

## Techno-Social Excellence Marathwada Mitra Mandal's INSTITUTE OF TECHNOLOGY (MMIT)

Lohgaon, Pune-411047.

## **Department of Mechatronics Engineering**

Course Name: Digital Electronics Class: SE Mechatronics Engineering Course Code: 217543 (2019 Course)

## **Course Objectives:**

- 1.To study number systems and develop skills for design and implementation of combinational logic circuits and sequential circuits
- 2. To understand the functionalities, properties and applicability of Logic Families.
- 3. To introduce programmable logic devices and ASM chart and synchronous state machines.
- 4.To basics of microprocessor.

## **Course Outcomes:**

On completion of the course, learner will be able to

CO1: Simplify Boolean Expressions using K Map.

CO2: Design and implement combinational circuits.

CO3: Design and implement sequential circuits.

CO4: Develop simple real-world application using ASM and PLD.

CO5: Choose appropriate logic families IC packages as per the given design specifications.

CO6: Explain organization and architecture of computer system