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Com S 127x  
10/12/2016  
Group quiz

1. Trace the execution of the call `mystery(5)` and fill in the values of the variables at the end of each iteration of the loop. Finally, fill in the value returned by the function.

	<code>count</code>	<code>p</code>	<code>sum</code>
(Initial values)	n/a	1	0
First iteration			
Second iteration			
Third iteration			
Fourth iteration			
Fifth iteration			
(Return value)			

```
def mystery(n):  
    p = 1  
    sum = 0  
    for count in range(n):  
        p = p * 2  
        sum = sum + p  
    return sum
```

2. Write a function `fraction_sum(n)` that, for any positive `n`, returns the sum of the numbers

$$1 + 1/2 + 1/3 + 1/4 + \dots + 1/n$$

For example, the call `fraction_sum(3)` returns approximately 1.833 (the decimal approximation of  $1 + 1/2 + 1/3$ )