Name $\qquad$ Date $\qquad$
LESSON 7.2
Practice B
For use with pages 440-447
Decide whether the numbers can represent the side lengths of a triangle. If they can, classify the triangle as right, acute, or obtuse.

1. $5,12,13$
2. $\sqrt{8}, 4,6$
3. $20,21,28$
4. $15,36.39$
5. $\sqrt{13}, 10,12$
6. $14,48,50$

In Exercises 7 and 8, copy and complete the statement with <, > or $=$, if possible. If it is not possible, explain why.
7. $m \angle J$ $\qquad$ $m \angle R$
8. $m \angle K+m \angle \mathrm{~L}$ $\qquad$ $m \angle S+m \angle T$

9. Multiple Choice What type of triangle has side lengths of 14,11 , and 25 ?
A. Acute
B. Right
C. Obtuse
D. None

Graph points $A, B$, and $C$. Connect the points to form $\triangle A B C$. Decide whether $\triangle A B C$ is right, acute, or obtuse.
10. $A(4,1), B(7,-2), C(2,-4)$

11. $A(-2,2), B(6,4), C(-4,10)$

12. $A(0,5), B(3,6), C(5,1)$


The roof shown in the diagram at the right is shown from the front of the house.
The slope of the roof is $\frac{5}{12}$. The height of the roof is $\mathbf{1 5} \mathbf{f t}$ (Note: Remember slope $=\frac{\text { rise }}{r u n}$ ). Hint: Find the base in order to find the hypotenuse!
13. What is the length from gutter to peak of the roof?


