

acadience®math

Concepts and Applications

Level 6 | Progress Monitoring

Student Worksheets

Published by Acadience Learning Inc.

Available: [www.acadiencelearning.org](http://www.acadiencelearning.org)

## Concepts and Applications / Level 6

Name: \_\_\_\_\_ Student ID: \_\_\_\_\_

Teacher: \_\_\_\_\_ School: \_\_\_\_\_ School Year: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 1**

**Total:** \_\_\_\_\_

1. At the aquarium, there were 19 sea lions and 51 jellyfish. What is the ratio of sea lions to jellyfish? \_\_\_\_\_

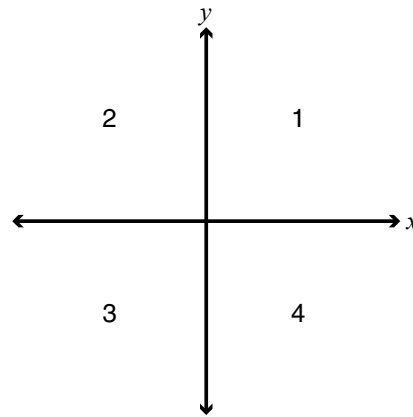
2. May likes to go fishing. Each day she caught a certain number of fish. The following are the number of fish that May caught per day: **4, 7, 8, 2, 9**.

A. What is the mean number of fish that May caught? \_\_\_\_\_

B. What is the median number of fish that May caught? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-3, 2)$	
$(6, 4)$	
$(9, -2)$	4
$(-4, -7)$	



4. A. Write an expression for **9 subtracted from  $x$** : \_\_\_\_\_

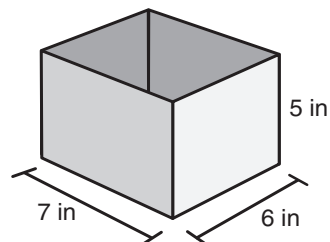
B. Write an expression for **3 added to  $x$** : \_\_\_\_\_

5. Chloe has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Chloe's box?

\_\_\_\_\_ dice.



6. Sophie builds 8 birdhouses in 4 weeks. At this rate, how long will it take her to build 6 birdhouses?

\_\_\_\_\_ week(s).

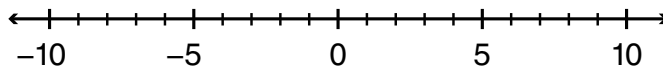
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 1**

7. Label the following numbers on the number line below:

a.  $-(-5)$

b.  $-3$

c.  $-1$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$41x + 3 < 100$	4	
$20x - 9 < 100$	3	

9. Complete the ratio table:

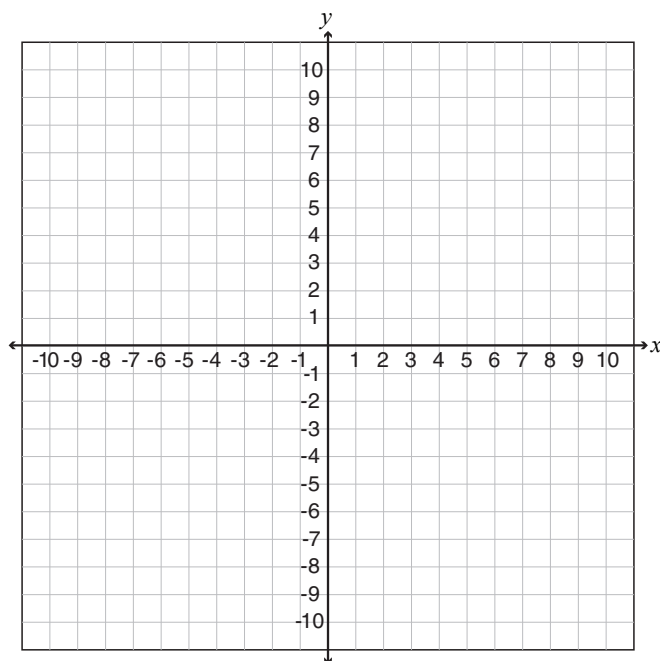
7	5
21	15
28	
	25

10. Emilio is plotting the location of bears at the zoo on a graph.

The bears are located at  
 $(4, 6)$ ,  $(4, -5)$ ,  $(-8, -5)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



