course_1_assessment_7

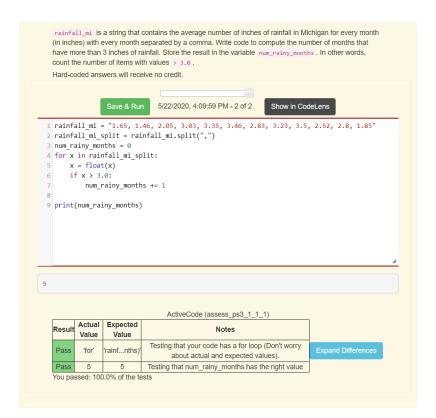## Due: 2018-11-25 01:21:00

Description: Assessment for Way of Programmer Week 3.   Score: 0 of 5 = 0.0%
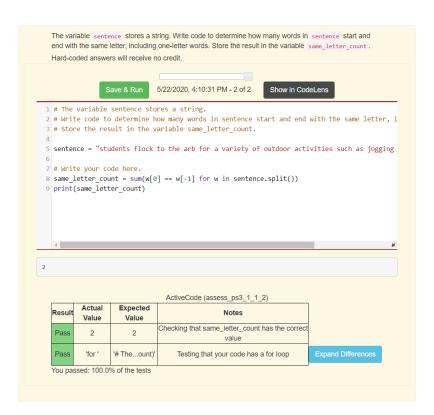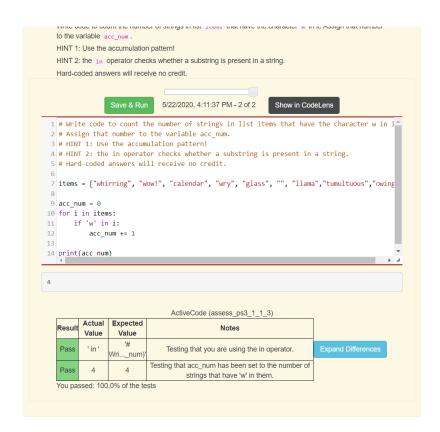
Questions
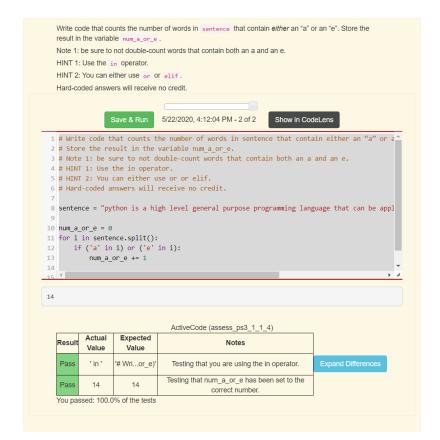
Not yet graded

rainfall_mi is a string that contains the average number of inches of rainfall in Michigan for every month (in inches) with every month separated by a comma. Write code to compute the number of months that have more than 3 inches of rainfall. Store the result in the variable num_rainy_months . In other words, count the number of items with values > 3.0 .

Hard-coded answers will receive no credit.

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```
1  rainfall_mi = "1.65, 1.46, 2.05, 3.03, 3.35, 3.46, 2.83, 3.23, 3.5, 2.52, 2.8, 1.85"
2  rainfall_mi_split = rainfall_mi.split(",")
3  num_rainy_months = 0
4  for x in rainfall_mi_split:
5      x = float(x)
6      if x > 3.0:
7          num_rainy_months += 1
8
9  print(num_rainy_months)
```

5

ActiveCode (assess_ps3_1_1_1)

Result	Actual Value	Expected Value	Notes	
Pass	'for'	'rainf...nths)'	Testing that your code has a for loop (Don't worry about actual and expected values).	Expand Differences
Pass	5	5	Testing that num_rainy_months has the right value	

You passed: 100.0% of the tests

Not yet graded

The variable sentence stores a string. Write code to determine how many words in sentence start and end with the same letter, including one-letter words. Store the result in the variable same_letter_count .

Hard-coded answers will receive no credit.

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```
1  # The variable sentence stores a string.
2  # Write code to determine how many words in sentence start and end with the same letter, i
3  # Store the result in the variable same_letter_count.
4
5  sentence = "students flock to the arb for a variety of outdoor activities such as jogging
6
7  # Write your code here.
8  same_letter_count = sum(w[0] == w[-1] for w in sentence.split())
9  print(same_letter_count)
```

2

ActiveCode (assess_ps3_1_1_2)

Result	Actual Value	Expected Value	Notes	
Pass	2	2	Checking that same_letter_count has the correct value	
Pass	'for '	'# The...ount)'	Testing that your code has a for loop	Expand Differences

You passed: 100.0% of the tests

Not yet graded

Write code to count the number of strings in list items that have the character .. in it. Assign that number

Write code to count the number of strings in list `items` that have the character `w` in it. Assign that number to the variable `acc_num`.

