2071 Exam Set 2

Very Short questions:

1. Define microprocessor.
2. What are the three states of SAP-I Fetch cycle?
3. Define instruction cycle.
4. List out three valid register pairs of 8085 microprocessor.
5. For what purpose is STA instruction used in 8085 microprocessor?
6. What is DMA?
7. What is meant by synchronous mode in communication?
8. List out any two differences between SAP-I and SAP-II architecture.
9. What is microinstruction?
10. What is the function of Program Counter (PC)?
11. Sketch the timing diagram of MOV A, B.
12. Define T-states.
13. Define interrupt.
14. What do you mean by opcode and operand?
15. What is data bus?
16. List the name of flags available in 8085 microprocessor.
17. Write short description on LDA instruction.
18. Write the name of maskable and non maskable interrupt signals/pins of 8085 microprocessor.
19. Write down any two advantages of DMA.
20. Write any two differences between parallel and serial communication.
21. Explain in short about single handshake I/O.

Long questions:

22. Draw neat and labeled diagram of Von-Neumann Architecture and explain its basic concept.
23. Draw the block diagram of SAP-I architecture and explain about its parts.
24. Write the different types of addressing modes and explain them in short.
25. WAP to add two 8 bit numbers stored in memory location 3000H and 3001H. Store the result in memory location 4000H. Ignore the carry after 8 bits.
26. WAP to perform the following.
    a. Load the number 25H in register B and 40H in register C
    b. Subtract the content of register B from the content of register C
    c. Display the output in part 2
27. Explain in brief about vector interrupts.
28. Draw a block diagram of 8255A.

2072 question set 5

Group A

1. Name the first 8 bit microprocessor.
2. What is the primary purpose of SAP-I?
3. Define T-state.
4. Write any two valid registered pairs of 8085.
5. Give an example of two byte and three byte instruction of 8085.
6. Define DMA.
7. State serial communication.

Group B

8. Why is binary display is important in SAP-I?
9. List out the instruction sets of SAP-I and define.
10. Draw the block diagram of three states of fetch cycle.
11. Sketch the timing diagram of MVI B, 32H.
12. State the operations of status signal S_0 and S_1.
13. Define instructional cycle and machine cycle.
14. Draw a clean pin configuration of 8085.
15. List out the different addressing modes with examples.
16. Write down any four types of branching instruction with their description.
17. Write program to load 1BH in register D and B5H in register B, increment the content of B and decrement the content of D by 1. Subtract the content of D from the content of B. Display the result at out port 01H.
18. Write down the two differences between maskable and non maskable interrupt.
19. Draw a block diagram of 8259 interrupt controller.
20. Write any two differences between synchronous and asynchronous mode of operation.
21. Sketch 9 pin Rs 232 and write down the function of each pin.

Group C

22. Give a brief explanation on the evolution of microprocessor.
23. Sketch a block diagram of SAP-II and explain each functional block diagram.
24. List different types of flag used in 8085 and explain it.
25. Write an APL to load the bit pattern 91H in register B and 87H in register C. Mask all bits except D5 bit from register B and C. If D5 bit is logically 1 in both the register then output the result at port 05H.
26. Write an APL to find the largest number in a data array between Coo1H to Coo3h and store the result at CoCoH.
27. Explain the DMA controller 8237 interfacing with 8086.
28. Define handshaking and explain its two types.

Pre SEE Exam Set 1

Very Short Questions:

1. Define microprocessor.
2. What is the full form of MAR?
3. What do you mean by the term T-state?
4. What is the function of ALE?
5. Write short description of ADI opcode.
6. What is maskable interrupt?
7. Why do we need strobe in communication?

Short questions

8. Write any two differences between SAP-J and SAP-II architecture?
9. Write short description on OUT instruction.
10. List out 8085 interrupt pins and their priority.
11. List the names of flag available in 8085 microprocessor.
12. Define instruction cycle.
13. Write down the types of machine cycle available in 8085 microprocessor.
14. What do you mean by term opcode and operand?
15. List out any two arithmetic instruction set?
16. Find output present at memory location 2050.

