



Python for Data Science - 2305CS303

Lab - 5 Part-2

Roll No. : 135

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1. WAP to create a list of squared numbers from 0 to 9 with and without using List Comprehension.

```
In [44]: l1 = []  
for i in range(9):  
    l1.append(i*i)  
l1
```

```
Out[44]: [0, 1, 4, 9, 16, 25, 36, 49, 64]
```

```
In [43]: l1 = [i*i for i in range (9)]  
l1
```

```
Out[43]: [0, 1, 4, 9, 16, 25, 36, 49, 64]
```

2. WAP to find Maximum and Minimum K elements in a given tuple.

```
In [29]: t1 = (1,5,67,95,45,78,10)  
t2=sorted(t1)  
k = int(input("Enter Number : "))  
print(t2[0:k])  
print(t2[-k:])
```

```
[1, 5]  
[78, 95]
```

3. WAP to find tuples which have all elements divisible by K from a list of tuples.

```
In [45]: l3 = [(2,4,6),(8,12,16),(19,13,15)]  
k = int(input("Enter Number : "))  
flag = 1  
for i in l3:
```

```
for j in i:
    if j%k==0:
        flag=1
    else:
        flag=0
        break
if flag==1:
    print(i)
```

(2, 4, 6)
(8, 12, 16)

4. WAP to create a list of tuples from given list having number and its cube in each tuple.

```
In [41]: l1 = [1, 2, 3, 4, 5]
l2 = [(num, num**3) for num in l1]
print(l2)
```

[(1, 1), (2, 8), (3, 27), (4, 64), (5, 125)]

5. WAP to remove tuples of length K.

```
In [3]: l3 = [(2,4,6),(8,12,16),(19,13)]
k = 2
ans = [i for i in l3 if len(i) != k]
ans
```

Out[3]: [(2, 4, 6), (8, 12, 16)]

In []: