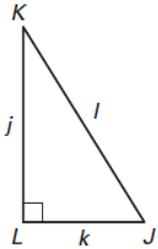
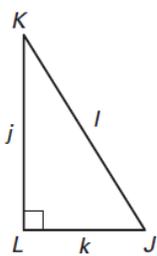
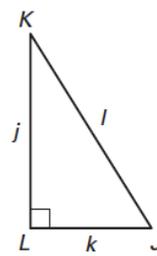


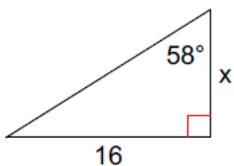
Name: \_\_\_\_\_

Date: \_\_\_\_\_

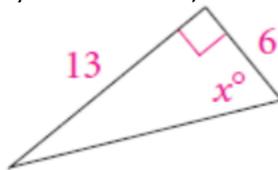
## Unit 4 TEST REVIEW

1) Find the tangent of  $\angle A$ :2) Find the cosine of  $\angle B$ :3) Find the sine of  $\angle X$ :4)  $\sin 6^\circ = \cos$  \_\_\_\_\_5)  $\cos 27^\circ = \sin$  \_\_\_\_\_6)  $\sin 42^\circ = \cos$  \_\_\_\_\_

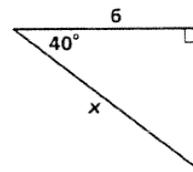
7) Show how you can solve for x.



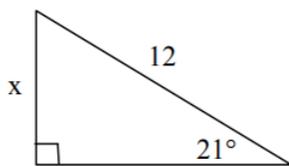
8) Show how you can solve for x.



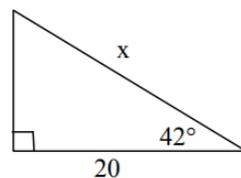
9) Show how you can solve for x.



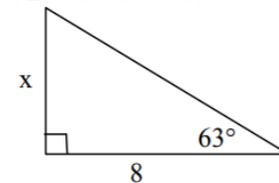
10) Solve for x



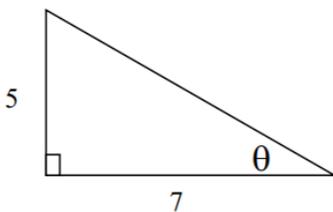
11) Solve for x



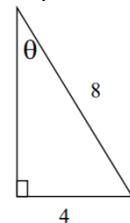
12. Solve for x



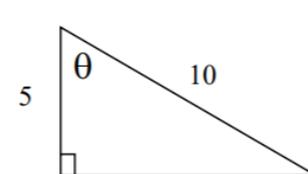
13.) Solve for theta



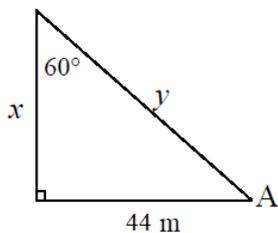
14.) Find for theta



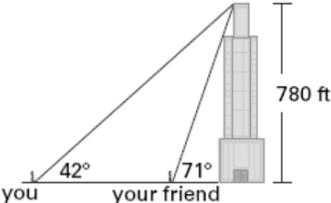
15) Find theta



16) Find the Perimeter of the Triangle



17) The perimeter of an equilateral triangle is 42 feet. What is the height of the triangle?

<p>18) In right triangle ABC, <math>\angle A</math> and <math>\angle B</math> are the <b>acute angles</b>. If <math>\cos A = \frac{12}{20}</math>, what is <math>\cos B</math>?</p>	<p>19) In right triangle ABC, <math>\angle A</math> and <math>\angle B</math> are <b>complementary angles</b>. If <math>\cos A = \frac{21}{29}</math>, what is <math>\sin B</math>?</p>
<p>20) Brian's kite is flying above a field at the end of 85 feet of string. If the <b>angle of elevation</b> to the kite measures <math>75^\circ</math>, and Brian is holding the kite 6 feet off the ground. How high above the ground is the kite flying?</p>	<p>21) A surveyor is standing 25 feet from a building and is looking at the top with an <b>angle of elevation</b> of <math>65^\circ</math>. How tall is the building? Round to the nearest tenth.</p>
<p>22) Fireman Jack spots a brush fire at an <b>angle of depression</b> of <math>40^\circ</math> from his 60 feet tall tower. How far is the brush fire from the base of the tower?</p>	<p>23) Laura stands 55 yards from the base of a lighthouse. The height of the lighthouse is 85 yards. What is the <b>angle of depression</b> from the top of the lighthouse to Laura?</p>
<p>24) You are standing 60 meters away from a building that is 75 meters tall. At what angle would you be <b>looking up</b> to the top of the building?</p>	<p>25) An 8 foot ladder is leaning against a wall so that the base is 5 feet from the base of the wall. What angle does the ladder make with the <b>ground</b>? Round to the nearest tenth.</p>
<p>26) You and your friend are both looking up at a 780-foot tall skyscraper. You are looking up at a <math>42^\circ</math> angle and your friend is looking up at a <math>71^\circ</math> angle. If your friend is standing 268.2 feet away from the base of the skyscraper, how far away are you standing from your friend?</p> 	<p>27) The legs of a right triangle measure 21.4 meters and 23.1 meters. To the nearest tenth, what is the measure of the <b>smallest angle</b> in the triangle?</p>