PYTHON STRINGS MODULE - 28

DISTANCE LEARNING PROGRAMME
THROUGH E-MODULE BY
ATOMIC ENERGY EDUCATION SOCIETY
MUMBAI

Contents of Module 28

In this module learning outcomes are:

- 1. Python Program to Count the Number of Vowels in a String
- Python Program to Calculate the Number of Words and the Number of Characters Present in a String
- Python Program to Calculate the Number of Digits,
 Alphabets and special characters in a String

1. Python Program to Count the Number of Vowels in a String

Program/Source Code.

```
# Program to Count the Number of Vowels in a String
string=input("Enter string:")
vowels=0
for i in string:
  if(i=='a' or i=='e' or i=='i' or i=='o' or i=='u' or i=='A' or i=='E' or i=='I' or i=='O'
or i=='U'):
      vowels=vowels+1
print("Number of vowels are:")
print(vowels)
```

Python Program to Count the Number of Vowels in a String

Runtime Test Cases

Case 1:

Enter string:Hello world

Number of vowels are:

3

Case 2:

Enter string:WELCOME

Number of vowels are:

3

2. Python Program to Calculate the Number of Words and the Number of Characters Present in a String

Program/Source Code

"Program to Calculate the Number of Words and the Number of Characters

```
Present in a String'"
```

```
string=input("Enter string:")
char=0
word=1
for i in string:
       char=char+1
       if(i==''):
               word=word+1
print("Number of words in the string:")
print(word)
print("Number of characters in the string:")
print(char)
```

Python Program to Calculate the Number of Words and the Number of Characters Present in a String

Runtime Test Cases

Case 1:

Enter string:Hello world

Number of words in the string:

2

Number of characters in the string:

11

Case 2:

Enter string:I love python

Number of words in the string:

3

Number of characters in the string:

13

3. Python Program to Calculate the Number of Digits, Alphabets and special characters in a String

Program/Source Code "Program to Calculate the Number of Digits, Alphabets and special characters in a String " string=input("Enter string:") count1=0 count2=0 count3=0 for i in string: if(i.isdigit()): count1=count1+1 elif(i.isalpha()): count2=count2+1 else: count3=count3+1 print("The number of digits is:") print(count1) print("The number of alphabets is:") print(count2) print("The number of special characters is:") print(count3)

Python Program to Calculate the Number of Digits, Alphabets and special characters in a String

Runtime Test Cases

```
Case 1:
Enter string: Hello123!@#
The number of digits is:
3
The number of alphabets is:
5
The number of special characters is
3
Case 2:
Enter string: Year 2021 #* %$
The number of digits is:
The number of alphabets is:
The number of special characters is
```

THANK YOU

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