In [1]:
```python
a=5.0
print(id(a))
```

```
140597508389840
```

In [6]:
```python
a=12.0
b=5.0

print(a+b)
print(a-b)
print(a*b)

a=3.0
print(a/b)
print(a%b)
print(a//b)
print(a**b)


a=14
b=-9
print(a%b)
```

```
17.0
7.0
60.0
0.6
3.0
0.0
243.0
-4
```

In [11]:
```python
a=3.63
b=14.76

print(a>b)
print(a<b)
print(a>=b)

c=a
a=b
b=c
print(a<=b)
print(b)
```

```
False
True
False
False
3.63
```

In [12]:
```python
a=15.67
b=29.45
print(a==b)

a=b
print(a!=b)
```

False
False

In [15]:
```python
print(a and b)
print(0.0 and a)
print(a and 0.0)
print(0.0 and 0.0)

#OR
print(a or b)
print(0.0 or a)
print(b or 0.0)
print(0.0 or 0.0)

#not

print(not a)
print(not 0.0)
```

29.45
0.0
0.0
0.0
29.45
29.45
29.45
0.0
False
True

In [29]:
```python
a=10.0
b=10.0
c=a
print(a is b)
print(a is not b)
print(a is c)
print(id(a))
print(id(b))
print(id(c))
```

```
False
True
True
140597508635504
140597508634256
140597508635504
```

In [34]:
```python
print(2.7 in [1,2.4,4.5,2.7,"manu"])
print(2.7 not in {1,2.5,2.4,8.9})
print(3.56 in (8,4,3,5,6))
print(7.1 in range(10))
print(5.7 in {1:34,2.7:5.6,5.7:2.9})
```

```
True
True
False
False
True
```

In [ ]: