Spring 2024: CS5720 Neural Networks & Deep Learning - ICP-2

Assignment-2

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GITHUB LINK: https://github.com/vishnutejaayyangar/ICP-2/tree/main

Videolink https://drive.google.com/file/d/1CVcXt-jFopen5nA7yGKD6TJZw9BK1QGc/view?usp=drive_link

1. Write a program that takes two strings from the user: first_name, last_name. Pass these variables to fullname function that should return the (full name). o For example: ▪ First_name = “your first name”, last_name = “your last name” ▪ Full_name = “your full name”

```
def Full_name(first_name="first name",last_name='last name'):# Here i have created Full name method by passing arguments first name and last name
    return first_name+' '+last_name # Here i have conacatinted both first name and last name which i have returned it as a string to the function
```

```
[22] first_name=input("Enter your first name:/n")# Used input function to accept a string from the user and stored in a variable
     last_name=input("Enter your last name:/n")
     full_name=Full_name(first_name,last_name)#passed variables to the function
     print(full_name)

     Enter your first name:/nRAJYALAKSHMI
     Enter your last name:/nGOTTIPATI
     RAJYALAKSHMI GOTTIPATI
```

Write function named “string_alternative” that returns every other char in the full_name string. Str = “Good evening” Output: Go vnn

```
[18] def string_alternative(string):
         o=''
         for i in range(0,len(string)):#Here i am iterating the string from 0 to the lenght of the string
             if(i%2==0):#Here i am taking each character and doing modulus with and equating to 0 so that we can get the all the alternate characters in th
                 o=o+string[i]# Here i am adding empty string to the list of characters according the index so that we can return the string and then print
         return o
     string_alternative('Good evening')#called the function by passing "Good Evening" as a string.
```

```
'Go vnn'
```

Write a python program to find the wordcount in a file (input.txt) for each line and then print the output. o Finally store the output in output.txt file.

```
with open('input_file.txt','r') as ipf:#created a file named input_file and used read and split functions to read the file and split the words into s
    line=ipf.read()
    word=line.split()
    with open('output_file.txt','w') as opf:
        for i in word: # Here i have iterated through word variable where the split of words are returned
            opf.write(i+':'+str(word.count(i))+'\n')
opf=open('output_file.txt','r')
print(opf.read())
```

```
Python:1
Course:2
Deep:1
Learning:1
Course:2
```

. Write a program, which reads heights (inches.) of customers into a list and convert these heights to centimeters in a separate list using:

1) Nested Interactive loop.

```
# Nested interactive loop
heights=[]# Empty List

while True:
    x=float(input())
    if(x<=0):
        break
    heights.append(x)#this is in inches
```

```
6
4
3
0
```

2) List comprehensions

```
output=[x*2.54 for x in heights]
print(output)#this is in cm
```

```
[15.24, 10.16, 7.62]
```