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**1. Convert Kilometers to Miles**

Here's a simple Python program to convert kilometers to miles:

# Function to convert kilometers to miles def km\_to\_miles(kilometers): conversion\_factor = 0.621371 miles = kilometers \* conversion\_factor return miles # Input kilometers from the user kilometers = float(input("Enter distance in kilometers: ")) # Convert and display the result miles = km\_to\_miles(kilometers) print(f"{kilometers} kilometers is equal to {miles} miles")

**2. Convert Celsius to Fahrenheit**

Here's a Python program to convert Celsius to Fahrenheit:

# Function to convert Celsius to Fahrenheit def celsius\_to\_fahrenheit(celsius): fahrenheit = (celsius \* 9/5) + 32 return fahrenheit # Input temperature in Celsius from the user celsius = float(input("Enter temperature in Celsius: ")) # Convert and display the result fahrenheit = celsius\_to\_fahrenheit(celsius) print(f"{celsius} degrees Celsius is equal to {fahrenheit} degrees Fahrenheit")

**3. Display Calendar**

To display a calendar, you can use Python's built-in **calendar** module. Here's a simple program:

import calendar # Input year and month from the user year = int(input("Enter year: ")) month = int(input("Enter month: ")) # Display the calendar cal = calendar.month(year, month) print(f"Calendar for {calendar.month\_name[month]} {year}:\n{cal}")

**4. Solve Quadratic Equation**

Here's a Python program to solve a quadratic equation:

import cmath # Function to solve quadratic equation def quadratic\_solver(a, b, c): # Calculate the discriminant d = cmath.sqrt(b\*\*2 - 4\*a\*c) # Calculate the solutions root1 = (-b + d) / (2\*a) root2 = (-b - d) / (2\*a) return root1, root2 # Input coefficients from the user a = float(input("Enter coefficient a: ")) b = float(input("Enter coefficient b: ")) c = float(input("Enter coefficient c: ")) # Solve and display the roots roots = quadratic\_solver(a, b, c) print(f"The roots of the quadratic equation are: {roots}")

**5. Swap Two Variables without Temp Variable**

Here's a Python program to swap two variables without using a temporary variable:

# Input variables from the user x = int(input("Enter value of x: ")) y = int(input("Enter value of y: ")) # Swap without using a temporary variable x, y = y, x # Display the swapped values print(f"After swapping: x = {x}, y = {y}")

Feel free to run these programs and let me know if you have any questions!