(3RD SEMESTER CSE)

DISCIPLINE:CSE SEMESTER:3RD NAME OF THE TEACHING FACULTY: **Amod Bagh NO.OF WEEKS:15** SUBJECT:CSA **NO.OF DAYS/PER WEEK CLASS ALLOTTED: 4** WEEK **CLASS DAY** THEORY/PRACTICAL TOPICS 1ST 1ST Basic structure of computer hardware 2ND Basic Structure of computer hardware 3RD **Functional Units 4**TH Computer components 2^{ND} 1ST Performance measures 2ND Memory addressing & Operations 3RD **Instructions & instruction Sequencing** 4^{TH} Fundamentals to instructions 3RD 1ST Fundamentals to instructions 2ND Operands 3RD Op Codes 4^{TH} Instruction formats 1ST **4**TH **Addressing Modes** 2ND **Processor System** 3RD Register Files 4^{TH} Complete instruction execution 1ST 5[™] Complete instruction execution 2ND **Fetch** 3RD Decode **4**TH Execution 6[™] 1ST Hardware control 2ND Hardware control 3RD Micro program control 4^{TH} **Memory System** 1ST **7**[™] Memory characteristics 2ND Memory characteristics 3RD Memory hierarchy **4**TH Memory hierarchy 8TH 1ST RAM and ROM organization 2ND **Interleaved Memory** 3RD Cache memory **4**[™] Cache memory 1ST 9TH Virtual memory 2ND Input – Output System 3RD Input - Output Interface **4**[™] Modes of Data transfer

| 10 TH | 1 ST | Modes of Data transfer |
|------------------|-----------------|----------------------------------|
| | 2 ND | Programmed I/O Transfer |
| | 3 RD | Programmed I/O Transfer |
| | 4 TH | Interrupt driven I/O |
| 11 TH | 1 ST | Interrupt driven I/O |
| | 2 ND | DMA |
| | 3 RD | I/O Processor |
| | 4 TH | I/O Interface & Bus architecture |
| 12 TH | 1 ST | Bus and System Bus |
| | 2 ND | Types of System Bus |
| | 3 RD | Data Bus |
| | 4 TH | Address Bus Control |
| 13 TH | 1 ST | Bus Structure |
| | 2 ND | Bus Structure |
| | 3 RD | Basic Parameters of Bus design |
| | 4 TH | SCSI |
| 14 TH | 1 ST | USB |
| | 2 ND | . Parallel Processing |
| | 3 RD | Parallel Processing |
| | 4 TH | Linear Pipeline |
| 15 [™] | 1 ST | Multiprocessor |
| | 2 ND | Multiprocessor |
| | 3 RD | Flynn"s Classification |
| | 4 TH | Flynn"s Classification |