#### LENGUAJES y HERRAMIENTA PARA CIENCIAS DE DATOS I

Listas I Métodos principales







# Definición y acceso

- Definición
  - lista = [1, 2, 3, 4]
- Acceso
  - lista[index]
- Recorrido
  - for

```
mluque@hydrogen:
File Edit View Search Terminal Help
mluque@hydrogen:~$ python3
Python 3.6.9 (default, Jan 26 2021, 15:33:00)
[GCC 8.4.0] on linux
Type "help", "copyright", "credits" or "license"
>>> lista = [1, 2, 3]
>>> lista[0]
>>> for i in lista:
        print(i)
```



### Añadir elementos

- append (*elemento*)
- insert (posición, elemento)
- extend (iterable)

```
>>> lista = [1, 2, 3]
>>> lista.extend([4, 5, 6])
>>> lista
[1, 2, 3, 4, 5, 6]
>>> lista.extend(range(5))
>>> lista
[1, 2, 3, 4, 5, 6, 0, 1, 2, 3, 4]
>>> lista
```



#### Eliminar elementos

- remove(*elemento*)
- pop([posición])
- o clear()

```
>>> lista = ['a', 'b', 'c', 'd', 'e', 'b', 'c']
>>> lista.remove('b')
>>> lista
['a', 'c', 'd', 'e', 'b', 'c']
>>> lista.pop()
'c'
>>> lista
['a', 'c', 'd', 'e', 'b']
>>> lista.pop(0)
'a'
>>> lista
['c', 'd', 'e', 'b']
>>> lista
['c', 'd', 'e', 'b']
>>> lista
```



### Obtener información

• index(elemento, [inicio, [fin]])

```
>>> lista = ['a', 'b', 'c', 'd', 'e', 'b', 'c']
>>> lista.index('b')
1
>>> lista.index('b',2)
5
>>> lista.index('b',2,4)
Traceback (most recent call last):
   File "<stdin>", line 1, in <module>
ValueError: 'b' is not in list
```

• count(elemento)

```
>>> lista = ['a', 'b' ,'c', 'd', 'e', 'b','c']
>>> lista.count('b')
2
>>>
```



## Misceláneos

- sort(\*,key=None, reverse=False)
- o reverse()
- o copy()

```
>>> lista = ['a', 'b' ,'c', 'd', 'e', 'b','c']
>>> lista.sort()
>>> lista
['a', 'b', 'b', 'c', 'c', 'd', 'e']
>>> lista.sort(reverse=True)
>>> lista
['e', 'd', 'c', 'c', 'b', 'b', 'a']
>>> lista.reverse()
>>> lista
['a', 'b', 'b', 'c', 'c', 'd', 'e']
>>> c=lista.copy()
>>> c
['a', 'b', 'b', 'c', 'c', 'd', 'e']
>>> c
```



