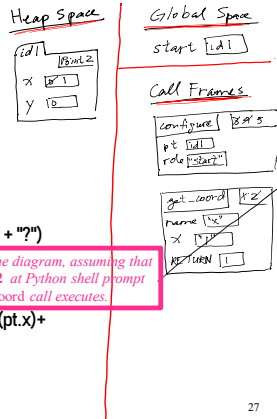## Drawing Frames for Helper Functions (5)

```
def get_coord(name):
1    x = input(name+": ")
2    return int(x)


def configure(pt, role):
3    print("Where does the line " + role + "?")
4    pt.x = get_coord("x")
5    pt.y = get_coord("y")
6    print("The line " +role+ "s at ("+str(pt.x)+
            ","+str(pt.y)+ ")." )
  start = shape.Point2(0,0)
  configure(start, "start")
```

To do: Finish the diagram, assuming that the user types 2 at Python shell prompt when this get_coord call executes.

Heap Space / Global Space / Call Frames (handwritten diagram)

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Drawing Frames for Helper Functions (5)

```
def get_coord(name):
1    x = input(name+": ")
2    return int(x)


def configure(pt, role):
3    print("Where does the line " + role + "?")
4    pt.x = get_coord("x")
5    pt.y = get_coord("y")
6    print("The line " +role+ "s at ("+str(pt.x)+
            ","+str(pt.y)+ ")." )
  start = shape.Point2(0,0)
  configure(start, "start")
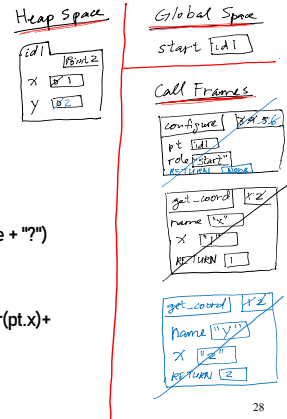```

Heap Space / Global Space / Call Frames (handwritten diagram)

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## Q2: what does the call stack look like at this point in the execution of the code?

```
def f3():
    print("f3")
def f2():
    print("f2")
    f3()
→   f3()
    f3()
def f1():
    print("f1")
    f2()
f1()
```

A	B	C	D	E
f1	f1	f1	f1	f1
f2	f2	f2	f2	
f3	f3	f3		
f3	f3			
f3				

Choose 1 stack; in that stack cross out any frames that should have ended.

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A2: what does the call stack look like at this point in the execution of the code?

```
def f3():
    print("f3")
def f2():
    print("f2")
    f3()
→   f3()
    f3()
def f1():
    print("f1")
    f2()
f1()
```

B
f1
f2
~~f3~~
~~f3~~

Choose 1 stack; in that stack cross out any frames that should have ended.

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Q3: what does the call stack look like at this point in the execution of the code?

```
def f3():
    print("f3")
def f2():
    print("f2")
    f3()
    f3()
    f3()
def f1():
    print("f1")
→   f2()
f1()
```

A	B	C	D	E
f1	f1	f1	f1	f1
f2	f2	f2	f2	
f3	f3	f3		
f3	f3			
f3				

Choose 1 stack; in that stack cross out any frames that should have ended.

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A3: what does the call stack look like at this point in the execution of the code?

```
def f3():
    print("f3")
def f2():
    print("f2")
    f3()
    f3()
    f3()
def f1():
    print("f1")
→   f2()
f1()
```

A
f1
~~f2~~
~~f3~~
~~f3~~
~~f3~~

Choose 1 stack; in that stack cross out any frames that should have ended.

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