

```
In [3]: import numpy as np
        from numpy.random import randn
        np.set_printoptions(precision=2)
```

```
In [5]: a = np.array([1,2,3,4,5,6])
        a
```

```
Out[5]: array([1, 2, 3, 4, 5, 6])
```

```
In [8]: b = np.array([[10,20,30],[40,50,60]])
        b
```

```
Out[8]: array([[10, 20, 30],
               [40, 50, 60]])
```

```
In [9]: np.random.seed(25)
        c = 36*np.random.randn(6)
        c
```

```
Out[9]: array([ 8.22, 36.97, -30.23, -21.28, -34.45, -8.  ])
```

```
In [11]: d = np.arange(1,8)
        d
```

```
Out[11]: array([1, 2, 3, 4, 5, 6, 7])
```

```
In [12]: a*19
```

```
Out[12]: array([ 19, 38, 57, 76, 95, 114])
```

```
In [13]: c*a
```

```
Out[13]: array([ 8.22, 73.94, -90.68, -85.13, -172.24, -48.02])
```

```
In [23]: aa = np.array([[1,4,2],[23,2,9],[92,24,5]])
        aa
```

```
Out[23]: array([[ 1,  4,  2],
               [23,  2,  9],
               [92, 24,  5]])
```

```
In [19]: bb = np.array([[1,4,2],[4,2,9],[22,24,5]])
        bb
```

```
Out[19]: array([[ 1,  4,  2],
               [ 4,  2,  9],
               [22, 24,  5]])
```

```
In [24]: aa*bb
```

```
Out[24]: array([[ 1, 16,  4],  
               [ 92,  4, 81],  
               [2024, 576, 25]])
```

```
In [27]: np.dot(aa,bb)
```

```
Out[27]: array([[ 61,  60,  48],  
               [229, 312, 109],  
               [298, 536, 425]])
```