

Branch Name:	Information and Communication Technology
Semester/Year:	Semester IV / Second Year
Subject Title:	Computer Organization
Subject Code:	1ET1070401
Pre-requisite:	Basic Knowledge of Digital Electronics

Course Objectives:

- To make students understand about basic computing system
- To make students learn about central processing unit, control unit
- To make students learn input, output and memory structure of computer

Teaching Scheme (Hours per week)				Evaluation Scheme (Marks)				
Lecture (L)	Tutorial (T)	Practical (P)	Credit	Theory (Marks)		Practical (Marks)		Total (Marks)
				University Assessment	Continuous Assessment	University Assessment	Continuous Assessment	
04	00	02	05	70	30	30	20	150

Subject Contents				
Sr. No	Topic	Total Hours	Weight (%)	
1	Basic Computer System, Input, Output Devices and Memory	12	20	
2	CPU Organization, BUS Structure, Registers and Register Transfer, Arithmetic and Logic Unit, Control Unit, Micro-program Control and Hardwired Control	20	40	
3	Memory Organization and Virtual Memory	10	20	
4	Input and Output Organization, Interrupt Structures, Case Study of Recent Computer Organization	10	20	

Course Outcome:

After learning the course, the students should be able to:

1. Understand about computing system
2. Understand central Processing unit and control unit
3. Understand how input, out and memory works.

Text Book:

(1) “Computer Organization”, V. Carl Hamacher et al, Tata Mc Graw Hill

List of Suggested Practical:

1. Basic Programming of 8-bit Microprocessor
2. Advance Programming of 8-bit Microprocessor
3. Interfacing Memory with Microprocessor
4. Interfacing I /O ports with Microprocessor
5. Interfacing Keyboard and Display with Microprocessor
6. Interfacing Interrupt Controller with Microprocessor
7. Interfacing Timers with Microprocessor.
8. Programming with 16-bit Microprocessor
9. Study of advance processors.