

INDEX

SL.NO	PROGRAMS	PG.NO
1.	Generate Prime and Fibonacci numbers within the range given by user as input.	
2.	Create a tuple with different data types and print each element. Check if an element exists in a tuple.	
3.	Create an empty list. Input 'n' items. Count total number of Odd, Even, and zero items in the list and display the contents of new lists.	
4.	Create a List n Integers and perform linear search on the list to find a number which is user input.	
5.	Write a function that returns the second-largest element in a tuple of integers. Add, remove, and insert elements in the list.	
6.	Write a Python function that takes a list of integers as parameter and function should return the maximum and minimum numbers from the list. (don't use built-in methods)	
7.	Write a menu driven program to convert Input string into Upper case, Lower Case, Proper case, or swap case.	
8.	Create two sets containing 'n' elements, using menu driven approach Perform all the basic operations on both the sets	
9.	Write Python program to Accept string and count the total number of vowels, consonants and blanks in a String. (Use Assert statement to accept strings only)	
10.	Create a dictionary with few key-value pairs. Access and modify dictionary values.	
11.	Create a Dictionary containing Key value pairs, Keys are 'Eno', Ename, 'City', 'Designation' and Salary. Write a menu driven program to use dictionary methods Insert, Update, Delete and Get Methods	
12.	Find the mean, median, and standard deviation of an array.	
13.	Write a python program to create a text file, insert n lines of text and display its contents in a neat format. Also count the number of lines, words and characters in the text file.	
14.	Write a program to accept numbers in the form of tuple or list and display their sum and average (write two different functions one for tuple and another for list)	
15.	Create a class named Employee containing employee details such as Eid, Ename, City, Designation, Bpay, and Category.	

	Include two methods to accept values for these data items and printing the details of employee for N employees	
16.	Create a Class containing Employee Details (EID, Ename, City, Bpay), include three methods to input data, calculate Gross Salary and Display the details (Take user input for N employees). To calculate Gross Salary use the formula $\text{Gross Salary} = \text{Bpay} + \text{DA (50\% on BPay)} + \text{HRA (10\% on Bpay)}$	
17.	Create a Class named student with the following details Regno, Name, Marks1, Marks2 and Marks3, include methods to Accept values, calculate total and display details.	
18.	Write a program in Python to demonstrate handling multiple exceptions	
19.	Create a class BankAccount with methods deposit() and withdraw(). Raise an exception if the withdrawal amount is more than the balance.	
20.	Write a python program to create a text file containing sales details (Id, Sname, ProductName, Total sales) , insert n lines and display its contents in a neat format. Also count the number of lines, words and characters in the text file.	
21.	Write a Python program to check the validity of a password given by the user. (use exception handler) The Password should satisfy the following criteria: 1. Contain at least 1 letter between a and z 2. Contain at least 1 number between 0 and 9 3. Contain at least 1 letter between A and Z 4. Contain at least 1 character from \$, #, @ 5. Minimum length of password: 6 6. Maximum length of password: 12	
22.	Create an array of 15 random integers (1–100), extract specific elements using fancy indexing, display elements greater than 50 using masking, and replace all odd numbers with -1.	
23.	Create Numpy array using linspace , eye(), and arange and display details	
24.	Write a Pandas program to create the mean and standard deviation of the data of a given Series. (Take user input)	
25.	Create a Data frame containing Salesman details (Sln, Name, City, ProductName, Qty, Price) from dictionary and display first 10 and last 5 rows. Also do the following	

	<ul style="list-style-type: none"> i. Sort the data frame in the ascending order of city and descending order of ProductName ii. Print the average and sum of product sold Product name-wise iii. Print the sum of Total sales done by each salesman iv. Add new column named Total sales from Qty * Price v. Display Sales Man who does not belong to city Mangalore and Total Sales <1,00,000 vi. Display salesman belonging to any 3 cities and their total qty <10 vii. Draw bar chart for total sales 	
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