```
import numpy as np

# Creating a numpy array

a=[2,4,6,8,10]
b=np.array(list)

b
O/P: array([2,4,6,8,10])

a
O/P: [2,4,6,8,10]

type(a)
O/P: list
```

type(b)

o/p: numpy.ndarray

list1=a

arr1=b

list1+1

↳ Error

~~array~~ arr1+1

o/p array([3,5,7,9,11])

list2 = [[9,0,4,6],
[4,6,2,1]]

arr2 = np.array(list2)

arr2

o/p: array([[9,0,4,6],
[4,6,2,1]])

#float array

arr2=np.array(list2, dtype='float')

arr2

o/p: array([[9. ,0. ,4. ,6.],
[4. ,6. ,2. ,1.]])

#bloor to int again

```
arr3 = arr2.astype('int')
arr3
O/P: array([[9,0,4,6],
            [4,6,2,1]])

arr4 = np.array(list2, dtype='bool')
arr4
op: array([[True, False, True, True,]
           [True, True, True, True]])

list2
op: [[9,0,4,6], [4,6,2,1]]

# object array [int, float etc in single array]
arr5 = np.array([2, 5, 2.0, 'Y'], dtype='object')

array5
O/P: array([2,5, 2.0, 'Y'], dtype=object)
# arr5 to list
list3 = arr5.tolist()

list3
O/P: [2,5,2.0,'Y']

type(arr5)
O/P: numpy.ndarray
```

type(list3)
o/p: list