

```
class A:  
    x = 'class A'  
class B(A):  
    x = 'class B'  
class C(B):  
    x = 'class C'
```

class A:  
 x = 'class A'

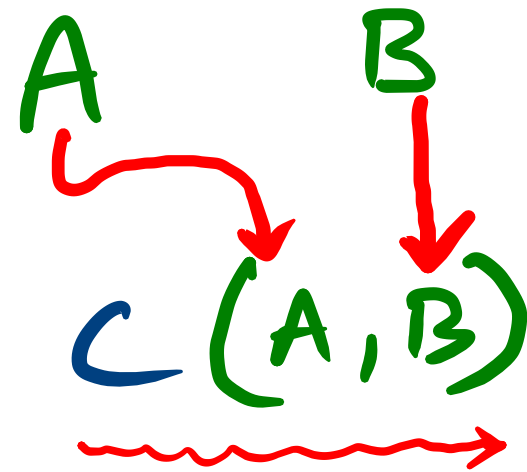
class B(A):  
 x = ~~'class A'~~  
 x = 'class B'

class C(B):  
 x = ~~'class B'~~  
 x = 'class C'

# Multiple-Inheritance

```
▶ class A:  
    x = 'class A'  
class B:  
    x = 'class B'  
class C(A,B):  
    x = 'class C'
```

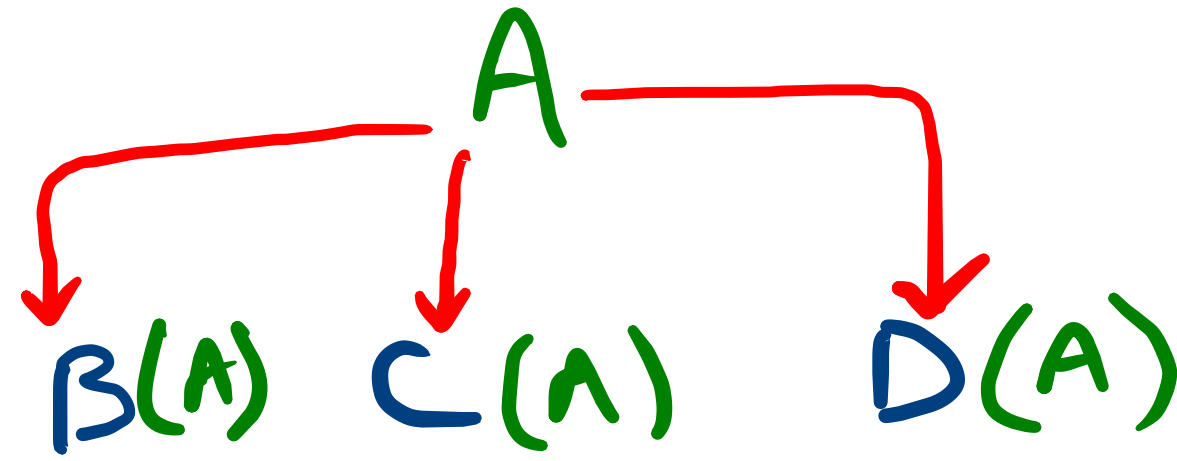
```
class A:  
    x = 'class A'  
class B:  
    x = 'class B'  
class C(A,B):  
    x = 'class C'
```



# Hierarchical Inheritance



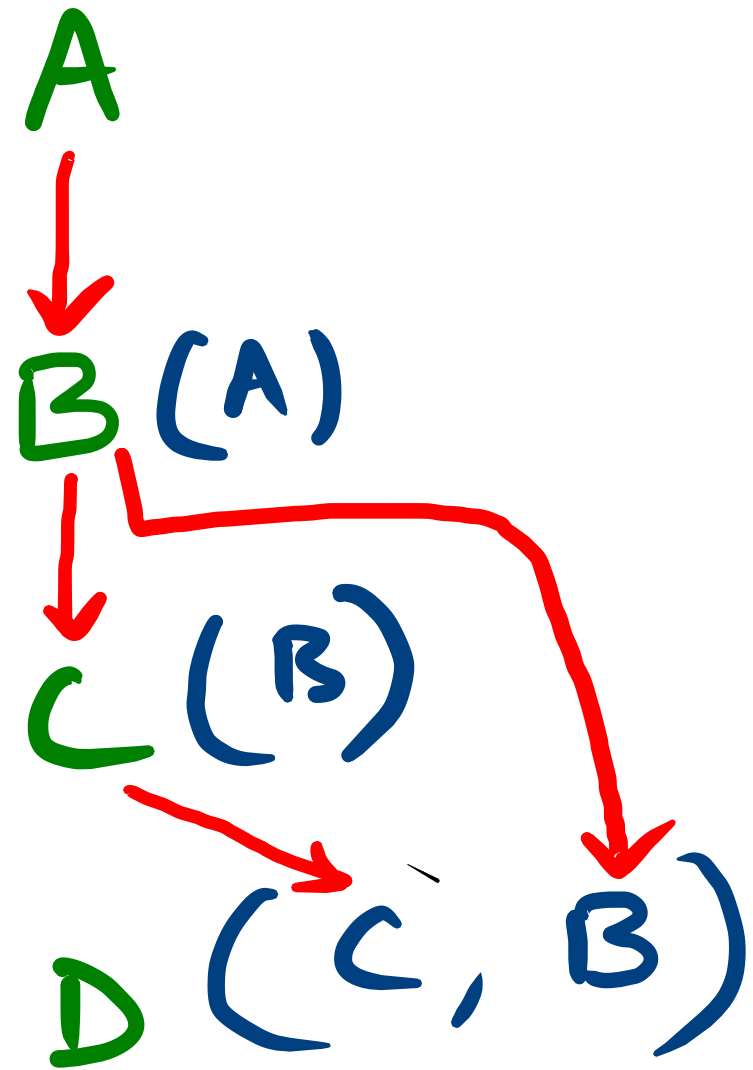
```
class A:  
    x = 'class A'  
class B(A):  
    x = 'class B'  
class C(A):  
    x = 'class C'  
class D(A):  
    x = 'class D'
```



