DA Paradox

Input file: standard input
Output file: standard output

Time limit: 1 second Memory limit: 256 megabytes

Dwight loves Scranton's branch employees especially Michael Scott. So, when Scranton's branch absorbed Stamford's branch, a lot of new employees started working in Scranton's branch including Andy.

Andy is trying to get close to Michael to boost his career, but Dwight knew Andy's real intentions, so he decided to tell Michael.

Michael being a fun boss, decided to give them a challenge to keep them busy, so he can keep calling Jan Levinson Gould. The challenge goes as follows.

Given a string S consisting of lowercase Latin letters, in one move you can perform one of the following operations:

- Change any vowel into a consonant letter.
- Change any consonant letter into a vowel.

A consonant is any letter which is not a vowel.

Vowels are: a, e, i, o, u.

What is the minimum number of moves needed to fix the given string, so that **NO** two vowels are adjacent to each other and **NO** two constant letters are adjacent to each other as well?

You — being a good friend to Dwight — decided to help him beat Andy in the challenge.

Input

The only line of input contains a string S ($1 \le |S| \le 10^5$) consisting of lowercase Latin letters where |S| is the size of the string.

Output

Print a single integer, the answer to the problem.

Examples

standard input	standard output
dwight	2
knb	1