Task:

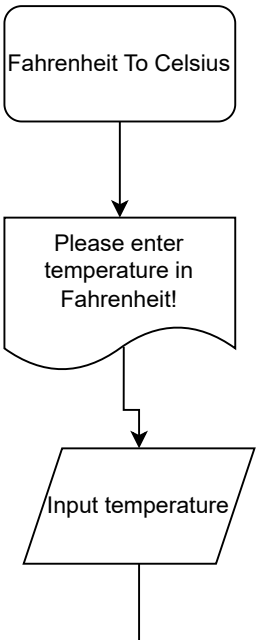
Create the pseudocode and the flow chart for the following task:
Task: Given a temperature in degrees Fahrenheit, convert it to degrees centigrade.
Description: The algebraic formula for temperature conversion is:
$C = \frac{5}{9}(°F - 32)$
Also can be written as: $C = 5/9\ (°F - 32)$
Where C = Temperature in degrees centigrade
F = Temperature in degrees Fahrenheit
Part 1: Write pseudocode that includes the following requirements:
 Steps should be sequentially numbered.
 The user begins at Step 1 and must eventually stop at the last step called "End".
Part 2: Draw the flow chart to solve this problem. Processing should begin at a "Start"
oval and terminate at an "End" oval.

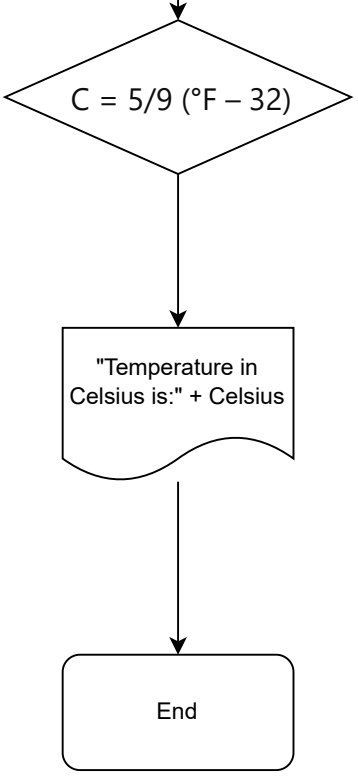
Test Results: Test your results. Entering the freezing point of water (32 degrees Fahrenheit) should result in a centigrade temperature of 0 degrees; entering the boiling
point of water (212 degrees Fahrenheit) should result in an answer of 100 degrees
centigrade.

Pseudocode:

1. Start
2. Display message: "Enter temperature in degrees Fahrenheit:"
3. Read input from the user and store it in a variable, e.g., fahrenheit.
4. Convert Fahrenheit to Celsius using the formula: celsius = (5/9) * (fahrenheit - 32)
5. Display message: "Temperature in degrees Celsius is: " + celsius
6. End

Flowchart:





Python:

```
def fahrenheit_to_celsius(fahrenheit):
    celsius = (5/9) * (fahrenheit - 32)
    return celsius


def main():
    fahrenheit = float(input("Enter temperature in degrees
Fahrenheit: "))

    celsius = fahrenheit_to_celsius(fahrenheit)

    print("Temperature in degrees Celsius is:", celsius)


if __name__ == "__main__":
    main()
```

Java:

```
import java.util.Scanner;


public class TemperatureConversion {
    static double fahrenheitToCelsius(double fahrenheit) {
        double celsius = (5.0 / 9.0) * (fahrenheit - 32);
        return celsius;
    }

    public static void main(String[] args) {
        Scanner scanner = new Scanner(System.in);

        System.out.print("Enter temperature in degrees Fahrenheit:
");
        double fahrenheit = scanner.nextDouble();

        double celsius = fahrenheitToCelsius(fahrenheit);

        System.out.println("Temperature in degrees Celsius is: " +
celsius);

        scanner.close();
    }
}
```