

Two strings are *anagrams* of each other if the letters of one string can be rearranged to form the other string. Given a string, find the number of pairs of substrings of the string that are anagrams of each other.

For example  $s = mom$ , the list of all anagrammatic pairs is  $[m, m], [mo, om]$  at positions  $[[0], [2]], [[0, 1], [1, 2]]$  respectively.

### Function Description

Complete the function *sherlockAndAnagrams* in the editor below. It must return an integer that represents the number of anagrammatic pairs of substrings in  $s$ .

sherlockAndAnagrams has the following parameter(s):

- $s$ : a string .

### Input Format

The first line contains an integer  $q$ , the number of queries.  
Each of the next  $q$  lines contains a string  $s$  to analyze.

### Constraints

$$1 \leq q \leq 10$$

$$2 \leq |s| \leq 100$$

String  $s$  contains only lowercase letters  $\in \text{ascii[a-z]}$ .

### Output Format

For each query, return the number of unordered anagrammatic pairs.

### Sample Input 0

```
2
abba
abcd
```

### Sample Output 0

```
4
0
```

### Explanation 0

The list of all anagrammatic pairs is  $[a, a], [ab, ba], [b, b]$  and  $[abb, bba]$  at positions  $[[0], [3]], [[0, 1], [2, 3]], [[1], [2]]$  and  $[[0, 1, 2], [1, 2, 3]]$  respectively.

No anagrammatic pairs exist in the second query as no character repeats.

### Sample Input 1

```
2
ifailuhkqq
kkkk
```

### Sample Output 1

```
3
10
```

### Explanation 1

For the first query, we have anagram pairs  $[i, i], [q, q]$  and  $[ifa, fai]$  at positions  $[[0], [3]], [[8], [9]]$  and  $[[0, 1, 2], [1, 2, 3]]$  respectively.

For the second query:

There are 6 anagrams of the form  $[k, k]$  at positions  $[[0], [1], [[0], [2]], [[0], [3]], [[1], [2]], [[1], [3]]$  and  $[[2], [3]]$ .

There are 3 anagrams of the form  $[kk, kk]$  at positions  $[[0, 1], [1, 2]], [[0, 1], [2, 3]]$  and  $[[1, 2], [2, 3]]$ .

There is 1 anagram of the form  $[kkk, kkk]$  at position  $[[0, 1, 2], [1, 2, 3]]$ .

### Sample Input 2

```
1
cdcd
```

### Sample Output 2

```
5
```

### Explanation 2

There are two anagrammatic pairs of length **1**:  $[c, c]$  and  $[d, d]$ .

There are three anagrammatic pairs of length **2**:  $[cd, dc]$ ,  $[cd, cd]$ ,  $[dc, cd]$  at positions  $[[0, 1], [1, 2]], [[0, 1], [2, 3]], [[1, 2], [2, 3]]$  respectively.