Area Under the Curves

Input File: area.txt

A very common activity in math classes is finding the area under a curve; your task for this challenge is very similar. Given two straight lines which intersect in Quadrant I (positive x, positive y) and form a quadrilateral with **both** the x-and y-axis, you must find the confined area.

Input:

The first line contains an integer N. For every N, you will receive 2 lines, each defining one mathematical line. The lines will be formatted like this: $A \times B = C$, where A, B, and C are double coefficients.

Output:

You should output the areas confined by the given lines. The output should be in doubles, rounded to the nearest thousandth. The value 1 should still be printed as 1.000.

Example Input:

3 $0 \times + 1 \ y = 1.0$ $1.0 \times + 0 \ y = 1.0$ $1.0 \times - 2 \ y = -4.0$ $2.0 \times - 1 \ y = 2.0$ $4.5 \times - 1 \ y = 10$ $2 \times - 0.5 \ y = -1$

Example Output:

1.000 4.333 132.889