# **Assingment question Python:**

### Module 1:

- 1) Write down the feature and limitation of Python.
- 2) Explain the various operations on String.
- 3) Write the difference between type casting and type coercion.
- 4) What are the different types of operator present in Python programming?
- 5) Write a program to calculate area of a circle.
- 6) Write a program to perform addition, subtraction, division and multiplication on two floating point numbers.
- 7) Write a short note on conditional branching statements supported by Python.
- 8) Write short note on break, continuous and pass statement.
- 9) Write a program that display all leap years from 1900-2001.
- 10) Write program to demonstrate the use of nested if structure.

## Module 2:

- 1) Write the difference between function and module and also mention the any 8 build in function and module.
- 2) Write a program using random and math module.
- 3) Write the difference between global and local variable in function.
- 4) Write the difference between lambda, iterative and recursive function.
- 5) Write a program using function to calculate area of triangle by Heron's formula.
- 6) With proper example explain how List can be used as a stack and queues.
- 7) Write short note on function and operation present in List data structure.
- 8) Write a program to create a list. And also write a program to remove all duplicate value present in the list and reverse it.
- 9) Write a program to calculate distance between two point using List.
- 10) Write a short note on filter(), map(), reduce(), variable length argument and default argument in Function.

#### Module 3:

- 1) Write a difference between tuple, dictionary and set with example.
- 2) Explain the any four operations present in tuple, dictionary and set.

- 3) What do you mean by recursive function explain with example.
- 4) Write a program to calculate fibonaci series using with or without recursive function.
- 5) Write a program that creates a dictionary of cubes of odd numbers in the range of 1-20.
- 6) Write a program using filter function to list of cubes of numbers from 1-10.
- 7) Make two set of random integers and apply all set operation on them.
- 8) Write a program to calculate greatest common divisior.
- 9) Write a program that prints all consonants in a string.
- 10) Differentiate between pop(), remove() and discard() method of sets.

# Module 4:

- 1) What do you mean by class members, class variables and instance variables?
- 2) What does the self argument signify in the class methods?
- 3) Mentioned the various built in attribute associate in class.
- 4) Write a program that uses class to store the name and subject name of students. Use list to store the five subject name.
- 5) Write a program with class employee that keeps track of the number of employees in organization and also store their name ,designation and salary details.
- 6) Write a class that stores a string and count the no. Of uppercase, lowercase, vowels, consonants, vowels and spaces etc.
- 7) What do you mean by exceptional handling. Explain it with syntax, flow chart.
- 8) What do you mean by divide by zero exception. Write aprogram to handle it.

#### Module 5:

- 1) Write a program that scans an email addresses and separates the username and domain.
- 2) Write short note on regular expression.
- 3) What do you mean by meta-character? Write any 8 meta-character that are frequently used in regular expression.
- 4) Write a program to extract an email address from a text using regular expression.
- 5) Write a program that demonstrates the use of different methods such as upper, lower, split, join, count, replace and find on a string.

- 6) What are different acess modes in which you can open a file?
- 7) with an example explain 3 attribute of file object.
- 8) What are files? Why do we need them?
- 9) Explain the significance of root node?
- 10) If str="good morning everyone", answer the following
- ✓ Write a program to print the tenth character of the string
- ✓ Write a instruction that print the index of the first occurrence of the letter 'r' in the string.