

Problem: GCD of Maximum Sum Pair

You are given an array of integers. For each test case, find the maximum sum of two distinct integers in the array and then compute the **greatest common divisor (GCD)** of this maximum sum with the second-largest integer in the array.

Note: It is guaranteed that there exist at least two distinct integers in the array.

Input Format

- The first line of input will contain a single integer T , denoting the number of test cases.
- Each test case consists of multiple lines of input:
 - The first line of each test case contains a single integer N , the size of the array.
 - The next line contains N space-separated integers, denoting the elements of the array.

Output Format

For each test case, output on a new line, the GCD of the maximum sum of two distinct integers in the array with the second-largest integer in the array.

Constraints

- $1 \leq T \leq 10$
- $2 \leq N \leq 10^5$
- The sum of N over all test cases does not exceed 10^6 .
- Each integer in the array is positive and does not exceed 10^9 .

Example

Sample Input

```
2
5
1 2 3 4 5
4
10 20 30 40
```

Sample Output

```
5
10
```