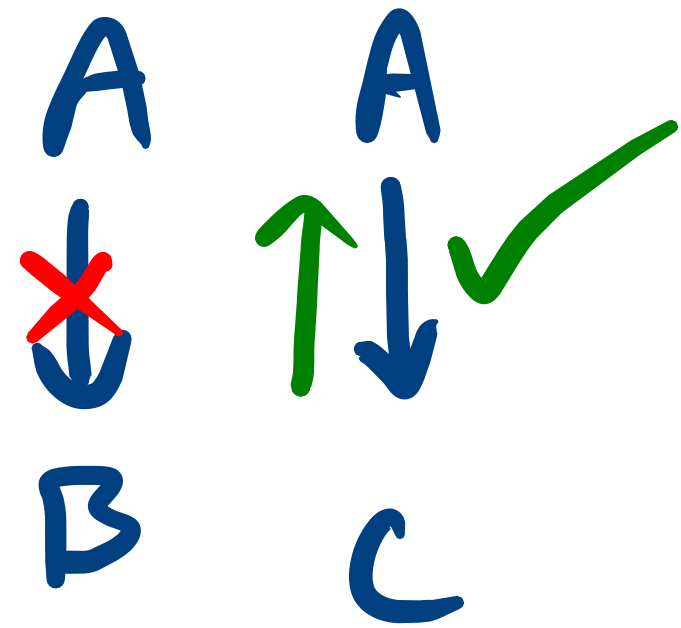
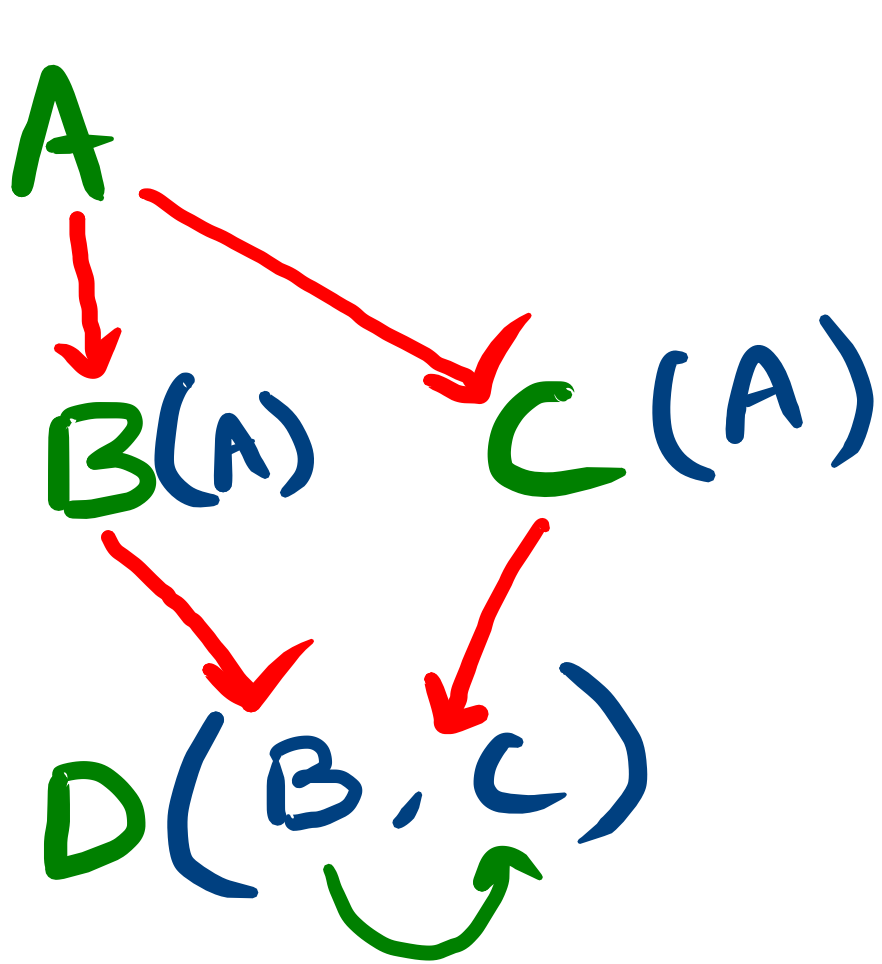
# Hybrid Inheritance

```
▶ class A:  
    x = 'class A'  
class B(A):  
    x = 'class B'  
class C(B):  
    x = 'class C'  
class D(C,B):  
    x = 'class D'  
  
print(D.x)
```

↳ class D



D → C → B → A



$D \rightarrow B \rightarrow A \rightarrow C \rightarrow A$  X

$D \rightarrow B \rightarrow A$  X

$D \rightarrow B \rightarrow C \rightarrow A$  ✓

$D \rightarrow B \rightarrow A \rightarrow C$  X

MRO : Method Resolution order