

The Algebra Symposium: Rectangles

I was curious about shed construction and found a **CONSTRUCTION GUIDE** at

http://www.designer-shed-plans.com/free_construction_guide.htm.

There is a statement on page 3 about making sure that the corners are at 90° angles:

6. After completing the work described in item # 5 you should mark the 4 outside corners of the shed with small stakes. Make sure that the corners are at 90° angles. Measuring the distance from front left to the right back corners and comparing this with the distance between the remaining corners will confirm 90° angles when the distance is the same. Make the necessary adjustments so that the two are exactly the same and the area still is $8' \times 10'$ or whatever the size of your new shed is going to be.

Explain why the method described does or does not work.