PSG COLLEGE OF ARTS & SCIENCE (AUTONOMOUS)

BSc DEGREE EXAMINATION MAY 2025

(Second Semester)

Branch - COMPUTER SCIENCE

COMPUTING USING PYTHON

Maximum: 75 Marks Time: Three Hours

SECTION-A (10 Marks)

Answer ALL questions

ALL questions carry **EQUAL** marks $(10 \times 1 = 10)$

Module No.	Question No.	Question	K Level	СО
1	1	What is the output of print list[2] when list = ['abcd', 2.23, 'john']? a)John b)2.23 c) abcd d) ab	K1	CO1
	2	Relate the advantages of using functions a. Reduce duplication of code b. Clarity of code c. Reuse code d. All	K2	CO1
2	3	Which of the following will separate all the items in list? a) * b), c); d) &	K1	CO1
	4	Outline the data types does not belong to Python a) Numeric b) Tuple c) Dictionary d) Structure	K2	CO1
3	5	Which of the following is the default mode while opening a file? a. Binary b) Number c) Text d) None	K1	CO1
	6	Relate the method used to delete the directory a) chdir() b) mkdir() c) mrdir() d) rmdir()	K2	CO1
	7	When was tkinter created? a) 1991 b) 1993 c) 1995 d) 1999	K1	CO1
4	8	Show that fg in tkinter widget is stands for which of the following a) forgap b) background c) foreground d) None of the above	К2	CO1
5		Which library is used for plotting graphs and visualization a) Numpy b) Panda c) Matplotlib d) None of the above	K1	CO1
	10	Show the Datastructure has row and column index a.List b) Series c.DataFrame d) None of the above	K2	CO1

Cont...

SECTION - B (35 Marks)

Answer ALL questions

ALL questions carry EQUAL Marks

 $(5\times7=35)$

Module No.	Question No.	Question	K Level	СО
1	11.a.	Discuss about Data types in Python.		
	(OR)			CO1
	11.b.	Develop a Python program to find the factorial of a number using recursion.	K6	COI
	12.a.	Assess and print another tuple whose values are even numbers in the given tuple (12, 7, 38, 56, 78) using python code.	77.5	600
2		K5	CO2	
	12.b.	Determine the way of Adding and removing items in a set.		
	13.a.	Determine the way of handling exception by using python program.		
3	(OR)		K5	CO3
	13.b.	Assess the way of creating Objects and passing them as arguments.		
	14.a.	Discover the way of Creating GUI by adding buttons and changing their text property based on the content of textbox widget.	75.4	004
4	(OR)		K4	CO4
	14.b.	Examine the way of adding a label to the GUI form.		
	15.a.	Examine the way of Indexing, selection, and filtering using Dataframe.		
5	(OR)		K4	CO5
	15.b.	Test for Creating Bar Plots using Panda and explain the steps of creating it.		

SECTION -C (30 Marks)

Answer ANY THREE questions

ALL questions carry EQUAL Marks $(3 \times 10 = 30)$

Module No.	Question No.	Question	K Level	CO
1	16	Analyze about Built-in functions for strings.	K4	CO1
2	17	Explain about Creating a Dictionary and Accessing Values in a Dictionary.	K5	CO2
3	18	Appraise the Overview of OOP.	K5	CO3
4	19	Create basic forms using Tkinter.	K 6	CO4
5	20	Infer the way of Handling Missing Data in Dataframe.	K4	CO5