ICP-2 Neural Networks

Name: Vinaykumargoud kothapally
Student Id: 700757217

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).
   - For example:
     - First_name = “your first name”, last_name = “your last name”
     - Full_name = “your full name” ○ Write function named “string_alternative” that returns every other char in the full_name string. Str = “**Goo**d e**v**e**n**i**n**g”
     Output: Go vnn

   Note: You need to create a function named “string_alternative” for this program and call it from main function.

   CODE

```
first_name = input("Enter your first name: ")
last_name = input("Enter your last name: ")
full_name = first_name + " " + last_name

alternate_chars = full_name[::2]

print("Full Name:", full_name)
print("Alternate Characters:", alternate_chars)
```

```
Enter your first name: keerthi
Enter your last name: reddy
Full Name: keerthi reddy
Alternate Characters: ketirdy
```

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

   Example:

   Input: a file includes two lines:

   Python Course

   Deep Learning Course

   Output:

   Python Course
   Deep Learning Course Word_Count:

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

CODE

```
text = open("input.txt", "r")
d = dict()
for line in text:
  line = line.strip()
  line = line.lower()
  words = line.split(" ")
  for word in words:

        if word in d:

            d[word] = d[word] + 1
        else:

            d[word] = 1


for key in list(d.keys()):
    print(key, ":", d[key])
```

```
python : 1
course : 2
deep : 1
learning : 1
```

3. 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.
   2) List comprehensions

Example: **L1: [150,155, 145, 148]**
Output: [68.03, 70.3, 65.77, 67.13]

CODE

```python
lst1 = []
n = int(input("enter number of customers: "))
for i in range(n) :
  height = int(input ("Enter the height of customers in inches: "))
  lst1.append(height)
lst1 = [height * 2.54 for height in lst1]
print(lst1)
```

```
enter number of customers: 3
Enter the height of customers in inches: 145
Enter the height of customers in inches: 155
Enter the height of customers in inches: 150
[368.3, 393.7, 381.0]
```