

SUNDAY	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY	SATURDAY
<h1>APRIL 2016</h1> <h2>GEOMETRY</h2>					1	2
					Find the value of x in Figure #1 on the back.	What is the y -intercept of the line through the points $(-3, 3)$ and $(12, -2)$?
3	4	5	6	7	8	9
Point $Y(0, 1)$ is reflected across the line $y = 2$ to create Y' . What are the coordinates of Y' ?	Point $Z(2, 3)$ is translated 6 units left and 1 unit up to create Z' . What are the coordinates of Z' ?	Point $M(-5, -5)$ is rotated 180° about the origin to create M' . What are the coordinates of M' ?	Find the value of x in Figure #6 on the back, given that $m\angle 2 = 21x + 8$.	W is in the interior of $\angle JKL$. Find the value of x if $m\angle JKL = 107^\circ$, $m\angle WKL = 10x - 3$, and $m\angle JKW = 5x + 5$.	$\triangle ABC$ has vertices $A(3, 11)$, $B(0, 7)$, and $C(16, 1)$. What is the x -coordinate of the circumcenter? Round your answer to the nearest whole number.	Find the y -coordinate of the midpoint of \overline{TS} where T has coordinates $(6, 10)$ and S has coordinates $(2, 8)$.
10	11	12	13	14	15	16
In a certain triangle, the middle angle is 5 times larger than the smallest. The largest angle is 12 times larger than the smallest. What is the size of the smallest angle?	What is the x -coordinate of the centroid of the triangle with vertices at $(7, 9)$, $(13, 3)$, and $(13, 9)$.	Sheyla wants to cut a 72 inch board into two pieces so that one piece is 5 times as long as the other. What is the length of the smaller piece?	L is the line through the points $(6, 10)$ and $(3, 4)$. What is the y -intercept of the line perpendicular to L through the point $(14, 6)$?	Find the coordinates of C , the midpoint of \overline{AB} , where A has coordinates $(7, 9)$ and B has coordinates $(-5, -1)$.	Equilateral triangle $\triangle ABC$ has vertices $A(8, 8.5)$ & $B(3, 7.5)$. To the nearest whole number, what is the perimeter of $\triangle ABC$?	A TV is listed as being 19 in. This represents the diagonal distance across the screen. If the screen is 10 in. tall, how wide is it? Round your answer to the nearest inch.
17	18	19	20	21	22	23
Find the value of x in Figure #17 .	\overline{BD} is the angle bisector of $\angle ABC$. Find the value of x if $m\angle ABC = 100^\circ$ and $m\angle ABD = 3x - 4$.	Two angles are complementary. One measures $(2x)^\circ$ and the other measures $(3x - 5)^\circ$. What is the value of x ?	While off-roading, Bob finds a lake. To avoid it, he goes 28 miles east and 45 miles north. How many miles could be saved if it were possible to drive through the lake?	What is the x -coordinate of the orthocenter of the triangle with vertices $(22, 18)$, $(6, 5)$, and $(28, 2)$? Round your answer to the nearest whole number.	M is between J & N on \overline{JN} . K is between J & M . L is between K & M . R is between M & N . $JN = 34$, $KM = 8$, and $JK = LK = LM$. Find MN .	$\angle A$ and $\angle B$ form a linear pair. If $m\angle A = 2x + 15$ and $m\angle B = 5x + 4$, what is the value of x ?
24	25	26	27	28	29	30
S is in the interior of $\angle BCD$. $m\angle BCD = 21x - 9$, $m\angle BCS = 3x - 3$, & $m\angle SCD = 156^\circ$. Find $m\angle BCS$.	Write the equation of the line through the points $(6, 49)$ and $(3, 37)$. What is the y -intercept of the line?	$\angle A$ and $\angle B$ form a linear pair. If $m\angle A = x - 3$ and $m\angle B = 6x + 1$, what is the value of x ?	Carla is flying a kite and has let out 50 m. of string. She notices that the kite is directly above a house 42 m. away. To the nearest meter, how high is the kite?	T is the midpoint of \overline{PM} . $PT = 2x + 4$ and $TM = 3x - 1$. Find PM .	A is between B and C on \overline{BC} . $BA = 17$, $BC = 5x + 9$, and $AC = 3x$. Find BC .	J is the midpoint of \overline{IL} . The coordinates of J are $(9, 4)$ and the coordinates of L are $(15, 8)$. What are the coordinates of I ?

Figure #1



Figure #6

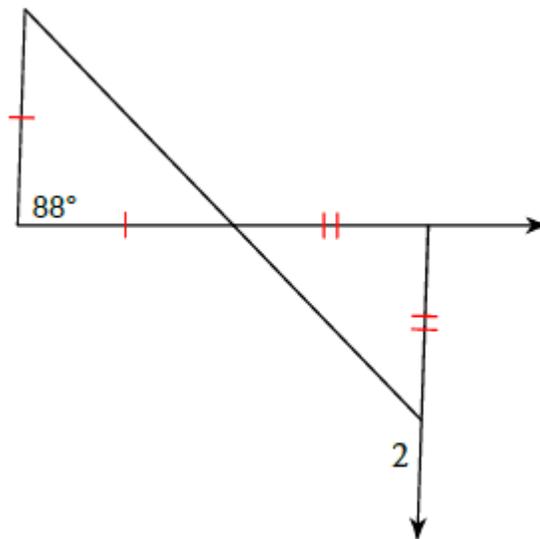


Figure #17

