B. Sc. DEGREE END SEMESTER EXAMINATION : NOVEMBER 2023

SEMESTER 1 : COMPUTER APPLICATION

COURSE : **19U1CRCAP2 : PROGRAMMING IN 'PYTHON'**

(For Regular 2023 Admission and Improvement/Supplementary 2022/2021/2020/2019 Admissions)

Time : Three Hours   Max. Marks: 75

PART A
Answer All (1 mark each)

1.   What is the output of print(tuple+tinytuple) if tuple=('abcd',123,7.98,'jacob','80.6) and tinytuple=(786,'jacob')?

2.   Define the syntax for passing arguments.

3.   Name the two membership operators.

4.   Which are the two parts of function definition? Give the syntax.

5.   What is the purpose of is operator?

6.   What is the purpose of not in operator?

7.   What is Boolean value?

8.   What are the two major loop statements?

9.   What are the various attributes for a file object?

10. How to get output 3 from L=[1,2,3]?

(1 x 10 = 10)

PART B
Answer any 8 (2 marks each)

11. How will you read from and write to a file is Python?

12. What do you mean by immutable object in Python?

13. Illustrate negative indexing in list with an example.

14. List the syntax for function call with and without arguments.

15. Mention the types of arguments in Python.

16. How to split strings and what function is used to perform that operation?

17. Execute the statement: d = input(). What happens when you do not enter anything and hit Enter?

18. Briefly explain input and output functions in Python.

19. What will be the output of the following Python code?

```
i = 0
while i < 3:
    if i==2:
        break
    print(i)
    i += 1
else:
    print(0)
```

20. Write the syntax of nested if statement.

(2 x 8 = 16)

PART C
Answer any 5 (5 marks each)

21. What is the difference between keyword arguments and default arguments?
22. Write a recursive function to find the factorial of a number.
23. Explain while loop in Python with an example.
24. Write a Python program to copy the contents of a file.
25. Write a program to get the largest number from a list.
26. Differentiate while loop and while loop with else with examples.
27. Demonstrate the various operators in Python.

(5 x 5 = 25)

PART D
Answer any 2 (12 marks each)

28. Explain the following:
    a) Translators
    b) Types of languages

29. Explain any five string formatting functions with syntax and examples

30. Explain the different types of infinite loop, loop with condition at the top, middle and bottom with suitable examples.

31. Explain the following
    a) Functions
    b) Modules
    c) import statement

(12 x 2 = 24)