

Assignment 01:

Introduction:

This document describes a simple script meant to practice Python concepts like inputs, printing, constants, variables and comments.

```
# ----- #
# Title: Assignment01
# Desc: This assignment demonstrates using constants, variables, and print()
# Change Log: (Soren 10/14/2024)
#   RRoot,10/14/2024, Created Script
#   Soren Nielsen,10/14/2024, Created Script
# ----- #

#establish course name
COURSE_NAME = "Python 100"

#prompt student for name input
student_first_name = input("What is your first name? ")
student_last_name = input("What is your last name? ")

#linebreak for visual clarity
print()

#prints the students name and their course
print("your name is: " + student_first_name + " "
      + student_last_name + ". You are registered for: " + COURSE_NAME)

#linebreak for visual clarity
print()

#print a second time with \n line breaks
print("your name is:\n " + student_first_name + " "
      + student_last_name + " \nYou are registered for:\n " + COURSE_NAME)
```

Fig. 1 The Completed Script

Outcomes

The module prompts the user to enter their first, then last names, which are stored as strings in variables and are printed to the console along with a message indicating their course assignment from the Course Name constant.

The Header

The header stores information in comment form such as the title of the document, a brief description, changes logs, when the script was created, and by whom.

The Constant

The variable `COURSE_NAME` stores a string with the name of the course "Python 100". The variable is written in all capital letters to indicate that it is a constant, or a variable that will not be changed.

The Inputs

The student's names are stored in first name and last name variables which are set to strings derived from two inputs by the user after a prompt which is written as a string in the input function. These variables are written in lowercase to indicate that the variable may be changed at runtime.

Line Breaks

Occasionally, line breaks are inserted using `Print()` with no string enclosed for visual clarity in the terminal. *Using Print | Python for Beginners [5 of 44]* (2019)

Output

Finally, the print function is used to output a sentence by concatenating written strings and the strings stored in variables to print the final message. Then the message is printed a second time but with `\n` inserted into the strings to add line breaks for each section of the message.

Comments

Throughout the document comments, which are indicated with a `#` symbol, are used to clarify the purpose of each individual line.

Testing:

The module was run in both the Mac OS Terminal and IDLE to confirm it functioned properly in both environments.

```
Mac-Pro:Dropbox lukenielsen$ cd "PYTHON COURSE"
Mac-Pro:PYTHON COURSE lukenielsen$ ls
Assignment01.py Zips      _Module01      m1 homework.py
Mac-Pro:PYTHON COURSE lukenielsen$ Python3 Assignment01.py
What is your first name? Soren
What is your last name? Nielsen

your name is: Soren Nielsen. You are registered for: Python 100

your name is:
  Soren Nielsen
You are registered for:
  Python 100
Mac-Pro:PYTHON COURSE lukenielsen$
```

Fig. 2 Testing in Terminal

```
>>>| ===== RESTART: /Volumes/Project Drive/Dropbox/PYTHON COURSE/Assignment01.py =====  
| What is your first name? Soren  
| What is your last name? Nielsen  
|  
| your name is: Soren Nielsen. You are registered for: Python 100  
|  
| your name is:  
|   Soren Nielsen  
| You are registered for:  
|   Python 100  
| ,
```

Fig3. Testing In IDLE

Summary:

This script demonstrates basic Python concepts such as variables, comments, functions, or strings, as well as some programming best practices such as line comments, naming conventions between constant variables and regular variables, and line breaks for legibility.

Works Cited:

Using Print | Python for Beginners [5 of 44] (2019). Available at:

<https://www.youtube.com/watch?v=FhoASwgqvZHK> (Accessed: 14 October 2024).