

Diagonal Difference



Problem Statement

You are given a square matrix of size $N \times N$. Calculate the absolute difference of the sums across the two main diagonals.

Input Format

The first line contains a single integer N . The next N lines contain N integers (each) describing the matrix.

Constraints

$$1 \leq N \leq 100$$

$$-100 \leq A[i] \leq 100$$

Output Format

Output a single integer equal to the absolute difference in the sums across the diagonals.

Sample Input

```
3
11 2 4
4 5 6
10 8 -12
```

Sample Output

```
15
```

Explanation

The first diagonal of the matrix is:

```
11
 5
 -12
```

Sum across the first diagonal = $11+5-12=4$

The second diagonal of the matrix is:

```
 4
 5
10
```

Sum across the second diagonal = $4+5+10=19$

Difference: $|4-19|=15$