

In [4]:

```
#Write a Python program to check if all dictionaries in a list are empty or not.
```

In [9]:

```
#Solution
my_list1 = [{},{},{}]
my_list2 = [{123,2345},{},{}]
print(all(not d for d in my_list1))
print(all(not d for d in my_list2))
```

True
False

In [6]:

```
#Write a Python program to remove duplicates from a list of lists.
```

In [8]:

```
#Solution
import itertools
num = [[110, 120], [240], [330, 456, 425], [310, 220], [133], [240]]
print("Original List", num)
num.sort()
new_num = list(num for num,_ in itertools.groupby(num))
print("New List", new_num)
```

Original List [[110, 120], [240], [330, 456, 425], [310, 220], [133], [240]]

New List [[110, 120], [133], [240], [310, 220], [330, 456, 425]]

In [10]:

```
#Write a Python program to extend a list without append.
```

In [11]:

```
#solution
x = [103, 320, 430]
y = [403, 503, 603]
x[:0] = y
print(x)
```

[403, 503, 603, 103, 320, 430]

In [12]:

```
#Write a Python program to find the List in a List of Lists whose sum of elements is the highest
```

In [13]:

```
#solution
num = [[1,2,3], [4,5,6], [10,11,12], [7,8,9]]
print(max(num, key=sum))

[10, 11, 12]
```

In [14]:

```
#Write a Python program to access dictionary key's element by index.
```

In [16]:

```
#solution
num = {'stats': 80, 'math': 90, 'algorithm': 86}
print(list(num)[0])

stats
```

In [17]:

```
#Write a Python program to iterate over two lists simultaneously.
num = [1, 2, 3]
color = ['red', 'while', 'black']
for (a,b) in zip(num, color):
    print(a, b)
```

```
1 red
2 while
3 black
```

In [18]:

```
#write a program to inser a string at the begining of every elements in a list
```

In [22]:

```
#solution
a = [100,123,345,567,789,890,98,876,543,678]

#enter customer before each element
print(['customer{0}'.format(i) for i in a])

['customer100', 'customer123', 'customer345', 'customer567', 'customer78
9', 'customer890', 'customer98', 'customer876', 'customer543', 'customer67
8']
```

In [23]:

```
# write a program to take two lists and print if they have at least one common member
```

In [24]:

```
#solution
def common_data(list1, list2):
    result = False
    for x in list1:
        for y in list2:
            if x == y:
                result = True
    return result
print(common_data([121,222,332,432,125], [125,236,457,678,779]))
print(common_data([1,2,3,4,5], [6,7,8,9]))
```

True

None

In [25]:

```
# compute all permutations in a list
```

In [26]:

```
#solution
import itertools
print(list(itertools.permutations([12,22,23])))
```

```
[(12, 22, 23), (12, 23, 22), (22, 12, 23), (22, 23, 12), (23, 12, 22), (23, 22, 12)]
```

In []: