5 years Integrated M.Sc. (IT) / B.Sc. (IT) - Semester 5 Practical List

IT5013 - Introduction to Data Processing with Python

Practical No. 1	Enrollment No.
Practical	1. Write a python program to print "Hello World" on screen.
Problem	2. Write a python program that takes two numbers as an input to find the
	division of those numbers.
	3. Write a python program that takes two numbers as an input to find the
	average of those numbers.
	4. Write a python program to convert Kilogram into Gram.
	5. Write a python program to find simple interest. Simple Interest = $p * r * n /$
	100
	Where p = principal amount, r = rate of interest, and n=number of years
	6. Write a python program to check whether the number is odd or even.
	7. Write a python program that accepts two Integers and check if they are equal.
	8. Write a python program to check whether the number is positive, negative,
	and zero.
	9. Write a python program to find the maximum from the given three numbers.
	10. Meeta scored 45 in Mathematics, 38 in Gujarati, 30 in Social Science, 42 in
	English, and 39 in Science. Now calculate the sum of five subject's marks and
	find the percentage. Maximum marks in one subject are 100.
	11. Write a python program to print your name ten times using loop.
	12. Write a python program to find the sum of the first N natural numbers. [Hint:
	1+2+3+4++N]
	13. Write a python program to find N! (5 factorial=1*2*3*4*5)
	14. Write a python program to find reverse of number.
	15. Write a python program to print sum of digit in a number. N = 1234 then 1 + 2 +
	3 + 4 = 10.
	16. Write a python program to print sum of even numbers up to given N number.
	Ex. N = 10 then 2 + 4 + 6 + 8 + 10 = 30
	17. Write a python program to print sum of odd numbers up to given N number.
	Ex. N = 10 then $1 + 3 + 5 + 7 + 9 = 25$.

Practical No. 2	En	rollment No <u>.</u>
Practical	1.	Write a Python program to calculate the length of a string.
Problem	2.	Write a Python program to print a string made of the first two and the last two
		characters from a given a string. If the string length is less than 2, then print
		"Empty String"
		Sample String: 'Python'
		Expected Result : 'Pyon'
		Sample String : 'PY'
		Expected Result : 'PYPY'
		Sample String: 'P'
		Expected Result : "Empty String"
	3.	Write a Python program to print a string from a given string where all
		occurrences of first character will changed to '@', except the first character
		itself.
		Sample String: 'restart'
		Expected Result : 'resta@t'
	4.	Write a Python program to print a single string from two given strings,
		separated by a space and swap the first two characters of each string.
		Sample String: 'abc', 'xyz'
		Expected Result : 'xyc abz'.
	5.	Write a Python program to add 'ing' at the end of a given string (length should
		be at least 3). If the given string already ends with 'ing' then add 'ly' at the end
		of string. If the string length of the given string is less than 3, leave it unchanged
		and print string as it is.
		Sample String : 'abc'
		Expected Result : 'abcing'
		Sample String: 'string'
		Expected Result : 'stringly'.
	6.	Write a Python program to remove the nth index character from a nonempty
		string.
	7.	Write a Python program to change a given string to a new string where the firs

characters have been exchanged.
Sample String : 'abcd'
Expected Result : 'dbca'
Sample String: '12345'
Expected Result : ' 52341'.
8. Write a Python program to remove the characters which have odd index values
of a given string.
Write a Python program that takes string from the user and displays that string
in upper and lower cases.

Practical No. 3	nrollment No <u>.</u>
Practical	. Write a Python program to sum all the items in a list.
Problem	. Write a Python program to get the largest number from a list.
	. Write a Python program to count the number of strings in list where the string
	length is 2 or more and the first and last character are same.
	Sample List: ['abc', 'xyz', 'aba', '1221']
	Output: 2
	. Write a Python program to remove duplicates from a list.
	. Write a Python program to find the list of words that are longer than n from a
	given list of words.
	N=3, Word List =The quick brown fox jumps over the lazy dog
	Output: ['quick', 'brown', 'jumps', 'over', 'lazy']
	Write a Python program to print the numbers from the list after removing ever
	numbers from it.