



Bookmar



Bookmark

- Overview
- Entrance Survey
- Week 1
- Week 2
- Week 3
- Week 4
- Quiz
- Week 5
- Week 6
- Week 7
- Week 8
- Exit Survey
- ▼ Final Exam
- Sandbox

Final Exam

Final due Mar 15, 2016
at 23:30 UTC 

Final Exam > Final Exam > Problem 5

Problem 5

In this problem, you will implement a class according to the specifications in the template file `usresident.py`. The file contains a `Person` class similar to what you have seen in lecture and a `USResident` class (a subclass of `Person`). `Person` is already implemented for you and you will have to implement two methods of `USResident`.

For example, the following code:

```
a = USResident('Tim Beaver', 'citizen')
print a.getStatus()
b = USResident('Tim Horton', 'non-resident')
```

will print out:

```
citizen
## will show that a ValueError was raised at a particular line
```

`usresident.py`

```
## DO NOT MODIFY THE IMPLEMENTATION OF THE Person CLASS ##
class Person(object):
    def __init__(self, name):
        #create a person with name name
        self.name = name
        try:
            firstBlank = name.rindex(' ')
            self.lastName = name[firstBlank+1:]
        except:
            self.lastName = name
        self.age = None
    def getLastName(self):
        #return self's last name
        return self.lastName
    def setAge(self, age):
        #assumes age is an int greater than 0
        #sets self's age to age (in years)
```

```

        self.age = age
    def getAge(self):
        #assumes that self's age has been set
        #returns self's current age in years
        if self.age == None:
            raise ValueError
        return self.age
    def __lt__(self, other):
        #return True if self's name is lexicographically less
        #than other's name, and False otherwise
        if self.lastName == other.lastName:
            return self.name < other.name
        return self.lastName < other.lastName
    def __str__(self):
        #return self's name
        return self.name

class USResident(Person):
    """
    A Person who resides in the US.
    """
    def __init__(self, name, status):
        """
        Initializes a Person object. A USResident object
        inherits
        from Person and has one additional attribute:
        status: a string, one of "citizen", "legal_resident",
        "illegal_resident"
        Raises a ValueError if status is not one of those 3
        strings
        """
        # Write your code here

    def getStatus(self):
        """
        Returns the status
        """
        # Write your code here

```

Paste only your implementation of the `USResident` class in the box below. Do not leave any debugging print statements.

For this question, you will not be able to see the test cases we run. This problem will test your ability to come up with your own test cases.

1 # Paste here

Unanswered

You have used 0 of 10 submissions

© All Rights Reserved



© edX Inc. All rights reserved except where noted. EdX, Open edX and the edX and Open EdX logos are registered trademarks or trademarks of edX Inc.

POWERED BY
OPENedX