# Acadience® Math / Concepts and Applications

## Level 6 / Progress Monitoring 1

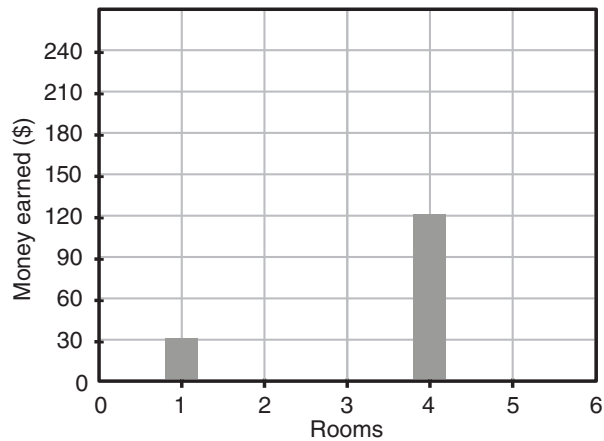
11. Avery gets paid for painting rooms. Avery earns \$30 for each room.

A. Fill in the table below to determine how much money Avery earned.

Room	Money Earned
1	\$30
2	
3	
4	\$120
5	

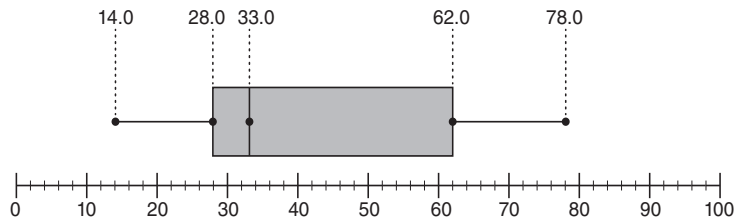
B. Write an equation that illustrates the relationship between the number of rooms ( $r$ ) and the money earned ( $m$ ): \_\_\_\_\_

C. Make a bar graph for the amount of money earned:



12. You bought 8 boxes of crackers for \$24. If all the boxes of crackers cost the same, what is the cost for each box of crackers?  
\$\_\_\_\_\_ per box of crackers.

13. Below is the number of minutes dog owners walked their dogs:



What is the range of the minutes walked? \_\_\_\_\_

What is the median number of the minutes walked? \_\_\_\_\_

What is the maximum number of the minutes walked? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-17$  feet. Diver B dove to  $-20$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

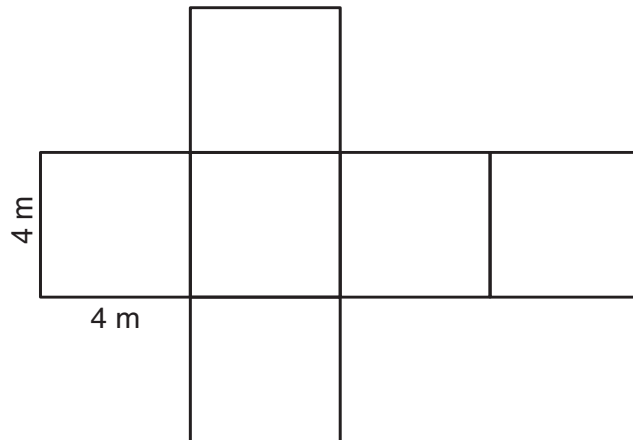
15.  $3^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 1**

16. Harry wanted to figure out the surface area of a box.

What is the surface area of the box?

\_\_\_\_\_  $\text{m}^2$ .



17. Griffin can run 2 miles in 12 minutes. If he runs at a constant speed, how long will it take him to run 5 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 42 and 56? \_\_\_\_\_

19. Paisley ate 7 more than 8 times the number of chocolates that Cooper ate.

Let  $C$  = the number of chocolates that Cooper ate.

