

Exam. Code : 107203

Subject Code : 1792

Bachelor of Computer Application (BCA) 3rd Semester
COMPUTATIONAL PROBLEM SOLVING
USING PYTHON

Paper—III

Time Allowed—3 Hours] [Maximum Marks—75

Note :—(1) Attempt any **FIVE** questions.

(2) Use of Non-programmable, Non-storage Calculator is permitted.

1. (a) Name Python Data Types. 5

(b) Write the output for the following code :

```
x=10
```

```
y=20
```

```
if (x>y):
```

```
print x+y
```

```
else:
```

```
print x-y
```

5

(c) Explain with code the use of Escape Sequence in Python. 5

2. (a) Write a Python script to concatenate following dictionaries to create a new one. Sample Dictionary :

```
dic1={1:10,
```

```
dic2={3:30,
```

```
dic3={5:50,6:60}
```

Expected Result : {1: 10, 2: 20, 3: 30,
4: 40, 5: 50, 6:60}

5

(b) Write a Python program to sum all the items in a dictionary. 10

3. (a) Predict the output of the following program. Also state which concept of OOP is being implemented.

```
def sum(x,y,z):
    print "sum=", x+y+z
def sum(a,b):
    print "sum=", a+b
sum(10,20)
sum(10,20,30)
```

5

(b) Define a class TravelPlan in Python with the following descriptions:

Private Members:

Plan Code of type long

Place of type character array (string)

Number_of_travellers of type integer

Number_of_buses of type integer 10

4. (a) Write a Python program that accepts a word from the user and reverse it. 7

- (b) Write a Python program to convert month name to a number of days.

Expected Output :

List of months: January, February, March, April, May, June, July, August, September, October, November, December.

Input the name of Month : March

No. of days : 31 days 8

5. (a) Write a Python program to get the largest number from a list. 7
- (b) Write Python code to explain use of *Break* and *Continue* keywords in Loops. 8
6. (a) Write a note on using Files in Python. 5
- (b) Write a Python program to count the frequency of words in a file. 10
7. Using Python code highlight use Python Modules and Top Down Design. 15
8. Using Python code highlight use Python API for querying Database Tables. 15