Introduction to Programming W6

Lists and dictionaries II.

2022/05/13

Exercise 6.1

Complete the program based on the instructional comments, and submit it to Manaba R+. You do not need to include the instructional comments. Do not forget to create the file header for your code (recheck the exercises resource for W3 if you are not certain what to include). The program description should explain what methods/techniques you used to complete the code. Note that you can use line breaks in the docstring part of your header! Name the file the following way:

ip_ex61_<student id number>.py, for example: ip_ex61_012345678-9.py

```
scientist_list_1 = ['Einstein', 'Curie', 'Newton', 'Darwin']
scientist_list_2 = ['Tesla', 'Galilei', 'Lovelace']
#merge the two list into one list called scientist_list
scientist_list =
#use a for loop and the append method to put the elements of scientist_list3
#into scientist_list
scientist_list_3 = ["Hawking", "Faraday"]
for scientist in scientist_list_3:
    scientist_list.
#print the length of scientist_list
print("Length of the scientist list:", len(scientist_list)) #at this point, this should print 9
#reverse the list called scientist_list and print it
scientist_list.
print("Reversed scientist list:", scientist_list)
#creating an empty dictionary called scientist_dict
scientist_dict = {} #you don't have to modify this line, just an empty dictionary at this point
#use enumerate on the scientist list, and put the indices and name of the scientists
#into scientist_dict, so keys are the name of scientists and values are the indices
for index, scientist in enumerate(scientist_list):
    scientist_dict[scientist] =
#update scientist_dict with the following dictionary called scientist_dict_2
scientist_dict_2 = {"Faraday":1, "Boyle":9}
scientist_dict.
#print the updated dictionary
print("The scientist dictionary:", scientist_dict)
#make a list called index_list from the values of scientist_dict by putting
#the values into the list constructor
index_list = list()
```

```
#use slicing to get the first 5 elements from index list and put them into the
#variable called numbers
numbers =
print("Numbers list:", numbers) #at this point, this should print [1, 1, 2, 3, 4]

#pop out the first element of the numbers list and store in in variable called one
one = numbers.

#use a for loop to check if the numbers in variable numbers are even or odd,
#and if you encounter an odd number, remove it from your list
for number in numbers:
    if (number % 2) != 0:
        numbers.

#print numbers
print("The numbers list filtered out of odd numbers:", numbers)

#print the maximum value of the list numbers
print("The maximum value in the numbers list:", )
```