

MAY 2014

**P/ID 17462/RCM/
PCAN**

Time : Three hours

Maximum : 75 marks

PART A — (5 × 5 = 25 marks)

Answer ALL questions.

1. (a) Discuss various addressing modes.

Or

(b) Explain RISC architecture in detail.

2. (a) Discuss the concept of pipelining.

Or

(b) Write notes on array processors.

3. (a) Discuss various multiplication algorithms.

Or

(b) Explain decimal arithmetic operations in detail.

4. (a) Explain I/O interface in detail.

Or

(b) Discuss DMA in detail.

5. (a) Compare and contrast main and auxiliary memory.

Or

- (b) Write notes on interprocess arbitration.

PART B — (5 × 10 = 50 marks)

Answer any FIVE questions.

6. Discuss data transfer and manipulation instructions.
7. Explain arithmetic and instruction pipelining in detail.
8. Write notes on various pipeline stalls in detail.
9. Explain notes on floating point arithmetic operations in detail.
10. Discuss various modes of transfer for input, output organisation.
11. Discuss the concept of virtual memory.
12. Write note on I/O processor.
13. Discuss associative cache concept with necessary diagram.