Problem L: Uneven Walking

Filename: uneven

Time limit: 1 second

Since this is the last SI@UCF Competitive Programming camp, Arup wanted to play some sports with the students, like he always used to in the early days. Unfortunately, he's pushing 50, and when he played some tennis and frisbee on Sunday with the students, he strained his right calf. It turns out that the injury makes him walk uneven steps. Contrary to what one might think, his step with the right foot is longer than his step with the left food. Whenever he is walking somewhere, he alternates steps, always starting with the right.

Now that Arup is walking unevenly, it's a bit harder to figure out how many steps he has to take to get to different places on campus. Help him figure it out!

## **Problem**

Given how long Arup's right step is, in inches, how long his left step is in inches, and how far he has to walk in inches, determine the minimum number of steps he has to walk using the pattern described above to walk at least the desired distance.

## **Input**

Input will begin with a single integer **c** representing the number of test cases that follow.

Each test case is three space-separated integers on a line: **r,** the number of inches when he steps with his right foot, **s,** the number of inches when he steps with his left foot, and **t**, the total distance in inches he would like to walk.

**Output**

For each test case, output the minimum number of steps he has to take to walk at least **t** inches.

## **Input Bounds and Corresponding Credit**

| **50 Points** |
| --- |
| * 1 ≤ **c** ≤ 30 * 2 ≤ **r** ≤ 48 * 1 ≤ **s** < **r** * 1≤ **t** ≤ **1018** (You read this right, even injured, Arup is ambitious!) |

## **Samples**

| **Input** | **Output** |
| --- | --- |
| | 2 | | --- | | 30 10 75 | | 15 9 86 | | | 4 | | --- | | 7 | |