#### proj03: Guessing Game

## **Specification:**

Generate a random number between 1 and 9 (including 1 and 9).

Ask the user to guess the number, then tell them whether they guessed too low, too high, or exactly right.

Keep the game going until the user types "exit."

Keep track of how many guesses the user has taken, and when the game ends, print this out.

### Example:

I'm thinking of a number between 1 and 9. Can you guess my number? Enter a number, or 'exit' to end the game: 4

Your number is too high!

Enter a number, or 'exit' to end the game: 1

Your number is too low!

Enter a number, or 'exit' to end the game: 2

Your number is too low!

Enter a number, or 'exit' to end the game: 3

Congratulations, you guessed my number! You used 4 guesses.

#### **Extension:**

Limit the number of guesses that the user can make.

#### Hint 1:

To generate a random number, you will need to use someone else's code. You can access others' in modules. We will use the random module. To do this, as the top of your code, type "import random."

To generate the random integer, type something like: variable name = random.randint(2,6)

This sets the variable called "variable\_name" to a random integer that is greater than or equal to 2 and less than or equal to 6. You do not have to call this variable "variable\_name." You could pick any name, like "computer\_number" or "answer."

# **Hint 2:**

Use a for loop or a while loop to allow the user to guess again either:

- Until they have guessed the correct answer, or
- Until they have used up a certain number of guesses