

2306. Naming a Company

Hint 

Hard

 1.7K 66 Companies

You are given an array of strings `ideas` that represents a list of names to be used in the process of naming a company. The process of naming a company is as follows:

Choose 2 **distinct** names from `ideas`, call them `ideaA` and `ideaB`.

Swap the first letters of `ideaA` and `ideaB` with each other.

If **both** of the new names are not found in the original `ideas`, then the name `ideaA`
`ideaB` (the **concatenation** of `ideaA` and `ideaB`, separated by a space) is a valid company name.

Otherwise, it is not a valid name.

Return the number of **distinct** valid names for the company.

Example 1:

Input: `ideas = ["coffee","donuts","time","toffee"]`

Output: 6

Explanation: The following selections are valid:

- ("coffee", "donuts"): The company name created is "doffee conuts".
- ("donuts", "coffee"): The company name created is "conuts doffee".
- ("donuts", "time"): The company name created is "tonuts dime".
- ("donuts", "toffee"): The company name created is "tonuts doffee".
- ("time", "donuts"): The company name created is "dime tonuts".
- ("toffee", "donuts"): The company name created is "doffee tonuts".

Therefore, there are a total of 6 distinct company names.

The following are some examples of invalid selections:

- ("coffee", "time"): The name "toffee" formed after swapping already exists in the original array.
- ("time", "toffee"): Both names are still the same after swapping and exist in the original array.
- ("coffee", "toffee"): Both names formed after swapping already exist in the original array.

Example 2:

Input: `ideas = ["lack","back"]`

Output: 0

Explanation: There are no valid selections. Therefore, 0 is returned.

Constraints:

- $2 \leq \text{ideas.length} \leq 5 * 10^4$
- $1 \leq \text{ideas}[i].\text{length} \leq 10$
- `ideas[i]` consists of lowercase English letters.
- All the strings in `ideas` are **unique**.

Accepted **49.6K** Submissions **105.3K** Acceptance Rate **47.1%**