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AS Lab Exam
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1- Write a python program to demonstrate HTML Parsing

```
 GNU nano 2.2.6                File: htmlparser.py

#!/usr/bin/python

from HTMLParser import HTMLParser

class MyHTMLParser(HTMLParser):
        def handle_starttag(self, tag, attrs):
                print ("start tag:", tag)
        def handle_endtag(self, tag):
                print ("start tag: ", tag)
#       def handle_starttag(self, data):
#               print ("start tag: ", data)
parser = MyHTMLParser()
parser.feed('<html><head><tit>leTest</title></head><body>' '<h1>Parse me !!! </h1></bo$
```

Output:

```
root@kali: ~   root@kali: ~   root@kali: ~
root@kali:~# chmod +x htmlparser.py
root@kali:~# ./htmlparser.py
('start tag:', 'html')
('start tag:', 'head')
('start tag:', 'tit')
('start tag: ', 'title')
('start tag: ', 'head')
('start tag:', 'body')
('start tag:', 'h1')
('start tag: ', 'h1')
('start tag: ', 'body')
('start tag: ', 'html')
root@kali:~#
```

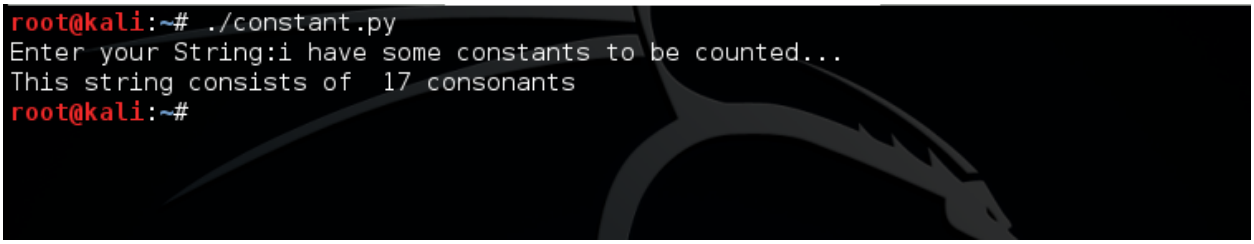
2- write a function named count_consonants that receives a string as parameter and returns the total count of the consonants in the string. Consonants are all the characters in the english alphabet except for 'a', 'e', 'i', 'o', 'u'. If the same consonant repeats multiple times you should count all of them. Note that capitalization and punctuation does not matter here i.e. a lower case character should be considered the same as an upper case character.

```
  GNU nano 2.2.6                File: constant.py

#!/usr/bin/python
#import io
#import sys
def main():
   mystr = raw_input("Enter your String:")
   mystr.lower()
   #index = 0, index is useless here
   constSet = set(['b','c','d','f','g','h','j','k','l','m','n','p','q','r','s','t','v'$
#   vowelSet = set(['a','e','i','o','u'])
   #vowels = 0, vowels is useless here
   #consonants = 0, consonants is useless here

   #Either pass vowelSet as argument or define them explicitly in the methods
#   runVowels(mystr, vowelSet)
   runConsonants(mystr, constSet)

#def runVowels(mystr, vowelSet):
    #index, vowels needs to be defined and assigned a default value here
#    index = 0
```

```
   runConsonants(mystr, constSet)
def runConsonants(mystr, constSet):
    #index, consonants needs to be defined and assigned a default value here
    index = 0
    consonants = 0
    while index < len(mystr):
        if mystr[index] in constSet:
            consonants += 1
          # You need to increment index outside of the condition
        index += 1
    print 'This string consists of ' , consonants , 'consonants'
```

```
        index += 1
    print 'This string consists of ' , consonants , 'consonants'

main()
```

Output:


root@kali:~# ./constant.py
Enter your String:i have some constants to be counted...
This string consists of 17 consonants
root@kali:~#