HINT 1: Use the accumulation pattern!

HINT 2: the `in` operator checks whether a substring is present in a string.

Hard-coded answers will receive no credit.

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```
1  # Write code to count the number of strings in list items that have the character w in i
2  # Assign that number to the variable acc_num.
3  # HINT 1: Use the accumulation pattern!
4  # HINT 2: the in operator checks whether a substring is present in a string.
5  # Hard-coded answers will receive no credit.
6
7  items = ["whirring", "wow!", "calendar", "wry", "glass", "", "llama","tumultuous","owing
8
9  acc_num = 0
10 for i in items:
11     if 'w' in i:
12         acc_num += 1
13
14 print(acc num)
```

4

ActiveCode (assess_ps3_1_1_3)

Result	Actual Value	Expected Value	Notes	
Pass	' in '	'# Wri..._num)'	Testing that you are using the in operator.	Expand Differences
Pass	4	4	Testing that acc_num has been set to the number of strings that have 'w' in them.	

You passed: 100.0% of the tests

Not yet graded

Write code that counts the number of words in `sentence` that contain *either* an "a" or an "e". Store the result in the variable `num_a_or_e`.

Note 1: be sure to not double-count words that contain both an a and an e.

HINT 1: Use the `in` operator.

HINT 2: You can either use `or` or `elif`.

Hard-coded answers will receive no credit.

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```
1  # Write code that counts the number of words in sentence that contain either an "a" or a
2  # Store the result in the variable num_a_or_e.
3  # Note 1: be sure to not double-count words that contain both an a and an e.
4  # HINT 1: Use the in operator.
5  # HINT 2: You can either use or or elif.
6  # Hard-coded answers will receive no credit.
7
8  sentence = "python is a high level general purpose programming language that can be appl
9
10 num_a_or_e = 0
11 for i in sentence.split():
12     if ('a' in i) or ('e' in i):
13         num_a_or_e += 1
14
15
```

14

ActiveCode (assess_ps3_1_1_4)

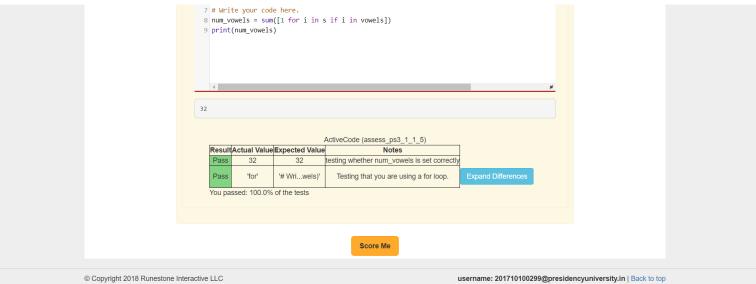| Result	Actual Value	Expected Value	Notes	
Pass	' in '	'# Wri...or_e)'	Testing that you are using the in operator.	Expand Differences
Pass	14	14	Testing that num_a_or_e has been set to the correct number.	

You passed: 100.0% of the tests

Not yet graded

Write code that will count the number of vowels in the sentence `s` and assign the result to the variable `num_vowels`. For this problem, vowels are only a, e, i, o, and u. Hint: use the `in` operator with `vowels`.

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```
1  # Write code that will count the number of vowels in the sentence s and assign the result
2  # For this problem, vowels are only a, e, i, o, and u. Hint: use the in operator with vowe
3
4  s = "singing in the rain and playing in the rain are two entirely different situations but
5  vowels = ['a','e','i','o','u']
6
```

```
7 # Write your code here.
8 num_vowels = sum([1 for i in s if i in vowels])
9 print(num_vowels)
```

32

ActiveCode (assess_ps3_1_1_5)

Result	Actual Value	Expected Value	Notes	
Pass	32	32	testing whether num_vowels is set correctly	
Pass	'for'	'# Wri...wels)'	Testing that you are using a for loop.	Expand Differences

You passed: 100.0% of the tests

Score Me