UG/4th Sem/COMP/19 (Pr.)

2019

B.Sc.

4th Semester Examination

COMPUTER SCIENCE (Honours)

Paper - GE4P

[Practical]

Set - I

Full Marks : 20 Time : 3 Hours

The figures in the margin indicate full marks.
Candidates are required to give their answers in their own words as far as practicable.
Illustrate the answers wherever necessary.

PYTHON LAB

Answer any ***one*** question (Lottery basis) $1 \times 15 = 15$

1. Write a program to find GCD of two numbers.

2. Write a program to implement linear search in a list.

[Turn Over]

3. Write a program to generate Fibonacci Series upto a range.

4. Write a program to print factors of a given number.

5. Write a program using a function that takes an integer n as input and calculates the value of

$$1+\frac{1}{1!}+\frac{1}{2!}+\frac{1}{3!}+....+\frac{1}{n!}.$$

6. Write a program to check a number is prime or not.

7. Write a program to calculate factorial of a given number.

8. Write a program to print even numbers of a given range.

PROGRAMMING IN VB LAB

Answer any ***one*** question (on lottery basis)

$1\times15=15$

1. Write a program using VB to read an integer and find the factorial of it.

2. Write a program using VB to read n numbers and find the largest and smallest among them.

3. Write a program using VB to check if a year is leap year or not.

4. Write a program using VB to read an array of n integers and find the average of these integers.

5. Write a program using VB to design a form which accepts a multiword string and provides its abbreviation.

6. Write a program using VB to create a form that accepts some basic information like name, address, salary etc. about an employee and store those information in a database table.

7. Consider a database table which consists of some usernames and corresponding passwords. Create a login form using VB which accepts a username and password from user and validates if a user is authentic or not.

8. Create a simple calculator using VB.

INFORMATION SECURITY & CYBER LAWS LAB

Answer any ***one*** question : 1×15=15

1. Perform encryption and decryption of Caesar Cipher. Write a script for performing these operations.

2. Perform encryption and decryption of a Rail fence cipher. Write a script for performing these operations.

3. Use n map/zenmap to analyse remote machine.

4. Demonstrate sending of a protected word document.

5. Demonstrate sending of a digitally signed document.

6. Demonstrate sending of a protected worksheet.

7. Demonstrate use of steganography tools.

8. Demonstrate use of gpg utility for signing and encrypting purposes.

[PNB - 02, Viva - 03]