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MVI     A,      93H

XRA     A

STA 2050

HLT
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17. Explain the priority modes of 8259 A.
18. Draw the diagram how DMA controller interface microprocessor and peripherals.
19. What is synchronous communication?
20. Write short notes about double handshake input/output.

Long questions

21. Explain the evolution of microprocessor.
22. Draw the block diagram of sap-II architecture and explain its basic concept.
23. Draw the block diagram of 8259A.
24. Explain DTE and DCE connection through RS 232 Standards.
25. Explain different types of addressing modes of 8085 microprocessor.
26. WAP to multiply two 8 bit numbers stored in memory location 3000H and 3001H and store the result in memory location 4000H. Ignore the carry after 8 bits.
27. WAP to perform the following

a. Load the number 25H in register B and 40H in register C.
b. Subtracts the content of register B from the content of register C.
c. Display the output in port 2.
d. End the program.

Model question set 3

Short questions:

1. Define instruction format.
2. What do you understand by the term instruction cycle?
3. Define the terms opcode and operand.
4. Write the description of ADI opcode.
5. What is interrupt?
6. Define parallel communication.
7. Define microprocessor.

Short questions

8. Write down any two architectural differences between SAP-I and SAP-II.
9. Write down the types of machine cycle of 8085 microprocessor.
10. Sketch the pin configuration of Intel 8085 microprocessor.
11. List out 8085 interrupt pins and their priority.
12. Justify the application of serial communication.
13. Write short notes on LDA instruction.
14. Justify fetch and execution cycle of SAP-I instruction.
15. Sketch the timing of MVI 32H.
16. What do you understand by the term T states?
17. Write short notes on Addressing modes.
18. Justify instruction set.
19. List out arithmetic instruction set.
20. Write the advantage of DMA.
21. Sketch the 9 pin configuration of RS-232.

Group C

22. Brief the evolution of microprocessor.
23. Draw the architecture of SAP-I and explain each block.
24. Sketch the functional block diagram of 8085 microprocessor.
25. Draw block diagram of 8259.
26. Explain the modes of operation of 8255A.
27. WAP to add two numbers stored at memory location 2040H and 2041H and store the final result to address 2042H.
28. WAP to find the maximum in a given series of data the length is given in memory location 203FH and the series starts from 2040H. Store the result in 2090H.

Second terminal set 4

Group A

1. Define microprocessor.
2. What do you mean by control unit?
3. Define addressing modes.
4. List out the three valid register pairs of 8085 Microprocessor.
5. Define instruction cycle.
6. What do you mean by instruction?

Group B

7. What is the function of Accumulator?
8. Define interrupt.
9. Define instruction and mention its types on the basis of bytes.
10. Shortly explain the Von-Neumann Architecture.
11. Explain any two instructions with a suitable example.
12. Find the O/P of the following instruction.
    a. MVI B,32H
    b. MVI A,40H
    c. ADD B
    d. HLT
13. Find O/P
    a. MVI A,93H
    b. X OR
    c. Out Port 1
14. What is data bus?
15. What is address bus?
16. Write short description on LDA instruction.
17. Find O/P
    a. MVI A,92 H
    b. CMA
    c. Out Port 1
18. Define fetch and execution cycle.

Group C

Long question

19. List out the pin details of 8085 microprocessor.
20. Draw a block diagram of 8255 A.
21. What do you mean by flag register? Explain its types.
22. Explain any five addressing modes of 8085 microprocessor.
23. Draw a block diagram of SAP-1 architecture and explain its parts.
24. Write a program to multiply two numbers.
25. Write a program to perform the following action.
    a. Load the number 25H in B register.

b. Load the number 85H in D register.
c. Move the content of D to the accumulator.
d. Add the content of B to the content of accumulator.
e. Display the result at out port 1.