



# AKRG COLLEGE OF ENGINEERING & TECHNOLOGY

(Approved By A.I.C.T.E., New Delhi and Affiliated to JNTUK, KAKINADA)

NALLAJERLA, W.G.Dt., (A.P)-534112

DEPARTMENT OF ELECTRONICS & COMMUNICATION ENGINEERING

III B.Tech – II Semester

Regulation – R16

## MICROPROCESSORS&MICROCONTROLLERS LAB

### LIST OF EXPERIMENTS

**PART- A: (Minimum of 5 Experiments has to be performed)**

**8086 Assembly Language Programming using Assembler Directives**

1. Sorting.
2. Multibyte addition/subtraction
3. Sum of squares/cubes of a given n-numbers
4. Addition of n-BCD numbers
5. Factorial of given n-numbers
6. Multiplication and Division operations
7. Stack operations
8. BCD to Seven segment display codes

**PART- B: (Minimum of 3 Experiments has to be performed)**

**8086 Interfacing**

1. Hardware/Software Interrupt Application
2. A/D Interface through Intel 8255
3. D/A Interface through Intel 8255
4. Keyboard and Display Interface through Intel 8279
5. Generation of waveforms using Intel 8253/8254

**PART- C: (Minimum of 3 Experiments has to be performed)**

**8051 Assembly Language Programs**

1. Finding number of 1's and number of 0's in a given 8-bit number
2. Addition of even numbers from a given array
3. Ascending / descending order
4. Average of n-numbers