

## COMPUTER SCIENCE PRACTICAL FILE

### CONDITIONAL STATEMENTS

1. Write a menu driven program to calculate:

- a. Area of circle [ $A = \pi r^2$ ]
- b. Area of square [ $A = a * a$ ]
- c. Area of rectangle [ $A = l * b$ ]

### ITERATIVE STATEMENTS(LOOPS)

1. WAP to display all even numbers and odd numbers from 1 to N
2. WAP that uses for loops to print the sequence of letters below.  
ABBCCDDDEEEEEE
3. WAP to print the following  
\*  
\*\*  
\*\*\*  
\*\*\*\*  
\*\*\*\*\*
4. WAP to print following pattern  
#####  
####  
###  
##  
#
5. Take an integer input N from the user. Print N Fibonacci numbers. Recall that Fibonacci series progresses as 0 1 1 2 3 5 8...
6. Write a program to print first N prime numbers.
7. Write a program to find LCM and GCD of two numbers
8. WAP to find the display following series  $1 + x/1! + x^2/2! + x^3/3! + x^4/4! + \dots + x^n/n!$

### String Manipulation

1. Write a python program to enter a string and a substring. It should then display the number of occurrences of the given substring in the line.
2. WAP to find a string is a palindrome without using function.
3. Program to print whether a given character is an uppercase or a lowercase character or a digit or any other character.
4. Write a python program to enter a string in smaller case and convert it into upper case.
5. Write a python program to replace one string with the other string.
6. Write python program to enter a string and then enter a character and check the frequency of that character in that string.
7. Write a python program that receives the index and returns the corresponding value.

#### **LIST**

1. WAP that returns the largest even number in the list of integers. If there is no even number in input, print "No even number".
2. WAP that prints the sum of the even indexed elements of L, minus the sum of the odd-indexed elements of L.
3. WAP to enter a list of integer numbers and shift all negative numbers to left and positive numbers to right.
4. WAP to enter a list of integer numbers and find out the sum of numbers ending with digit 3
5. WAP to enter a list of number and a number to be searched. If the number is present, the display its position otherwise appropriate