Write an equation using  $x$  that describes how many chocolates Paisley ate. \_\_\_\_\_

20. Akari's house is 9 feet below sea level. Tristan's house is 8 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 2**

**Total:** \_\_\_\_\_

1. At the beach, there were 58 seagulls and 19 pelicans. What is the ratio of seagulls to pelicans? \_\_\_\_\_

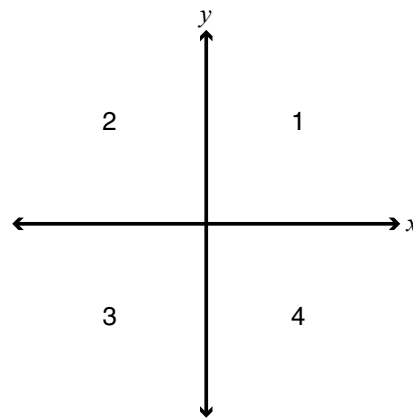
2. Tomas liked to draw comics. Each day he drew a certain number of comics. The following are the number of comics that Tomas drew per day: **1, 9, 4, 3, 8**.

A. What is the mean number of comics that Tomas drew? \_\_\_\_\_

B. What is the median number of comics that Tomas drew? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(-8, 7)	
(-4, -1)	
(4, 6)	
(2, -5)	4



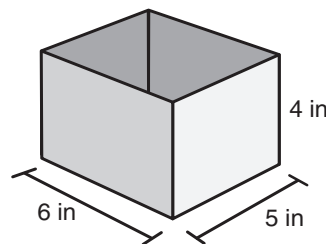
4. A. Write an expression for **9 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **8 added to  $x$** : \_\_\_\_\_

5. Alejandro has a box and a bag of blocks. The blocks are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many blocks will fit inside Alejandro's box?  
 \_\_\_\_\_ blocks.



6. Jacob does 6 chores every 2 weeks. At this rate, how many weeks will it take him to do 9 chores?  
 \_\_\_\_\_ week(s).

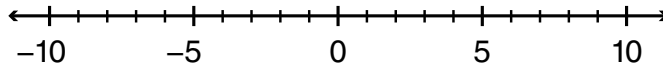
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 2**

7. Label the following numbers on the number line below:

a.  $-6$

b.  $-(-7)$

c.  $-5$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$33x + 9 < 100$	5	
$48x - 3 < 100$	7	

9. Complete the ratio table:

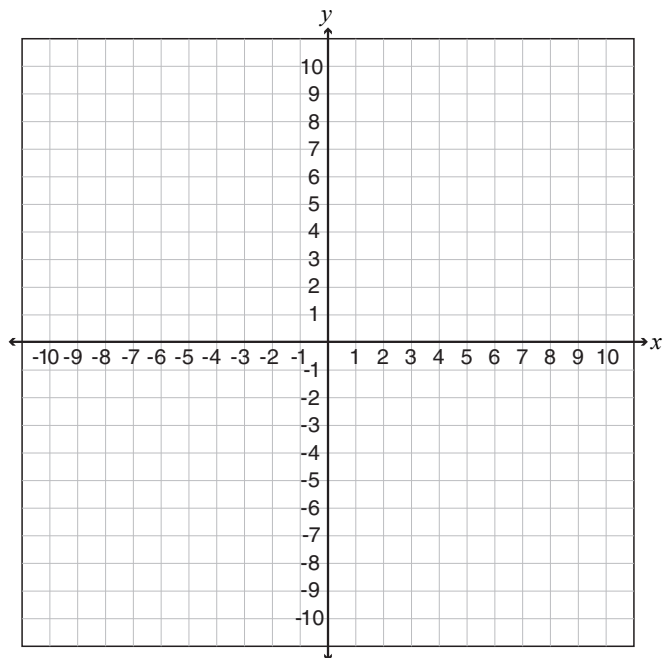
8	4
24	12
32	
	20

10. David is plotting the location of icebergs in the bay on a graph.

The icebergs are located at  
 $(3, 7)$ ,  $(3, -8)$ ,  $(-2, -8)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





