

PRAGATI VIDYA PEETH



SESSION: 2025-26

SUBJECT – COMPUTER SCIENCE

CLASS – XII

Submitted By:

<Name of Student>

Submitted To:

Rajat Mathur Sir

Certificate

This is to certify that <Name of student>, a student of class XII has successfully completed the Practical Work of Computer Science under the guidance of Mr. *Rajat Mathur* (Computer Teacher) during the year 2025-26.

Rajat Mathur

External Examiner

Acknowledgement

I take this opportunity to sincerely express my gratitude to all for helping me complete this Practical File. My sincere thanks to Mr. Rajat Mathur Sir, our Computer Teacher for his constant support and encouragement without whose help and guidance I would not have been able to complete this project.

List of Practical

- 1 Write a program to changing the scale of temperature.
- 2 Write a program to finding roots of quadratic equation.
- 3 Write a program to check a leap year.
- 4 Write a program for Marks Grading System.
- 5 Write a program to check whether the entered number is prime or composite.
- 6 Write a program to find whether an inputted number is perfect or not.
- 7 Write a Program to check if the entered number is Armstrong or not.
- 8 Draw Fibonacci Series (While Loop).
- 9 Calculating Factorial of given number.
- 10 Write a program to check Palindrome of a number.
- 11 Write a program to calculating sum of numbers given by user.
- 12 Write a program to finding LCM and HCF of two given numbers.
- 13 Using Library Functions (Math, Statistics).
- 14 Write a program for the game Rock, Paper, Scissors using Random module.
- 15 Write a program to read, write and update text file.
- 16 Write a program to read the content of a text file and display the total number of vowels, consonants, uppercase and lower-case characters.
- 17 Create a binary file with name and roll no. Search for a given roll number and display the name, if not found display appropriate message.
- 18 Create a CSV file with Field empid, empname, salary, doj (Date of Joining). Make user interface with following options:
 - a. Enter new Record
 - b. Search Record by empid
 - c. Modify salary
 - d. Delete record
- 19 Create a student table and insert data. Implement the following SQL commands on the student table:
 - a. ALTER table to add new attributes / modify data type / drop attribute
 - b. UPDATE table to modify data
 - c. ORDER By to display data in ascending / descending order
 - d. DELETE to remove tuple(s)
 - e. GROUP BY and find the min, max, sum, count and average
- 20 Integrate SQL with Python by importing the MySQL module and perform the following operations:
 - a. Insert Records
 - b. View Records
 - c. Modify Recordsd.
 - d. Delete Records

For Illustration

Changing the scale of temperature

Code for the Program

```
# Conversion of Temperature
ch=int(input("""
1. Celsius to Fahrenheit
2. Fahrenheit to Celsius

Enter your choice"""))
if ch==1:
    c=float(input("Enter temperature in Celsius : "))
    f=9*c/5+32
    print("Temperature in Fahrenheit = ",f)
elif ch==2:
    f=float(input("Enter temperature in Fahrenheit : "))
    c=(f-32)*5/9
    print("Temperature in Celsius = ",c)
else:
    print("Please check your input")
```

Output of the Program

```
===== RESTART: C:/Users/HP/Desktop/
----- Temperature Converter-----
1. Celsius to Fahrenheit
2. Fahrenheit to Celsius

Enter your choice: 1
Enter temperature in Celsius : 50
Temperature in Fahrenheit = 122.0

===== RESTART: C:/Users/HP/Desktop/
----- Temperature Converter-----
1. Celsius to Fahrenheit
2. Fahrenheit to Celsius

Enter your choice: 2
Enter temperature in Fahrenheit : 98.4
Temperature in Celsius = 36.888888888888886

===== RESTART: C:/Users/HP/Desktop/
----- Temperature Converter-----
1. Celsius to Fahrenheit
2. Fahrenheit to Celsius

Enter your choice: 5
Please check your input
```

Bibliography

1. NCERT.
2. KIPS Publication.
3. Computer Science by Sumita Arora
4. Computer Science by Preeti Arora
5. <https://hwww.w3schools.com/python/>

Thank you .