

# Python List

List :

List is a user define data type that can store multiple values of different type or same type.

Items are separated by comma-separator in between square brackets.

```
list1=[123,"Amit",23]
```

items stored based on the index.

Index start from 0 to n-1 or reverse index start from -1 to number of items.

Accessing value from list:

```
list1=[123,"Amit",23,'M',"Delhi"]
```

```
list1[2]
```

```
list[2:4]
```

Updating a list :

```
List1[1]="Ramesh"
```

Delete elements from list:

```
del list1[3] == > to delete particular element from a list
```

```
del list1 == > to delete whole list
```

Basic list operations:

1. len()

```
x= len(list1)
```

2. list1=[123,"Amit"]

```
list2=[23,"Delhi"]
```

```
list3= list1+list2
```

# Python List

3. `list3 *2`
4. `"Amit" in list3`
5. `for x in list3 : print(x)`

## Built-in list functions :11

1. `len(list1)`
2. `cmp(list1,list2)` not in python 3
3. `max(list1)` note : for that items must be same type
4. `min(list1)` note : for that items must be same type
5. `list(tup) == >` convert a tuple into list

## Methods :

1. `list.append(obj)`
2. `list.count(obj) == >` count how many times a object occurs in a list
3. `list.extend(seq) == >` append the content of seq to list.  
Seq is the list of elements
4. `list.index(obj)`
5. `list.insert(index, obj)`  
insert obj at specified index
6. `list.pop(index) = =>` return and remove object from specified index
7. `list.remove(obj)`
8. `list.reverse()`
9. `list.sort()`  
`list.clear() == >` clear the list