Rectangle Area

Given the coordinates of two rectilinear rectangles in a 2D plane, return the total area covered by the two rectangles.

The first rectangle is defined by its bottom-left corner (ax1, ay1) and its top-right corner (ax2, ay2).

The second rectangle is defined by its bottom-left corner (bx1, by1) and its top-right corner (bx2, by2).

Constraints:

$-10^4 \leq ax1 \leq ax2 \leq 10^4$.

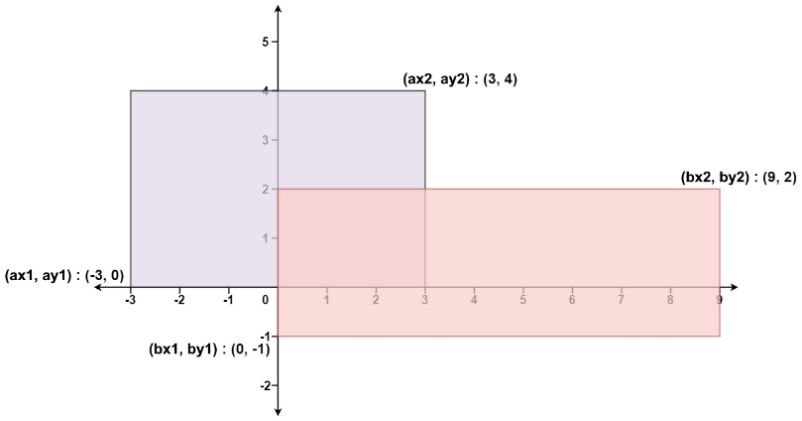
$-10^4 \leq ay1 \leq ay2 \leq 10^4$.

$-10^4 \leq bx1 \leq bx2 \leq 10^4$.

$-10^4 \leq by1 \leq by2 \leq 10^4$.

Example:

Input: -3 0 3 4 0 -1 9 2	ax1 = -3, ay1 = 0, ax2 = 3, ay2 = 4, bx1 = 0, by1 = -1, bx2 = 9, by2 = 2
Output: 45	45



Input: -2 -2 2 2 -2 -2 2 2	ax1 = -2, ay1 = -2, ax2 = 2, ay2 = 2, bx1 = -2, by1 = -2, bx2 = 2, by2 = 2
Output: 16	16