

Number of R's - Hackerearth

Monday, February 17, 2020 8:45 PM

The Problem:

As we all know RK loves his name very much especially the character 'R' so this time task for you is based on his awesome name. RK gives you a string S consisting of characters 'R' and 'K' only. Now you are allowed to do exactly one move that is you have to choose two indices i and j ($1 \leq i \leq j \leq |S|$ where $|S|$ is string length) and flip all the characters at position X where $i \leq X \leq j$. Flipping the character means :

```
if S[X]='R' : //If character at position X is 'R' then change it to 'K'
    S[X]='K'
else :      //else if character at position X is 'K' then change it to 'R'
    S[X]='R'
```

Now your goal is that after exactly one move you have to obtain the maximum number of R's as RK loves this character very much. So help RK with maximum R's.

Input :

The first line contains the number of test cases T . Each test case contains a string S consisting of characters 'R' and 'K' only.

Output :

For each test case print the maximal number of R's that can be obtained after exactly one move.

Constraints:

$1 \leq T \leq 10$

$1 \leq |S| \leq 10^6$ (length of string)

Sample Input:

2

RKKRK

RKKR

Sample Output:

4

4

The Code:

```
#include <stdio.h>
```

```
int main(){
```

```

int caseCount, seqLength, iter, max, addedRCount, rCount;
scanf("%d", &caseCount);
char* sequence = (char*)calloc(1000000, sizeof(char));

while(caseCount > 0){
    scanf("%s", sequence);
    seqLength = strlen(sequence);

    iter = rCount = addedRCount = max = 0;
    while(iter < seqLength){
        if(sequence[iter] == 'R') {
            addedRCount--;
            rCount++;
        } else {
            addedRCount++;
        }

        if(addedRCount > 0 && addedRCount > max){
            max = addedRCount;
        } else if(addedRCount <= 0) {
            addedRCount = 0;
        }
        iter++;
    }
    caseCount--;
    max = max == 0 ? -1 : max;
    printf("%d\n", (max + rCount));
}
}

```

The Stats:

Score

30.0

Time (sec)

0.84336

Memory (KiB)

64

Language

C