

LAB

For C lab look the programs given in the following website:

www.programmingsimplified.com/c-program-examples

Some important programs:

String (character array) related problems:

Convert a sentence from lowercase to uppercase (hints: use toupper() function)

Find number of char in a sentence (use strlen() function)

Copy a string s1 to another string s2 (use strcpy(s2,s1) function)

Read a year and say whether it's a Leap year

Solution of a quadratic equation $x = \frac{-b \pm \sqrt{b^2 - 4ac}}{2a}$

Calculate Factorial of a value N (normal or recursive way – see class lecture slide)

Find the value of nCr and nPr

Find the Fibonacci numbers from 1 to N

Find/display the prime numbers between M to N , also count the number of prime numbers

Average of N numbers (using 1 dimensional array)

Bubble Sorting (1 dimensional array)

Matrix Addition (2 dimensional array)

Matrix Multiplication (2 dimensional array)

Also practice to give input or show output from/into a file (that can be done with any program)