Problem 1794: Count Pairs of Equal Substrings With Minimum Difference

Problem Information

Difficulty: Medium
Acceptance Rate: 64.03%
Paid Only: Yes
Tags: Hash Table, String, Greedy

Problem Description

You are given two strings `firstString` and `secondString` that are **0-indexed** and consist only of lowercase English letters. Count the number of index quadruples `(i,j,a,b)` that satisfy the following conditions:

* `0 <= i <= j < firstString.length` * `0 <= a <= b < secondString.length` * The substring of `firstString` that starts at the `ith` character and ends at the `jth` character (inclusive) is **equal** to the substring of `secondString` that starts at the `ath` character and ends at the `bth` character (inclusive). * `j - a` is the **minimum** possible value among all quadruples that satisfy the previous conditions.

Return _the**number** of such quadruples_.

Example 1:

Input: firstString = "abcd", secondString = "bccda" **Output:** 1 **Explanation:** The quadruple (0,0,4,4) is the only one that satisfies all the conditions and minimizes j - a.

Example 2:

Input: firstString = "ab", secondString = "cd" **Output:** 0 **Explanation:** There are no quadruples satisfying all the conditions.

Constraints:

* `1 <= firstString.length, secondString.length <= 2 * 105` * Both strings consist only of lowercase English letters.

Code Snippets

C++:

```
class Solution {
public:
int countQuadruples(string firstString, string secondString) {

}
};
```

Java:

```
class Solution {
public int countQuadruples(String firstString, String secondString) {

}
}
```

Python3:

```
class Solution:
def countQuadruples(self, firstString: str, secondString: str) -> int:
```