# Acadience® Math / Concepts and Applications

## Level 6 / Progress Monitoring 2

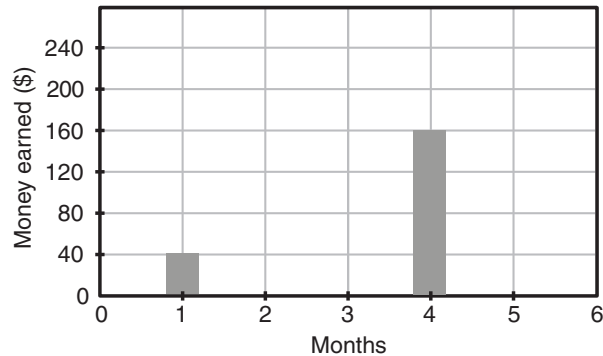
11. Max gets paid to mow lawns. Max earns \$40 per week.

A. Fill in the table below to determine how much money Max earned.

Month	Money Earned
1	\$40
2	
3	
4	\$160
5	

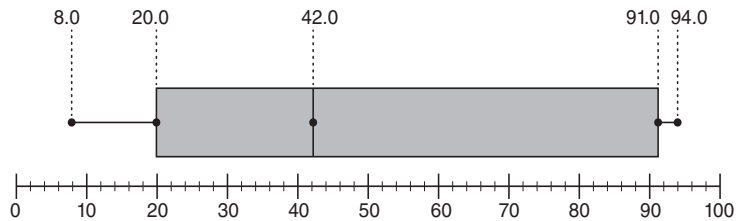
B. Write an equation that illustrates the relationship between the number of weeks ( $w$ ) and the money earned ( $m$ ): \_\_\_\_\_

C. Make a bar graph for the amount of money earned:



12. You bought 7 cans of tuna for \$21. If all the cans cost the same, what is the cost for each can of tuna?  
\$\_\_\_\_\_ per can of tuna.

13. Below is the number of minutes the athletes ran:



What is the range of the minutes run? \_\_\_\_\_

What is the median number of the minutes run? \_\_\_\_\_

What is the maximum number of the minutes run? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-38$  feet. Diver B dove to  $-73$  feet.

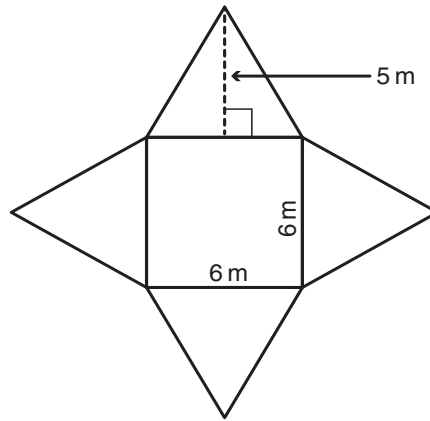
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $5^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 2**

16. Casey wanted to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_  $\text{m}^2$ .



17. Kim can run 5 miles in 35 minutes. If she runs at a constant speed, how long will it take her to run 7 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 12 and 21? \_\_\_\_\_

19. Robert scored 8 more than 2 times the touchdowns that Jason scored.

Let  $J$  = the number of touchdowns that Jason scored.

Write an equation using  $x$  that describes how many touchdowns Robert scored. \_\_\_\_\_

20. Violet's house is 5 feet below sea level. Miguel's house is 9 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 3**

**Total:** \_\_\_\_\_

1. In the garden there are 47 worms and 49 beetles. What is the ratio of worms to beetles? \_\_\_\_\_

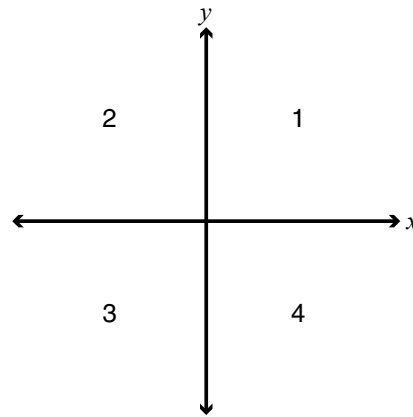
2. Madeline took a quiz each week in science class. The maximum score she can get on her quiz is 9 points. The following are her scores: **9, 7, 3, 4, 2**.

