

Problem C

Steepest Slope

Time limit: 1s
Memory Limit: 8MB

Have you learn Calculus? Because we need your Calculus skill to solve this derivation (turunan) problem. In Calculus, derivation often refers to the slope/rate of changes of certain function. Now, Mr. Bee wants to calculate the steepest slope (largest slope) of a hill. To make the problem easier, he measure the height of the hill for every metre, and you just need to find the Steepest Slope from the **consecutive points**.

Input

The input consists of 1 integer N ($1 \leq N \leq 100$) that represents how many data of height that Mr. Bee gave to you. The next line consists of N integers H_i ($1 \leq H_i \leq 100$) that represents the height of the hill for each metre from the left to the right of the hill.

Output

Output the steepest slope from the consecutive points of the hill.

1st Sample Input
6 5 7 8 3 2 5
Output for 1st Sample Input
5

2nd Sample Input
6 1 2 3 4 5 6
Output for 2nd Sample Input
1

Explanation

In the 1st Sample, the answer 5 can be get from the slope between the point with height of 8 and the point with height of 3.

In the 2nd Sample, every single consecutive points have the slope of 1, hence the answer is 1.

Note: Always print a newline ($\backslash n$) at the end of the answer.