

Problem 616: Add Bold Tag in String

Problem Information

Difficulty: Medium

Acceptance Rate: 51.26%

Paid Only: Yes

Tags: Array, Hash Table, String, Trie, String Matching

Problem Description

You are given a string `s` and an array of strings `words`.

You should add a closed pair of bold tag `` and `` to wrap the substrings in `s` that exist in `words`.

* If two such substrings overlap, you should wrap them together with only one pair of closed bold-tag. * If two substrings wrapped by bold tags are consecutive, you should combine them.

Return `s` after adding the bold tags.

Example 1:

Input: `s = "abcxyz123", words = ["abc", "123"]` **Output:** `"abcxyz123"`

Explanation: The two strings of words are substrings of `s` as following: `"_abc_xyz_123_"`. We add `` before each substring and `` after each substring.

Example 2:

Input: `s = "aaabbb", words = ["aa", "b"]` **Output:** `"aaabbb"` **Explanation:** "aa" appears as a substring two times: `"_aa_ abbb"` and `"a _aa_ bbb"`. "b" appears as a substring three times: `"aaa _b_ bbb"`, `"aaab _b_ b"`, and `"aaabb _b_ "`. We add `` before each substring and `` after each substring: `"aaabbb"`. Since the first two ``'s overlap, we merge them: `"aaabbb"`. Since now the four ``'s are consecutive, we merge them: `"aaabbb"`.

Constraints:

* `1` <= s.length <= 1000 * `0` <= words.length <= 100 * `1` <= words[i].length <= 1000 * `s` and `words[i]` consist of English letters and digits. * All the values of `words` are **unique**.

Note: This question is the same as [758\]. Bold Words in String](<https://leetcode.com/problems/bold-words-in-string/description/>).

Code Snippets

C++:

```
class Solution {
public:
    string addBoldTag(string s, vector<string>& words) {

    }
};
```

Java:

```
class Solution {
    public String addBoldTag(String s, String[] words) {

    }
}
```

Python3:

```
class Solution:
    def addBoldTag(self, s: str, words: List[str]) -> str:
```