:%20void%200;) | Software tool |
| [C.](javascript:%20void%200;) | Applications program |
| [D.](javascript:%20void%200;) | Utility program |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **B**

**DIFFICULT :**

**Q1).Which of the following coded entries are used top control access to computers?**

|  |  |
| --- | --- |
| A. | Code words |
| B. | Pass memory |
| C. | Binary pass |
| D. | ASC11 codes |
| ANS:B |  |

**Q2).The number of records contained within a block of data on magnetic tape is defined by**

|  |  |
| --- | --- |
| A. | Block definition |
| B. | Record contain clause |
| C. | Blocking factor |
| D. | Record per block factor |
| ANS:C |  |

**Q3).The ability of a medium sized computer system increase in data processing capability by addition of such devices as mass storage devices,I\O devices etc. is called**

|  |  |
| --- | --- |
| A. | Computer expandability |
| B. | Computer mobility |
| C. | Computer enhancement |
| D. | Computer upward capability  ANS : A |

**Q4).The amount of ROM needed to implement a 4 bit multiplier is**

|  |  |
| --- | --- |
| A. | 64 bits |
| B. | 128 bits |
| C. | 1 Kbits |
| D. | 2 Kbits |
| ANS:D |  |

**Q5).Which of the following need not necessarily be saved on a context switch between processes?**

|  |  |
| --- | --- |
| A. | General purpose register |
| B. | Translation lookaside buffer |
| C. | Program counter |
| D. | All of these  ANS : B |

Q6). **‘Aging registers’ are**  
   (A) Counters which indicate how long ago their associated pages have been referenced.  
   (B) Registers which keep track of when the program was last accessed.  
   (C) Counters to keep track of last accessed instruction.  
   (D) Counters to keep track of the latest data structures referred.  
**Ans: A**

**Q7).** **If memory access takes 20 ns with cache and 110 ns with out it, then the ratio**    
  ( cache uses a 10 ns memory) is  
 (A) 93%  (B) 90%  
 (C) 88%  (D) 87%  
**Ans: B**

**Q8).** **In a vectored interrupt.**  
 (A) the branch address is assigned to a fixed location in memory.  
 (B) the interrupting source supplies the branch information to the processor through an interrupt vector.  
 (C) the branch address is obtained from a register in the processor  
**(D) none of the above  
   
 Ans: B**

**Q9).** **A-Flip Flop can be converted into T-Flip Flop by using additional logic circuit  
\_=Base**  
  (A) D = T.Q\_n       (B)    D = T'    
  (C) D = T.Q\_n       (D)    D = T Exclusive Or Q\_n    
   
**Ans: D**

**Q10).** **The performance of cache memory is frequently measured in terms of a quantity called**  
   (A) Miss ratio.      (B) Hit ratio.  
   (C) Latency ratio.   (D) Read ratio.  
**Ans: C**

**Q11).** **Content of the program counter is added to the address part of the instruction in order to obtain the effective address is called.**  
   (A) relative address mode.   (B) index addressing mode.  
   (C) register mode.           (D) implied mode.    
     
**Ans: A**

**Q12).** The Analytical Engine developed during First Generation of computers used \_\_\_ as a memory unit

A. RAM                                       B. Floppies

C. Cards                                       D. Counter Wheels

**Answer: D**

Q13). Which of the following companies is a leader in manufacture of Hard Disk Drives?

A. Samsung                                  B. IBM

C. Fujitsu                                     D. Seagate

**Answer: D**

Q14). Which is a machine-oriented high-level language for the GEC 4080 series machines.

|  |  |
| --- | --- |
| [A.](javascript:%20void%200;) | LOGO |
| [B.](javascript:%20void%200;) | SNOBOL |
| [C.](javascript:%20void%200;) | Babbage |
| [D.](javascript:%20void%200;) | ALGOL |
| [E.](javascript:%20void%200;) | None of the above |

**Answer:** Option **C**