

Name : Neha Dumane

Roll no: 2201046

Div: A

1. Write a program to perform following operations on list

1. Sum all the items in a list.
2. Get the largest number from a list.
3. Remove duplicates from a list.
4. Separate positive and negative number from a list.
5. Filter even and odd number from a list.

**Code:**

```
num = [1,-2,4,8,5,2,4,7,-3,5]
```

```
#sum of elements in list
```

```
sum = 0
```

```
for i in range(len(num)):
```

```
    sum = sum + num[i]
```

```
print("Sum of elements in list:",sum)
```

```
#Largest number in list
```

```
print("Largest number in list is:",max(num))
```

```
#remove duplicates from list

final_list = []

for i in num:

    if i not in final_list:

        final_list.append(i)

print("List after removing duplicates:",final_list)
```

```
#separate positive and negative number in list

pos_list = []

neg_list = []

for i in range(len(num)):

    if(num[i]>0):

        pos_list.append(num[i])

    else:

        neg_list.append(num[i])

print("Positive numbers list:",pos_list)

print("Negative numbers list:",neg_list)
```

```
#filter even and odd number from list

evenlist = []

oddlist = []

for i in num:
```

```
if (i % 2 == 0):  
    evenlist.append(i)  
else:  
    oddlist.append(i)  
print("Even list:", evenlist)  
print("Odd list:", oddlist)
```

**Output:**

Sum of elements in list: 31

Largest number in list is: 8

List after removing duplicates: [1, -2, 4, 8, 5, 2, 7, -3]

Positive numbers list: [1, 4, 8, 5, 2, 4, 7, 5]

Negative numbers list: [-2, -3]

Even list: [-2, 4, 8, 2, 4]

Odd list: [1, 5, 7, -3, 5]