

### STUDENT REPORT

NBZ

# DETAILS

KHAJA BANI

#### **Roll Number**

KUB23ECE017

#### **EXPERIMENT**

## Title

ANT ON RAIL

#### **Description**

There is a ant on your balcony. It wants to leave the rail so sometimes it moves right and sometimes it moves left until it gets exhausted. Given an integer array A of size N which consists of integer 1 and -1 only representing ant's moves.

Where 1 means ant moved unit distance towards the right side and -1 means it moved unit distance towards the left . Your task is to find and return the integer value representing how many times the ant reaches back to original starting position.

#### Note:

- Assume 1-based indexing
- Assume that the railing extends infinitely on the either sides

#### **Input Format:**

**input1**: An integer value N representing the number of moves made by the ant.

**input2**: An integer array A consisting of the ant's moves towards either side

#### Sample Input

5

1 -1 1 -1 1

#### **Sample Output**

2

#### Source Code:

```
N=int(input())
A=list(map(int,input().strip().split()))[:N]
count = 0
for pos in A:
    sum+=pos
    if sum == 0:
        count+=1
print(count)
```

#### **RESULT**

9/28/24, 1:02 PM KUB23ECE017-Ant on Rail

5 / 5 Test Cases Passed | 100 %

F18, (F0), 853, 1/F10, (F1853, 1/853, F1