

## Bell Work

4/22/2015

What are the x and y-intercepts of the following.

You may need to recall the x-value for a y-intercept & the y-value for a x-intercept.

$$\underbrace{x\text{-int. } y=0}_{\text{red}} \quad 3x - 12y = -24 \quad \underbrace{y\text{-int. } x=0}_{\text{red}}$$

$$3x - 12(0) = -24$$

$$\frac{3x}{3} = \frac{-24}{3}$$

$$x = -8$$













$$3(0) - 12y = -24$$

$$\frac{-12y}{-12} = \frac{-24}{-12}$$

$$y = 2$$

I will collect any re-works you have completed.

Working with shapes and numbers...what is the value of each shape?

			Row sum = 46
			Row sum = 27
			Row sum = 32
			Row sum = 37
Column sum = 55	Column sum = 46	Column sum = 41	

Bell Work

4/24/2015

If  $\bigcirc \bigcirc \bigcirc \triangle = 25$   
and  $\bigcirc \bigcirc \triangle = 17$













What is the value of  $\bigcirc$  and  $\triangle$  ??

$\bigcirc = 8$

**Part 1 (Complete in Class)**

Find the value of each shape so that they will add up to give you the specified sums in each row and each column.

1

			Row sum = 46
			Row sum = 27
			Row sum = 32
			Row sum = 37
Column sum = 55	Column sum = 46	Column sum = 41	




2.

$\square_{20}$	$\square_{20}$	$\circ_4$	Row sum = 46
$\circ_6$	$\circ_6$	$\circ_6$	Row sum = 18
$\triangle_{17}$	$\circ_4$	$\triangle_{17}$	Row sum = 40
$\triangle_{17}$	$\square_{20}$	$\triangle_{17}$	Row sum = 54
Column sum = 60	Column sum = 52	Column sum = 46	

$$\triangle = 17 \quad \circ = 6 \quad \square = 20$$













3.




15	15	8	Row sum = 38
15	20	15	Row sum = 50
8	20	20	Row sum = 48
15	8	20	Row sum = 43
Column sum = 53	Column sum = 63	Column sum = 63	

 = \_\_\_\_\_
  = \_\_\_\_\_
  = \_\_\_\_\_

$$\begin{array}{r} 53 \\ - 38 \\ \hline 15 \end{array}$$
  
 $\square = 15$

4.













			Row sum = 56
			Row sum = 47
			Row sum = 55
			Row sum = 64
Column sum = 72	Column sum = 71	Column sum = 79	

 = \_\_\_\_\_
  = \_\_\_\_\_
  = \_\_\_\_\_

 = \_\_\_\_\_















5.

			Row sum = 42
			Row sum = 18
			Row sum = 27
			Row sum = 30
Column sum = 50	Column sum = 32	Column sum = 35	

$\curvearrowright \quad \bigcirc = 8 \quad \square = 5 \quad \triangle = 17$

6.

			Row sum = 78
			Row sum = 65
			Row sum = 68
			Row sum = 71
Column sum = 109	Column sum = 80	Column sum = 93	

Part 2

Drawing your own shapes

For each of the following *systems of equations*, draw out the equations using shapes

$\square, \circ, \triangle$  to help you find their values! (The first one is started for you.)

1. Equations:

Drawing:

$2x + z = 46$   $\rightarrow$   $20 \square + 20 \square + 6 \triangle = 46$

$3z = 18$   $\rightarrow$   $\triangle + \triangle + \triangle = 18$   $\triangle = 6$

$2y + z = 40$   $\rightarrow$   $\circ + \circ + 6 \triangle = 40$

$x = 20$

$y = 17$

$z = 6$

2. Equations:

$x + 2y = 46$

$y + 3z = 41$

$3z = 27$

$\square = x = 18$   
 $\circ = y = 14$   
 $\triangle = z = 9$

Drawing:

$\square \textcircled{14} \textcircled{14} = 46$

$\circ \overset{27}{\triangle \triangle \triangle} = 41 \quad \circ = 14$

$\triangle \triangle \triangle = 27$   
 $\triangle = 9$

3. Equations:

Drawing:

$$\begin{array}{r}
 2x + 2y = 50 \longrightarrow \square \square \bigcirc \bigcirc = 50 \\
 2x + y = 42 \longrightarrow \begin{array}{r} \square \square \bigcirc \\ \hline \square \square \bigcirc \end{array} = 42 \\
 y + 2z = 18 \longrightarrow \begin{array}{r} \bigcirc \\ \hline \bigcirc \Delta \Delta \end{array} = 18
 \end{array}$$

$x = \underline{\hspace{1cm}}$   
 $y = \underline{8}$   
 $z = \underline{\hspace{1cm}}$

$$\begin{array}{r}
 \cancel{2x} + \cancel{2y} = 50 \\
 - \quad \cancel{2x} + y = 42 \longrightarrow \\
 \hline
 0 \quad \bigcirc y = 8
 \end{array}$$
  

$$\begin{array}{r}
 2x + y = 42 \\
 \cancel{2x} + \cancel{8} = 42 \\
 \quad \quad -8 \quad -8 \\
 \hline
 2x = 34 \\
 \frac{2x}{2} = \frac{34}{2} \\
 \bigcirc x = 17
 \end{array}$$