



**LOYOLA COLLEGE (AUTONOMOUS), CHENNAI – 600 034**

**B.Sc. DEGREE EXAMINATION – COMPUTER SCI.**

**SECOND SEMESTER – APRIL 2014**

**PH 2107 – MICROPROCESSOR - 8085**

Date : 07/04/2014  
Time : 09:00-12:00

Dept. No.

Max. : 100 Marks

**PART A**

Answer **ALL** the questions

(10 × 2 = 20)

1. Explain the functions of the  $\overline{RD}$  and  $\overline{WR}$  pin.
2. Assume (A) = 79<sub>H</sub> and (B) = 68<sub>H</sub>. After executing ADD B instruction, what will be the content of A register and status of the flags?
3. Give any three instructions that clears the accumulator.
4. Explain the function of DAD instruction.
5. Write an asm program to add two 8 bit no in immediate mode of addressing.
6. What are registers? Give the different type of registers available in  $\mu$ p 8085.
7. What is a port?
8. What are the different types of DMA?
9. What is meant by polling?
10. List the hardware and software interrupts of 8085.

**PART – B**

Answer any **FOUR** questions

(4 × 7.5 = 30)

11. Explain with a neat diagram the bus structure of  $\mu$ p 8085.
12. Explain in detail the various addressing modes of 8085.
13. Write an asm program to find the largest of 5 numbers in an array in indirect mode of addressing.
14. Explain the Hardware and software interrupts of 8085.
15. Explain the methodology of interfacing I/O devices and peripheral ICs.

**PART – C**

Answer any **FOUR** questions

(4 × 12.5 = 50)

16. Explain in detail the architecture of microprocessor 8085.
17. Explain the arithmetic and logical instructions of 8085.
18. Write an asm program to sort an array of 10 numbers in ascending order.

19. Explain in detail the working of the programmable interrupt controller 8259 with a neat block diagram.
20. With a neat diagram explain the internal block diagram of the programmable peripheral interface 8255.