A. What is the mean of Madeline's scores? \_\_\_\_\_

B. What is the median of Madeline's scores? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(9, -5)	4
(-7, 6)	
(-6, -5)	
(6, 6)	



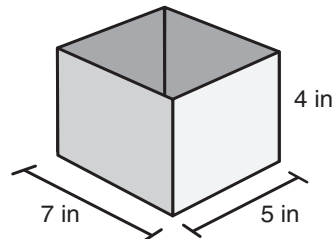
4. A. Write an expression for **3 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **4 added to  $x$** : \_\_\_\_\_

5. Joseph has a box and a bag of blocks. The blocks are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many blocks will fit inside Joseph's box?  
 \_\_\_\_\_ blocks.



6. Mika rides her bike 6 times every 3 weeks. At this rate, how many weeks will it take her to ride 8 times?  
 \_\_\_\_\_ week(s).

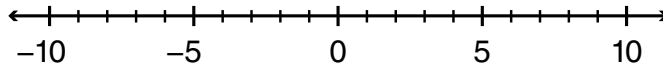
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 3**

7. Label the following numbers on the number line below:

a.  $-9$

b.  $-(-6)$

c.  $-5$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$45x - 6 < 100$	3	
$25x + 7 < 100$	5	

9. Complete the ratio table:

4	5
12	15
16	
	25

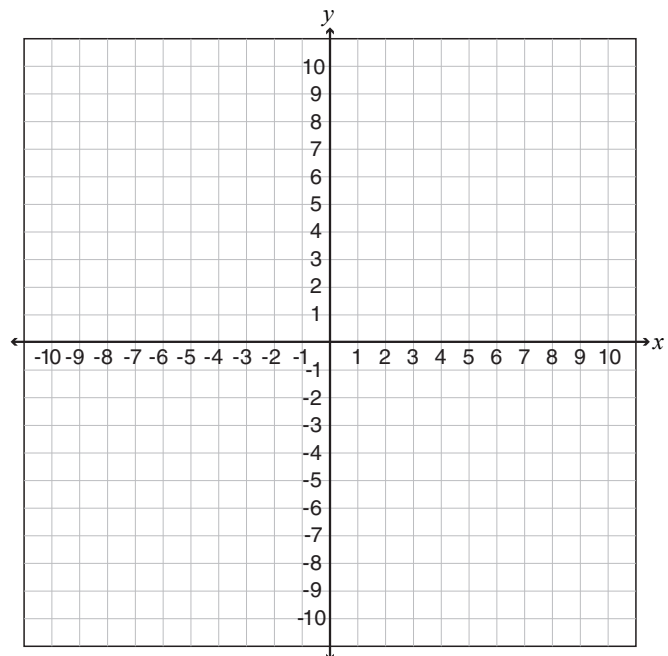
10. August is plotting the location of flowers on a graph.

The flowers are located at

$(2, 4)$ ,  $(2, -8)$ ,  $(-3, -8)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



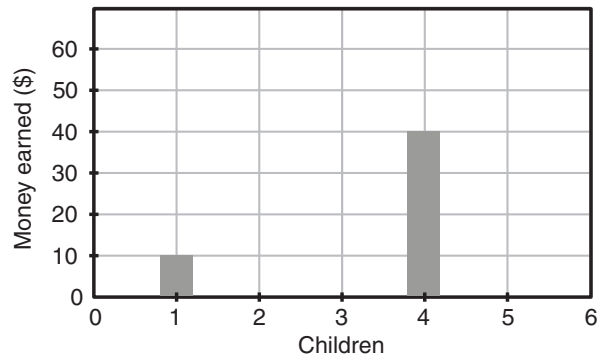
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 3**

