Sherlock and the Valid String



Sherlock considers a string, s, to be valid if either of the following conditions are satisfied:

- 1. All characters in s have the same exact frequency (i.e., occur the same number of times). For example, s = "aabbcc" is valid, but s = "baacdd" is not valid.
- 2. Deleting exactly ${\bf 1}$ character from ${\bf s}$ will result in all its characters having the same frequency. For example, ${\bf s}=$ "aabbcc" and ${\bf s}=$ "aabbc" are valid because all their letters will have the same frequency if we remove ${\bf 1}$ occurrence of ${\bf c}$, but ${\bf s}=$ "abcccc" is not valid because we'd need to remove ${\bf 3}$ characters.

Given *s*, can you determine if it's valid or not? If it's valid, print YES on a new line; otherwise, print NO instead.

Input Format

A single string denoting s.

Constraints

- $1 \le |s| \le 10^5$
- String s consists of lowercase letters only (i.e., [a-z]).

Output Format

Print YES if string s is valid; otherwise, print NO instead.

Sample Input 0

Sample Output 0

NO

aabbcd

Explanation 0

We would need to remove two characters from s = "aabbcd" to make it valid, because a and b both have a frequency of b and b both have a frequency of b. This means b is *invalid* because we'd need to remove more than b character to make all its letters have the same frequency, so we print b our answer.