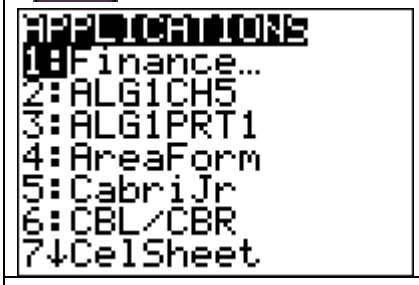
Student Worksheet for G.G. 34

<table>
<tr>
<td>After turning on your handheld press
 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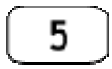
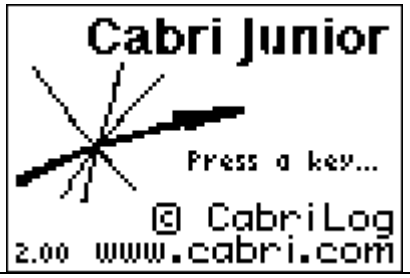
<td>Select CabriJr.
 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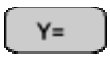
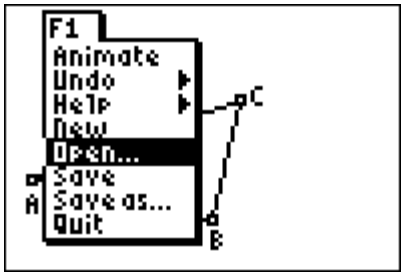
<td> 

  scroll down to Open
 
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 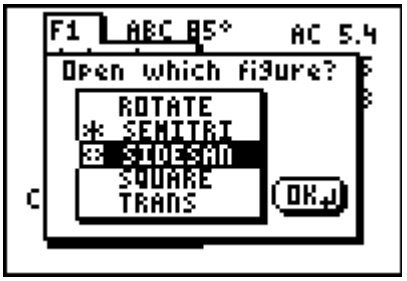
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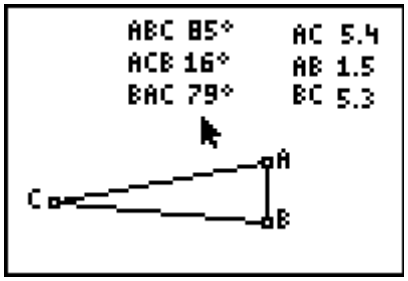
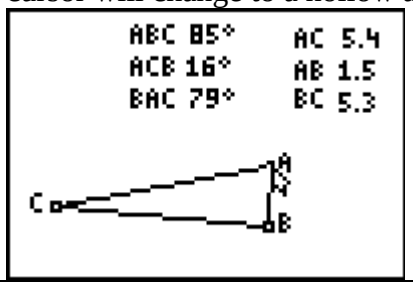
 
</td>
<td>Now position the cursor over any point. The vertex will become “active” and the cursor will change to a hollow arrow.
 
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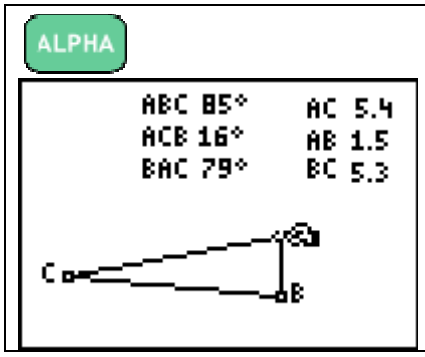

You have now selected a point, grabbed the point now use your cursor to drag the point and observe what happens on your calculator.

Answer the questions below.

1) What are the sides of ΔABC? _____
2) What are the sides of $\angle ABC$? _____
3) Which side is an answer to question 1 but not an answer to question 2? _____
   This side is called the side **opposite** $\angle ABC$.
4) What is the side opposite $\angle ACB$? _____
5) What is the side opposite $\angle BAC$? _____
6) As you drag any vertex investigate the largest angle. What is true about the measure of the side opposite this angle? _____
7) As you drag any vertex investigate the smallest angle. What is true about the measure of the side opposite this angle? _____
8) Drag any vertex and see if you can make two angles nearly the same measure. What is true about the sides opposite these nearly equal angles? _____
9) What do you think would be true about the sides opposite two equal angles?
   _____
10) If you only knew the lengths of the sides of a triangle could you name the largest angle? YES or NO _____
11) Write a statement that explains your answer to question number 10.
   _____
12) If you only knew the degree measures of the angles of a triangle could you name the shortest side? YES or NO _____
13) Write a statement that explains your answer to question number 12.
   _____

14) What do you think would be true of the measures of the angles of a triangle if all 3 sides of the triangle were the same measure? _____

15) Would you be able to find the measures of each of the angles of the triangle described in question 14? _____ If the answer is yes what would be the measure of each angle? _____