

# PROJECT-1

```
# Import the random module to generate a random number

import random

# Generate a random number between 1 and 100

number_to_guess = random.randint(1, 100)

attempts = 10 # Set the number of allowed attempts

# Start the game loop

while attempts > 0:

    try:

        # Get the player's guess

        guess = int(input("Enter your guess (between 1 and 100): "))

        # Decrease the number of attempts left

        attempts -= 1

        # Check the player's guess against the random number

        if guess < number_to_guess:

            print("Too low!")

        elif guess > number_to_guess:

            print("Too high!")

        else:

            print(f"Congratulations! You guessed it in {10 - attempts} attempts!")

            break

        # Inform the player of the remaining attempts

        print(f"Attempts remaining: {attempts}")

        # If no attempts are left, reveal the number

        if attempts == 0:

            print(f"Sorry, you're out of attempts. The number was {number_to_guess}.")

    except ValueError:

        # Handle non-integer input gracefully

        print("Please enter a valid integer.")
```

# OUTPUT:

```
IDLE Shell 3.12.5
File Edit Shell Debug Options Window Help
Python 3.12.5 (tags/v3.12.5:ff3bc82, Aug 6 2024, 20:45:27) [MSC v.1940 64 bit (AMD64)] on win32
Type "help", "copyright", "credits" or "license()" for more information.
>>>
===== RESTART: C:\Users\nagav\Desktop\MOTIONCUT\PROJECT-1.py =====
Enter your guess (between 1 and 100): 67
Too low!
Attempts remaining: 9
Enter your guess (between 1 and 100): 78
Too low!
Attempts remaining: 8
Enter your guess (between 1 and 100): 89
Too low!
Attempts remaining: 7
Enter your guess (between 1 and 100): 95
Too low!
Attempts remaining: 6
Enter your guess (between 1 and 100): 99
Too high!
Attempts remaining: 5
Enter your guess (between 1 and 100): 97
Too low!
Attempts remaining: 4
Enter your guess (between 1 and 100): 98
Congratulations! You guessed it in 7 attempts!
>>>
```

