

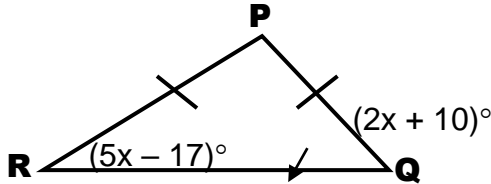
NAME _____ DATE _____ PER. _____

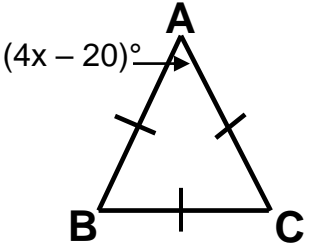
REVIEW #5 Part 2: PROPERTIES OF TRIANGLES

Answer each of the following.

20. Angles:	In $\triangle ABC$, $AB = 6$, $BC = 8$, and $AC = 12$. List the angles of $\triangle ABC$ in order from largest to smallest.
21. Sides:	In $\triangle XYZ$, $m\angle X = 103^\circ$, $m\angle Y = 41^\circ$, and $m\angle Z = 36^\circ$. List the sides of $\triangle XYZ$ in order from shortest to longest.

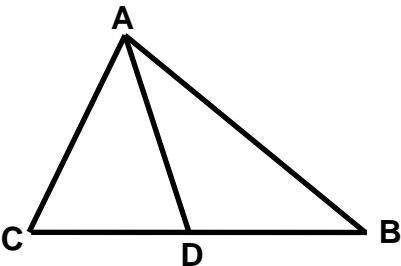
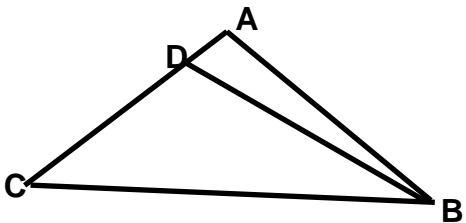
PART 2: Isosceles & Equilateral Triangles

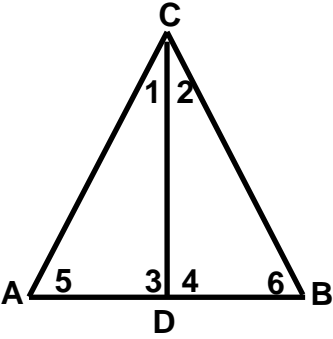
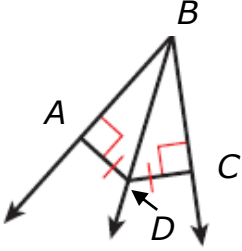
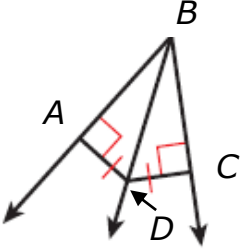
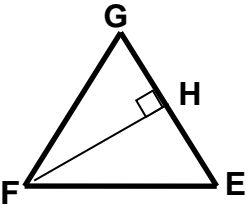
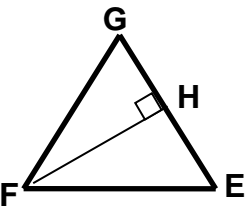
22. _____	<p>Find the measure of $\angle R$ in the picture.</p> 
23. _____	Find the measure of $\angle P$ in the picture in #22.

24. _____	Find the value of 'x' in the picture.	
25. _____ _____ _____	The vertex angle of an isosceles triangle measures $(a + 15)^\circ$, and one of the base angles measures $7a^\circ$. Find each angle measure.	

PART 3: Special Segments

For each of the following, find the indicated measure.

26. _____	\overline{AD} is a median in $\triangle ABC$, if $BD = 5x - 1$, $CD = 4x + 7$, and $AC = 2x - 3$. Find the length of BC .	
27. _____	\overline{BD} is an altitude in $\triangle ABC$, find the value of 'x' if $m\angle ADB = (4x - 10)^\circ$.	

<p>28. _____</p>	<p>$\triangle ABC$ is an isosceles triangle with vertex angle C and altitude CD. Find $m\angle 2$ if $m\angle 1 = (2x + 5)^\circ$ and $m\angle 2 = (3x - 7)^\circ$.</p> 
<p>29. _____</p>	<p>Given that $m\angle ABD = 16^\circ$, find $m\angle ABC$.</p> 
<p>30. _____</p>	<p>Given that $m\angle ABD = (2x + 12)^\circ$ and $m\angle CBD = (6x - 18)^\circ$, find $m\angle ABC$.</p> 
<p>31. _____</p>	<p>Given that \overline{FH} is the perpendicular bisector of \overline{EG}, $EF = 4y - 3$ and $FG = 6y - 37$, find FG.</p> 
<p>32. _____</p>	<p>Given that $EF = 10.6$, $EH = 4.3$, and $FG = 10.6$, find EG. \overline{FH} is the perpendicular bisector of \overline{EG}</p> 

Based on the markings below, tell whether \overline{AB} in each triangle is a:

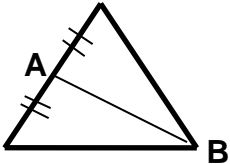
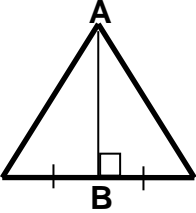
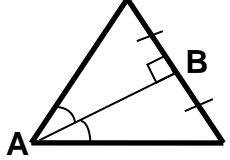
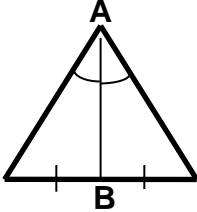
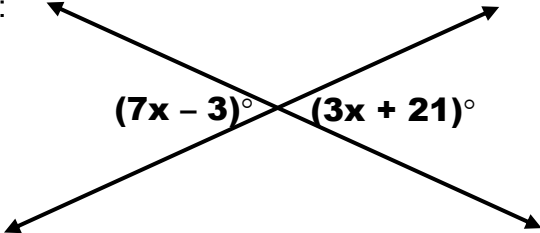
A. Angle Bisector

B. Median

C. Altitude

D. Perpendicular Bisector

List all that apply.

<p>_____ 33.</p>	
<p>_____ 34.</p>	
<p>_____ 35.</p>	
<p>_____ 36.</p>	
<p>39. $x =$ _____</p>	<p>Find the value of 'x':</p> 
<p>40. $AB =$ _____</p>	<p>If $A(2, 3)$ and $B(-4, -6)$, find AB. Round to the nearest tenth.</p>