6015. Count Array Pairs Divisible by K

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Given a **0-indexed** integer array `nums` of length `n` and an integer `k`, return *the* ***number of pairs*** `(i, j)` *such that:*

- `0 <= i < j <= n - 1` *and*
- `nums[i] * nums[j]` *is divisible by* `k`.

User Accepted:	0
User Tried:	0
Total Accepted:	0
Total Submissions:	0
Difficulty:	Hard

Example 1:

```
Input: nums = [1,2,3,4,5], k = 2
Output: 7
Explanation:
The 7 pairs of indices whose corresponding products are divisible by 2 are
(0, 1), (0, 3), (1, 2), (1, 3), (1, 4), (2, 3), and (3, 4).
Their products are 2, 4, 6, 8, 10, 12, and 20 respectively.
Other pairs such as (0, 2) and (2, 4) have products 3 and 15 respectively, which are not div
```

Example 2:

```
Input: nums = [1,2,3,4], k = 5
Output: 0
Explanation: There does not exist any pair of indices whose corresponding product is divisible by 5.
```

Constraints:

- `1 <= nums.length <= 10^5`
- `1 <= nums[i], k <= 10^5`

JavaScript

```javascript
const gcd = (a, b) => b == 0 ? a : gcd(b, a % b);

const coutPairs = (a, k) => {
    let n = a.length, f = Array(1e5 + 1).fill(0), gcdData = [], res = 0;
    for (const x of a) {
        let g = gcd(x, k);
        for (const y of gcdData) {
            if (g * y % k == 0) res += f[y];
        }
        if (f[g] == 0) gcdData.push(g);
        f[g]++;
    }
    return res;
};
```

Custom Testcase Use Example Testcases

Shortcut: Command + '

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