Mock CCC '22 Contest 1 J3 - String Crossing Maximization

Time limit: 0.6s **Memory limit:** 256M

We're given two strings, S and T, containing only uppercase English characters (`ABCDEFGHIJKLMNOPQRSTUVWXYZ`).

If a character at index i of string S is the same as the character at index j of string T, the two strings may *cross* at those indices. We define this as a *string crossing*.

Here is a visual example of a string crossing:

```
    G
    O
HELLOWORLD
    D
    B
    Y
    E
```

You are allowed to modify up to one character in string T by changing the character at any index to another uppercase English character.

Your job is to determine the maximum number of string crossings after modifying up to one character in string T.

Constraints

For this problem, you will NOT be required to pass all the samples to receive points, and you are NOT required to pass all previous subtasks to receive points for a specific subtask.

$1 \leq |S|, |T| \leq 10^6$

$|X|$ represents the length of a string X.

Subtask 1 [6/15]

$1 \leq |S|, |T| \leq 500$

Subtask 2 [4/15]

S and T will only contain the characters `A` and `B`.

Subtask 3 [5/15]

No additional constraints.

Input Specification

The first line will contain $|S|$ and $|T|$, space-separated.

The second line will contain S.

The third and final line will contain T.

Output Specification

Output one integer on one line, the maximum number of string crossings after modifying up to one character in string T.

Sample Input

```
10 7
HELLOWORLD
GOODBYE
```

Sample Output

```
9
```

Explanation

Without any modifications, we can count 6 string crossings.

If we change the `Y` in `GOODBYE` to an `L`, we can now count 9 crossings.