

## 2.8 30321 COMPUTER ARCHITECTURE

### UNIT-1 REGISTER TRANSFER LOGIC

- 1.1 Register transfer language
- 1.2 bus and memory transfer
- 1.3 Arithmetic micro operations
- 1.4 Logic micro operations
- 1.5 Shift micro operations

### UNIT-2 CPU

- 2.1 Major components of CPU
- 2.2 general register organization
- 2.3 Parallel Processing
- 2.4 Control Unit

### UNIT-3 INPUT- OUTPUT SYSTEM

- 3.1 I/ O interface
- 3.2 Modes of transfer
- 3.3 I/O Programming
- 3.4 IOP communications

### UNIT-4 MEMORY ORGANISATION

- 4.1 Types of Memory
- 4.2 Associative memory
- 4.3 Cache memory
- 4.4 Virtual memory

### UNIT-5 PC ARCHITECTURE

- 5.1 Block diagram of 8086
- 5.2 Registers
- 5.3 Address
- 5.4 Basic Instructions

### Reference Books:

1. Computer System Architecture by Morris Mano.M., Prentice Hall of India
2. Computer Organization and Architecture by William Stallings Prentice Hall of India, 2002
3. Assembly language and Programming by Peter Abel, Prentice Hall of India
4. Fundamentals of Assembly Language Programming Using IBM PC by Detmer Richard.C, Galgotia Publications Ltd. New Delhi
5. Computer Architecture (SIE) (Schaum's Outline Series) by Carter, Tata McGraw-Hill