

## Microprocessor 8085 MCQ Questions and Answers

1) A microprocessor is the heart of the microcomputer.

- a) Receiving input
- b) Performing computations.
- c) Storing data & instructions
- d) All of the above.**

2) A device, which enables a microcomputer to perform the first of the above-mentioned tasks is known as the input device.

- a) Keyboard
- b) Mouse
- c) Toggle
- d) All of the above.**

3) The task of displaying the result computed by the microprocessor is performed by an output device, some of the commonly used output device.

- a) Cathode Ray Tube(CRT)
- b) Light-Emitting diodes(LED'S)
- c) Laser printer
- d) All of the above.**

4) An instruction essentially consists of an

- a) Operation code**
- b) Address of the data
- c) Instruction operates
- d) None of the above.

5) The 8085A has interrupt pins:-

- a) TRAP, RST7.5
- b) RST6.5, RST5.5
- c) TNTR(pin 10)
- d) All of the above.**

6) 8085A has 8 unidirectional signal lines:-

- a) MSB**
- b) HOLD,HALT
- c) RESET mode
- d) None of the above.

7) Every microprocessor is provided with a set of registers :

- a) Temporary storage**
- b) Instruction Execution
- c) All of these
- d) None of the above.

8) Registers available for the temporary storage of operands or address affects the following:-

- a) Memory space occupied by the program.
- b) Time of execution of the program.
- c) Ease of programming.
- d) All of the above.**

9) The registers available to the user can be further classified into:-

- a) General purpose register
- b) Special-purpose register
- c) None of these
- d) All of the above.**

10) In the 8085A microprocessor, the data size is 8-bit and the address size is 16-bit.

- a) B-C pair
- b) D-E pair
- c) H-L pair
- d) All of the above.**

11) Set of registers provided for some special applications.

- a) Accumulator**
- b) Memory space
- c) All of the above
- d) None of the above.

12) A microprocessor to execute a program, the CPU has to do the following operations:

- a) Fetch the opcode
- b) Read a memory location for the data.
- c) Perform the required operation
- d) All of the above.**

13) An instruction cycle can be defined as the sum of an instruction fetch time and the instruction execution time.

- a) Instruction cycle=Instruction fetch + Instruction execute.**
- b) Memory location and deposited in the CPU's
- c) Both of these
- d) None of the above.

14) 8085 has 5 addressing mode and are:-

- a) Immediate, inherent
- b) Direct
- c) Register and register indirect
- d) All of the above.**

30) The part of 8255 can be programmed for any other mode by writing a single control word into the

- a) Port
- b) Control Logic
- c) Set/Reset
- d) Register.**

16) One of the following addressing modes is not possible in 8085.

- a) Indexed addressing**
- b) Indirect addressing
- c) Direct addressing
- d) Indirect register address.

17) 8085 has

- a) One 16-bit register
- b) Two 16-bit register**
- c) Three 16-bit register
- d) Four 16-bit register.

18) The speed of a microprocessor is usually measured by the

- a) Microprocessor's throughput.
- b) Speed with which it performs I/P and O/P operations.
- c) Time required to execute basic instruction.**
- d) Time required to process a small operation.

19) Interrupts can be generally classified :

- a) Hardware interrupts
- b) Software interrupts
- c) Both of above
- d) All of the above.**

20) 8085 microprocessor has 5 hardware interrupts :

- a) TRAP, RST6.5
- b) RST7.5, RST5.5**
- c) INTR
- d) None of the above.

21) The data which a microprocessor needs to process, comes from devices such as a keyboard.

- a) Switch
- b) Analog-to-digital
- c) Digital-to-analog
- d) All of the above.**

22) The 8085 can respond to four externally initiated operation.

- a) Reset, Interrupt b) Ready hold c) Memory-mapped I/O d) Memory chip
- a) c, d, both
- b) a, b, both**

- c) None of the above.
- d) All of the above

23) To interconnect peripherals with the 8085 MPU, additional logic circuit, called interfacing devices. These circuits include a device such as

- a) buffer
- b) Decoder
- c) Encoder, latches
- d) All of the above.**

24) The 8085 flag register has five flags.

