Python Programming

Lesson 6.1

Guessing Game

Presented by Advaspire Team

Program a Guessing Game

```
What is the reward you get for completing your mission? : hahahd
What is the reward you get for completing your mission? : ajdawdh
What is the reward you get for completing your mission? : dwadaw
Out of guesses, YOU LOSE!
```

In this lesson, we are going to make a mini game called Guess the Secretword. Loop will be the main component for this game.

```
What is the reward you get for completing your mission? :
```

```
YOU WIN!
```

Game Rules

1. You will need to have a secretword that you want people to guess.
2. The question must be related to the secretword you have decided.
3. There will be a limit to how many time you can guess. Once reach the limit, the game needs to stop.
4. Display a (You Win) or (You Lose) at the end of the script, depending on the situation.

Lets Start

First, create these variables. I will explain more about each variable functions in the next slide. The secret word and guess limit variable can be changed to anything you like. The rest will be exactly as in the example.

```
secret_word = 'adcoin'
guess =""
guess_count = 0
guess_limit = 3
out_of_guesses = False
```

The Variables Functions

1. secret_word will be the correct answer for the question that you will ask the user or friends. It can be anything you like.
2. guess will store any user answer so that we can make it guess several time. The inside of the guess will only “ which means empty string and it can be used in the code later on.
3. Guess_count and guess_limit will keep track of our guesses, count start at 0 and the limit can be set to any number.
4. Out_of_guesses will be in false condition so when the guess_limit has been reached, it will be true.

```
secret_word = 'adcoin'
guess =""
guess_count = 0
guess_limit = 3
out_of_guesses = False
```

Your code should look just like in the example, along with the indents.

```
while guess != secret_word and not (out_of_guesses):
    if guess_count < guess_limit:
        guess = input(' What is the reward you get for completing your mission? : ')
        guess_count += 1
    else:
        out_of_guesses = True
```

To make the code able to take several guesses, we will need to use the while loop. For the first line, we want to make it keep looping as long as it is true. As long as the guess is not equal to the secret_word and also not out of guesses, the loop will keep on running.

Then we need to set some condition for the if statement. Right now, we need to set it so that if the number of guesses we make is less than the limit, it will continue asking the question. So for the guess variable inside the if statement, use input function and ask a question for the user. This part can be changed according to you. And for each input given, the guess_count supposed to increase by 1 for each iteration.

Once the count is more than the limit, the out_of_guesses will be true.

Setup for Win/Lose

```
while guess != secret_word and not (out_of_guesses):
```

This blocks of code will be outside of the while loop. The if out_of_guesses means that when the condition is true for that variable, it will print out the lose string. So once the guess count reached the limit, it will trigger this code.

For the else statement, once the guess variable is equal to the secret_word, it will print out the win string.

```
if out_of_guesses:
    print('Out of guesses, YOU LOSE! ')

else:
    print('YOU WIN!')
```

Finish.

You should get the result like in the example below in your terminal once you run it. Now you have your own guessing game in Python! – 250 adcoins

```
 What is the reward you get for completing your mission? : adcoin
YOU WIN!
```

```
 What is the reward you get for completing your mission? : hadvansa
 What is the reward you get for completing your mission? : diadwia
 What is the reward you get for completing your mission? : waidwadia
Out of guesses, YOU LOSE!
```

You can direct message your teacher and ask your question through Slack Robotene Community or arrange a One-to-One Consultation with your teacher.

Any Questions?

Thank you :)