Problem 3687: Library Late Fee Calculator

Problem Information

Difficulty: Easy
Acceptance Rate: 94.52%
Paid Only: Yes
Tags: Array, Simulation

Problem Description

You are given an integer array `daysLate` where `daysLate[i]` indicates how many days late the `ith` book was returned.

The penalty is calculated as follows:

* If `daysLate[i] == 1`, penalty is 1. * If `2 <= daysLate[i] <= 5`, penalty is `2 * daysLate[i]`. * If `daysLate[i] > 5`, penalty is `3 * daysLate[i]`.

Return the total penalty for all books.

Example 1:

Input: daysLate = [5,1,7]

Output: 32

Explanation:

* `daysLate[0] = 5`: Penalty is `2 * daysLate[0] = 2 * 5 = 10`. * `daysLate[1] = 1`: Penalty is `1`. * `daysLate[2] = 7`: Penalty is `3 * daysLate[2] = 3 * 7 = 21`. * Thus, the total penalty is `10 + 1 + 21 = 32`.

Example 2:

Input: daysLate = [1,1]

Output: 2

Explanation:

* `daysLate[0] = 1`: Penalty is `1`. * `daysLate[1] = 1`: Penalty is `1`. * Thus, the total penalty is `1 + 1 = 2`.

Constraints:

* `1 <= daysLate.length <= 100` * `1 <= daysLate[i] <= 100`

Code Snippets

C++:

```
class Solution {
public:
int lateFee(vector<int>& daysLate) {

}
};
```

Java:

```
class Solution {
public int lateFee(int[] daysLate) {

}
}
```

Python3:

```
class Solution:
def lateFee(self, daysLate: List[int]) -> int:
```