Important Questions

Microprocessor
NEC -503

1. Explain the facilities available in 8259. Explain the fixed and rotating priority mode. How does 8259 identify its own status as master and slave?

2. How many 8259 can be interconnected in cascaded mode? Show their cascading structure.

3. Give the block diagram for programmable peripheral interface; explain each of its blocks.

4. Interface a 4×4 matrix keyboard to 8085. Show the interfacing diagram and writes a routine to read 10 key strokes and store them into memory.

5. Explain the mode 3 operation of 8254 with the help of timing waveform. What will happen if a new count is written while counter is running?

6. With the help of block diagram, describe 8237 DMA controller.

7. Explain the following mode of operation of 8259:
   (i) Poll mode
   (ii) Cascade mode

8. Draw and explain internal Block diagram of programmable timer counter and it's mode of operation.

9. Explain various data transfer modes supported by 8237 DMA Controller.

10. Draw and explain the functional block diagram of 8257.

11. Explain the block diagram of 8251, also explain Simplex and Duplex mode of communication.

12. Draw and explain internal Block diagram of programmable timer counter and it's mode of operation.

13. Explain the command word of 8259.

14. Compare RS232C and RS422A standards.

15. Explain the block diagram of 8259 and also draw a neat interfacing diagram.