

**1223****Code : 15CS32T***Register  
Number*

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**III Semester Diploma Examination, April/May-2018****COMPUTER ORGANIZATION****Time : 3 Hours ]****[ Max. Marks : 100**

- Note :** (i) Answer any **six** full questions from Part – A. Each carries **five** marks.  
(ii) Answer any **seven** full questions from Part – B. Each carries **ten** marks.

**PART – A**

1. Define the following terms : 5
  - (i) Bus
  - (ii) MAR
  - (iii) MDR
  - (iv) PC
  - (v) IR
2. Describe the big-endian and little endian addressability. 5
3. Explain the basic memory operations. 5
4. Explain how a complete instruction is executed. 5
5. Write a note on vectored interrupts. 5
6. Explain the Double data rate SDRAM concept. 5
7. Explain the significance of cache memory. 5
8. Write a note on flash memory. 5
9. Compare super scalar verses VLIW. 5

## PART – B

10. Explain with examples one-address, two-address and three-address instruction types. 10
  11. Illustrate with example indirect addressing. 10
  12. Explain multiple-bus organization. 10
  13. With block diagram explain complete processor. 10
  14. Describe the working of DMA. 10
  15. (a) Explain the use of PCI bus in computer system. 5  
(b) Write a note on SCSI bus. 5
  16. Describe types of ROM. 10
  17. Illustrate with diagram memory hierarchy with respect to speed, size and cost. 10
  18. Explain : 10
    - (a) CISC scalar processor
    - (b) RISC scalar processor
  19. Describe arithmetic, instruction and processor pipelining. 10
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