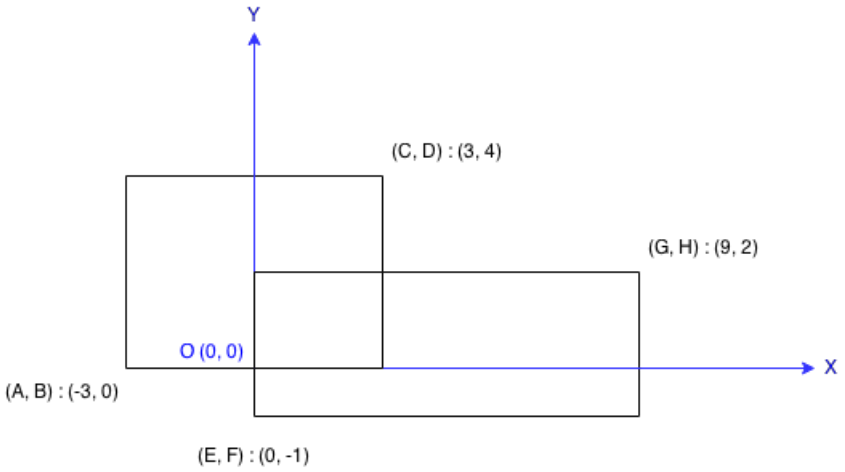
223. Rectangle Area

Medium 465 798 Add to List Share

Find the total area covered by two **rectilinear** rectangles in a **2D** plane.

Each rectangle is defined by its bottom left corner and top right corner as shown in the figure.



Example:

```
Input: A = -3, B = 0, C = 3, D = 4, E = 0, F = -1, G = 9, H = 2
Output: 45
```

```
class Solution {
public:
    int computeArea(int A, int B, int C, int D, int E, int F, int G, int H) {

        int area1=0, area2=0, areaI=0;

        //compute if the given rectangles are FULLY overlaping
        if (A==E && B==F && C==G && D==H)
            {
                area1 = abs((C-A) * (D-B));
                area2 = 0;
            }

        //compute if the given rectangles are not overlapping
        else if (E>=C || A>=G)
            {   //In this case rectangles are not overlaping
                area1 = abs((C-A) * (D-B));
                area2 = abs((G-E) * (H-F));
            }

        else if (F>=D || B>=H)
            {   //In this case rectangles are not overlaping
                area1 = abs((C-A) * (D-B));
                area2 = abs((G-E) * (H-F));
            }
        //following is applicable only if they are overlapping rectangle
        else
            {
                //computing area of the first and second rectangle
                area1 = abs((C-A) * (D-B));
```

Your previous code was restored from your local storage. Reset to default