**MUFFAKHAM JAH COLLEGE OF ENGINEERING AND TECHNOLOGY**

**COMPUTER SCEINCE AND ENGINEERING DEPARTMENT**

**COURSE HANDOUT (Academic Year 2016-17)**

**Course Code: PC452CS**

**Course Title: Microprocessor and Interfacing Lab**

**Year and Semester: B.E. IV Semester (CSE-B)**

**Contact Hours per week: 6**

**Course Coordinator: K S Niraja**

**Course Coordinator Phone: 9866195615**

**Course Coordinator Email: ksniraja@mjcollege.ac.in**

**Course Coordinator Location: Room No. 5205**

**Resource Link:** http://mjcollege.ac.in/studentresourceslist.php?resourceusername=ksniraja

**Course Coordinator Availability**: Wednesday: 11:00 - 12:00 A.M,

Saturday: 11.00 - 12.00 P.M

**Pre-requisite Courses and Assumed Knowledge and Capabilities:**

To successfully complete this course, students should have the ability to write programs in any basic programming language. They should have knowledge of Intel 8085 and Intel 8086 Architecture, Instructions and programming techniques.

**Course Description:**

* Apply the programming techniques in developing the assembly language programs.
* The student can also understand of 8085, architecture, programming and applications.
* Familiarize the architecture of 8086 processor, assembling language programming and interfacing with various modules.
* These course can be prerequisite for the future course Embedded Systems.

**Course Outcomes:**

Upon completion of the course, students should possess the following skills:

* Be able to take a problem statement and implement a solution using a combination of hardware and software while using microprocessors (8085, 8086).
* Be able to interface various devices to a microprocessors.
* Compare the various interface techniques. Analyze and apply the working of 8255, 8279 and design and develop the programs.

**Overview of Learning Activities**

1. Lectures and class discussions

2. Laboratory experiments and demonstrations

3. Group project / group assignment

**Overview of Learning Resources**

1. Ramesh S Goankar, *Microprocessor Architecture, Programming and Applications with the 8085.*

2. Douglas V Hall ,Microprocessors and Interfacing ,TMGH, 2Edition 2006

3. Trainer Kit

4. Additional material provided in the class / handouts

**Overview of Assessment**

i. Class tests

ii. University Exam