

Problem B. Greater Average

Time Limit 1000 ms

Code Length Limit 50000 B

OS Linux

You are given 3 numbers A , B , and C .

Determine whether the **average** of A and B is **strictly greater** than C or not?

NOTE: Average of A and B is defined as $\frac{(A+B)}{2}$. For example, average of 5 and 9 is 7, average of 5 and 8 is 6.5.

Input Format

- The first line of input will contain a single integer T , denoting the number of test cases.
- Each test case consists of 3 integers A , B , and C .

Output Format

For each test case, output **YES** if average of A and B is strictly greater than C , **NO** otherwise.

You may print each character of the string in uppercase or lowercase (for example, the strings **Yes**, **yEs**, **yes** and **YES** will all be treated as identical).

Constraints

- $1 \leq T \leq 1000$
- $1 \leq A, B, C \leq 10$

Sample 1

| Input | Output |
|-------|--------|
| 5 | YES |
| 5 9 6 | YES |
| 5 8 6 | NO |
| 5 7 6 | NO |
| 4 9 8 | YES |
| 3 7 2 | |

****Test case 1:**** The average value of 5 and 9 is 7 which is strictly greater than 6.

Test case 2: The average value of 5 and 8 is 6.5 which is strictly greater than 6.

Test case 3: The average value of 5 and 7 is 6 which is not strictly greater than 6.

Test case 4: The average value of 4 and 9 is 6.5 which is not strictly greater than 8.

Test case 5: The average value of 3 and 7 is 5 which is strictly greater than 2.