MAY 2012 **P/ID 17410/RBL**

Time : Three hours Maximum : 75 marks

PART A — (5 × 5 = 25 marks)

Answer ALL questions.

1. (a) How is the addressable memory size of a microprocessor determined? Give example.

Or

(b) What are registers? What is their use?

2. (a) Explain any two addressing modes.

Or

(b) List out any five features of Motorola 6800.

3. (a) Compare and contrast microprocessor and microcontroller.

Or

(b) List out the data registers and segment registers of 8086.

4. (a) What is the use of UART? Explain.

Or

(b) Explain the use of modems in serial communication.

5. (a) Write a note on 'design process' of a microprocessor.

Or

(b) What is testing? Explain.

PART B — (5 × 10 = 50 marks)

Answer any FIVE questions.

6. Describe the architectural characteristics of a microprocessor.

7. List out the names of registers that are part of a microprocessor and explain their functions.

8. Explain the communication process of microprocessor with the I/O.

9. Give the block diagram of Motorola 6800 and explain it.

10. Explain the architecture and programming model of 8051.

11. Discuss on any five addressing modes of 8086. Give examples.

12. Give the block diagram of a UART and explain it.

13. How is microprocessor used in Traffic control system? Explain it.
