

**TILAK MAHARASHTRA VIDYAPEETH, PUNE**

**ACADEMIC YEAR 2023-24**

**LAB ASSIGNMENT LIST**

**SUBJECT: PYTHON PROGRAMMING**

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| **Sr. No.** | **Problem statements** | **Submission Date** | **Sign** |
| 1. | Write a python code to find given number is prime or not | Sept 23 |  |
| 2 | Write a python code to find LCM and GCM of a given list | Sept 23 |  |
| 3 | Write a python code to find mean and standard deviation of a given list of numbers | Sept 23 |  |
| 4 | Write a python code to add and delete element from a dictionary using functions | Sept 23 |  |
| 5. | Write a python code to print 10 student details using class and lists | 16th Oct 23 |  |
| 6. | Write a python code to find student from a given list using class | 16th Oct 23 |  |
| 7. | Write a python code to inherit employee class to student class | 16th Oct 23 |  |
| 8. | Display Fibonacci series up to 10 terms | 16th Oct 23 |  |
| 9. | Find the factorial of a given number | 16th Oct 23 |  |
| 10 | Write a program to iterate a given list and count the occurrence of each element and create a dictionary to show the count of each element. | 18th Oct 23 |  |
| 11 | Find the intersection (common) of two sets and remove those elements from the first set | 18th Oct 23 |  |
| 12 | Get all values from the dictionary and add them to a list but don’t add duplicates | 18th Oct 23 |  |
| 13 | Create a Cricle class and intialize it with radius. Make two methods getArea and getCircumference inside this class. | 18th Oct 23 |  |
| 14 | Create a Temprature class. Make two methods :  1. convertFahrenheit - It will take celsius and will print it into Fahrenheit.  2. convertCelsius - It will take Fahrenheit and will convert it into Celsius. | 18th Oct 23 |  |
| 15 | Create a Time class and initialize it with hours and minutes.  1. Make a method addTime which should take two time object and add them. E.g.- (2 hour and 50 min)+(1 hr and 20 min) is (4 hr and 10 min)  2. Make a method displayTime which should print the time.  3. Make a method DisplayMinute which should display the total minutes in the Time. E.g.- (1 hr 2 min) should display 62 minute. | 23rd Oct 23 |  |
| 16 | Write a function “perfect()” that determines if parameter number is a perfect number. Use this function in a program that determines and prints all the perfect numbers between 1 and 1000.  [An integer number is said to be “perfect number” if its factors, including 1(but not the number itself), sum to the number. E.g., 6 is a perfect number because 6=1+2+3]. | 23rd Oct 23 |  |
|  | Find whether a given string starts with a given character using Lambda | 23rd Oct 23 |  |
| 17 | Write a Python program to handle a ZeroDivisionError exception when dividing a number by zero. | 27th Oct 23 |  |
| 18 | Write a Python program that executes division and handles an ArithmeticError exception if there is an arithmetic error. | 27th Oct 23 |  |
| 19 | Write a Python program that executes an operation on a list and handles an Index Error exception if the index is out of range. | 27th Oct 23 |  |
| 20 | Create Address Book in Python – Using Tkinter | Nov 23 |  |
| 21 | Write a python code to build simple GUI calculator | Nov 23 |  |
| 22 | Write a python code to build web page with student registration form | Nov 23 |  |
| 23 | Write a python code to build web pages with sign-in and sing-up forms | Nov 23 |  |
| 24 | Write a python code to build Rest api for product | Nov 23 |  |
| 25 | Write a python code to build Ajax enabled web application for product | Nov 23 |  |