- 1) Carry flag, Sign flag 2) Zero flag, Parity flag 3) Auxilliary Carry
- a) 1, 2 both**
- b) 1, 3 both
- c) 2, 3 both
- d) All of the above.

25) Counters and time delays can be designed using.

- a) Software**
- b) CPI
- c) Instruction
- d) All of the above.

26) The 8085 code can be assembled by using a program called a :

- a) Cross-assembler**
- b) Cross-compiler
- c) Cross-interpret
- d) All of the above.

27) The 8085 microprocessor has two pins available for I/O communication.

- (1) HOLD, HOLDA (2) HOLDAB, HOLDB
- a) 1, 2 both
- b) 1 only**
- c) 2 only.
- d) All of these

28) The \_\_\_\_ is a program that allows then used to test and debug the object file.

- a) Assembler
- b) Loader
- c) Debugger**
- d) None of the above.

29) It is a program that takes the object file generated by the assembler program.

- a) Loading
- b) Loader**

- c) Debugger
- d) All of the above.

30) Intel's 8086 and 80286, Motorola's M 68000 and Zilog's Z8000 are some of the most powerful-16-bit microprocessor are not available today. (T/F)

Ans. False

31) A microprocessor is a multipurpose, programmable, clock driven, register-based electronic device. (T/F)

Ans. True

32) Read instructions from a storage device called memory. (T/F)

Ans. False

33) A typical programmable machine can be represented with 4 component: microprocessor, memory, Input/Output device, application. (T/F)

Ans. False

34) The physical components of this system are called the hardware. (T/F)

Ans. True

35) A set of instructions written for the microprocessor to perform a task is called an application. (T/F)

Ans. False

37) The microprocessor applications are classified primarily into 3 categories: re-programmable system and embedded system. (T/F)

Ans. True

38) The first microprocessor was introduced by Intel Corporation in 1971. (T/F)

Ans. True

39) 4-bit microprocessor (Intel) introduced were ROCKWELL International's (PPS4). (T/F)

Ans. True

40) In 8087 \_\_\_\_ executes all the instructions including arithmetic, logical, transcendental, and data transfer instructions.

- A) Arithmetic and logical unit
- B) Control Unit
- C) Numeric Execution Unit**
- D) None of the above

41) A group of \_\_\_\_ bits is called byte.

- A) 2
- B) 4

- C) 6
- D) 8**

42) The single IC which consists of ALU, control section, and register section is called \_\_\_\_.

- A) Microprocessor**
- B) Microcontroller
- C) Register
- D) Computer

43) A system bus which carries, only the control and timing signals then it is called as

- A) Address bus
- B) Data bus
- C) Control bus**
- D) None of the above

44) Physical devices and circuitry of the computer are also known as \_\_\_\_ .

- A) Hardware**
- B) Software
- C) System Software
- D) Application Software

45) Intel developed first processor 4004 in 1974 which was a \_\_\_\_ bit processor.

- A) 1
- B) 2
- C) 3
- D) 4**

46) Intel introduced the \_\_\_\_ 16 bit microprocessor in 1978.

- A) 8085
- B) 8086**
- C) 8080
- D) 80386

47) The \_\_\_\_ family was introduced as a part of Intel Centrino Technology.

- A) Pentium M**
- B) Pentium I
- C) Pentium II
- D) Dual core

48) AMD stand for \_\_\_\_

- A) Advanced Macro Devices
- B) Advanced Micro Devices**
- C) Analog Macro Devices
- D) Analog Micro Devices

49) 16 bit microprocessor has \_\_\_\_ bit data bus and \_\_\_\_ bit address bus.

**A) 16, 20**

B) 8,16

C) 4, 16

D) 8,20

50) 8086 operates in \_\_\_\_ modes.

A) Four

B) Three

**C) Two**

D) One

51) BIU Stands for \_\_\_\_.

