Java 1D Array (Easy)

Problem Statement

You are given an array of n integers. A sub-array is "Negative" if sum of all the integers in that sub-array is negative. Count the number of "Negative sub-arrays" in the input array.

Note: Subarrays are contiguous chunks of the main array. For example if the array is {1,2,3,5} then some of the subarrays are {1}, {1,2,3}, {2,3,5}, {1,2,3,5} etc. But {1,2,5} is not an subarray as it is not contiguous.

Input Format

The first line consists an integer n. The next line will contain n space seperated integers. Value of n will be at most 100. The numbers in the array will range between -10000 to 10000.

Output Format

Print the answer to the problem.

Sample Input

```
5
1 -2 4 -5 1
```

Sample Output

9

Explanation

These are the ranges of the 9 negative subarrays in this sample:

```
[0:1]
[0:3]
[0:4]
[1:1]
[1:3]
[1:4]
[2:3]
[3:3]
[3:4]
```

Assume that the index is 0 based.