Machine Learning (Assignment 2)

Jagadeeswar Chimata

700731649

Question 1: Python code to display the star pattern using the for loop.

```
In [1]: #Question 1

        def pattern(n):

            for i in range (1, n+1):
                for j in range (1, i+1):
                    print (" *",end=" ")
                print()

            for i in range (n, 1, -1):
                    for j in range (i, 1, -1):
                        print (" *",end=" ")
                    print()
        pattern(5)
```
```
 *
 *  *
 *  *  *
 *  *  *  *
 *  *  *  *  *
 *  *  *  *
 *  *  *
 *  *
 *
```

Question 2: looping to output the elements from a provided list present at odd indexes.

```
In [3]: #Question 2

        my_list = [10, 20, 30, 40, 50, 60, 70, 80, 90, 100]
        my_list[::2]

Out[3]: [10, 30, 50, 70, 90]
```

Question 3:

```
In [4]: #Question 3

        n = [23, 'Python', 23.98]
        m=n
        print(m)
        print(type(n[0]),type(n[1]),type(n[2]))

        [23, 'Python', 23.98]
        <class 'int'> <class 'str'> <class 'float'>
```

Question 4: A function that takes a list and returns a new list with unique items of the first list.

```
In [2]: #Question 4

        d = [1,2,3,3,3,3,4,5]
        output = []
        for x in d:
            if x not in output:
                output.append(x)
        print(output)

        [1, 2, 3, 4, 5]
```

Question 5: A function that accepts a string and calculate the number of upper-case letters and lower-case letters.

```
In [5]: #Question 5

        b='The quick Brow Fox'
        a=sum(1 for c in b if c.isupper())
        print("No. of Upper-case characters:",a)
        c=sum(1 for c in b if c.islower())
        print("No. of Lower-case Characters:",c)

        No. of Upper-case characters: 3
        No. of Lower-case Characters: 12
```

Git repo link:

https://github.com/JagadeeswarChimata/ML-Assignment-2.git