A) Binary Interactive Unit

B) Bus Interactive Unit

**C) Bus Interface Unit**

D) Binary Interface Unit

52) Assembler is a type of translator that translates \_\_\_\_ language into machine level language.

A) High Level

**B) Assembly level**

C) Both A and B

D) None of the above

53) The addressing modes of 8086 can be categorized into \_\_\_\_ categories.

A) One

B) Two

C) Three

**D) Four**

54) In \_\_\_\_ addressing mode the operands are specified in the instruction itself.

**A) Immediate**

B) Register

C) Direct

D) Indirect

55) \_\_\_\_ instructions are used in such cases when some instructions are needed to be executed number of times to perform certain tasks.

A) Jump

**B) Loop**

C) Shift

D) Rotate

56) \_\_\_\_ instruction stops the execution of microprocessor and force microprocessor to enter into wait state

- A) WAIT
- B) LOCK
- C) ESC(Escape)
- D) HALT**

57) A series of data byte available in memory at consecutive locations is called as \_\_\_\_.

- A) Bit String
- B) Byte String**
- C) Word
- D) None of these

58) \_\_\_\_ loads a byte from a string in memory into AL.

- A) LOD SB**
- B) LOD SW
- C) STO SB
- D) STO SW

59) CMPS stands for \_\_\_\_.

- A) Compare string byte**
- B) Compare string bit
- C) Concatenate string byte
- D) Concatenate string bit

60) \_\_\_\_ is a Programmable Interrupt Controller.

- A) 8259A**
- B) 8086
- C) 8085
- D) 8255

61) \_\_\_\_ is used by 8259 A to Decipher various Command Words the CPU writes.

- A) INT
- B) INTA
- C) Ao**
- D) RD

62) The length of a bus cycle in 8086 system is of \_\_\_\_ clock cycles.

- A) One
- B) Two
- C) Three
- D) Four**

63) PIC stands for \_\_\_\_

- A) Process Interface Controller
- B) Process Interrupt Controller
- C) Programmable Interface Controller
- D) Programmable Interrupt Controller**



64) Data bus buffer is a \_\_\_\_ state bidirectional \_\_\_\_ bit buffer that is used to interface 8259A to the system Data Bus.

**A) 3,8**

B) 2,8

C) 3,16

D) 2,16

65) RAM is \_\_\_\_ memory.

A) read only

B) Write only

**C) Read/write**

D) None of the above

66) In \_\_\_\_ cell the capacitor is used to store the charge as a representation of data.

A) Static RAM

B) ROM

**C) Dynamic RAM**

D) None of the above

67) In context of 8255 BSR stands for \_\_\_\_.

A) Bit Set Register

**B) Bit-Set Reset**

C) Binary Set Register

D) Binary Set-Reset

68) In 8255-PPI \_\_\_\_ mode is used as two simple 8 bit I/O ports and port C as two 4-bit I/O ports.

**A) Mode 0**

B) Mode 1

C) Mode 2

D) Mode 3

69) In displays when small information or data has to be displayed then we can use \_\_\_\_.

A) LED

B) LCD

C) CRT

**D) Both A and B**

70) There are \_\_\_\_ types of seven segment displays

A) 4

B) 3

**C) 2**

D) 1

71) IC 7447 is used as BCD to 7 segment decoder.

**A) True**

B) False

72) \_\_\_\_ is an Intel's general purpose keyboard display controller.

A) 8255

**B) 8279**

C) 8085

D) 8088

73) \_\_\_\_ is a programmable interval timer/counter designed for use with Intel Microprocessor system.

A) 8255

B) 8279

C) 8251

**D) 8254**

74) 8254 has powerful READ BACK command which allows the user to check the count value, programmed mode, current mode and current status of counter

**A) True**

B) False

75) USART stands for \_\_\_\_

**A) Universal Synchronous Asynchronous Receiver Transmitter**

B) Universal Standard Analog Receiver Transmitter

C) Universal Synchronous Analog Radiator Transmitter

D) Universal Standard Asynchronous Radiator Transmitter



Nepal