11. Billy is paid \$10 for each child he babysits.

A. Fill in the table below to determine how much money Billy earned.

Child	Money Earned
1	\$10
2	
3	
4	\$40
5	

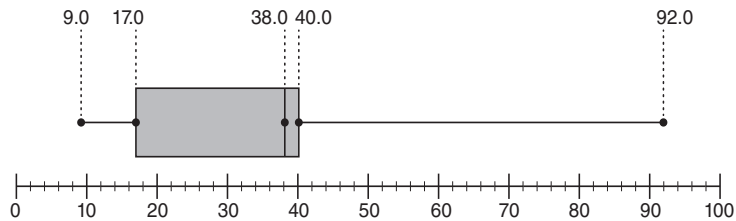
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of children ( $c$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 7 pool toys for \$63. If all the pool toys cost the same, what is the cost for each pool toy?  
 \$\_\_\_\_\_ per pool toy.

13. Below is the number of minutes that the class hiked:



What is the range of the minutes hiked? \_\_\_\_\_

What is the median number of the minutes hiked? \_\_\_\_\_

What is the maximum number of the minutes hiked? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-81$  feet. Diver B dove to  $-79$  feet.

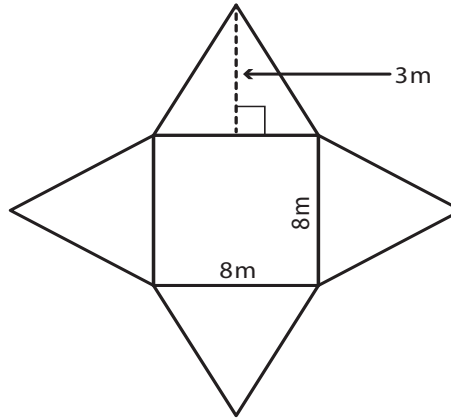
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $4^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 3**

16. Ali wanted to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_  $\text{m}^2$ .



17. Carlos can run 6 miles in 48 minutes. If he runs at a constant speed, how long will it take him to run 9 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 24 and 18? \_\_\_\_\_

19. Kim threw 6 more than 7 times the number of balls that Jan threw.

Let  $J$  = the number of balls that Jan threw.

Write an equation using  $x$  that describes how many balls Kim threw. \_\_\_\_\_

20. Nat's house is 2 feet below sea level. Anna's house is 4 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 4**

**Total:** \_\_\_\_\_

1. At the zoo there were 19 chimpanzees and 17 spider monkeys. What is the ratio of chimpanzees to spider monkeys?

\_\_\_\_\_

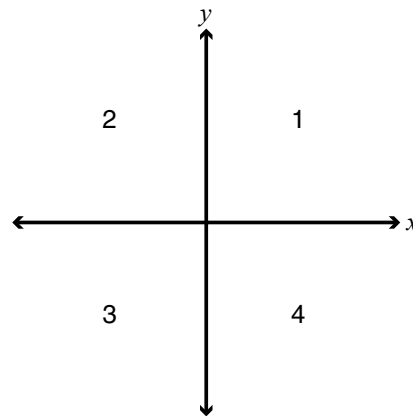
2. Riley counted the birds that landed at the bird feeder. Each morning he saw a certain number of birds. The following are the number of birds that Riley saw each morning: **2, 3, 5, 9, 1**.

A. What is the mean number of birds that Riley saw? \_\_\_\_\_

B. What is the median number of birds that Riley saw? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(5, 5)	
(-6, 5)	
(7, -2)	4
(-7, -3)	



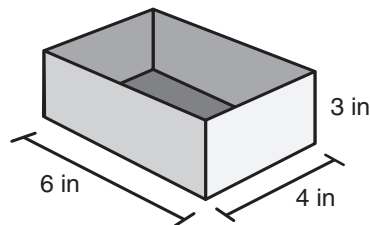
4. A. Write an expression for **2 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **3 added to  $x$** : \_\_\_\_\_

5. Lily has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Lily's box?  
 \_\_\_\_\_ dice.



6. It takes Fletcher 4 weeks to finish 2 paintings. At this rate, how long will it take him to finish 4 paintings?  
 \_\_\_\_\_ week(s).

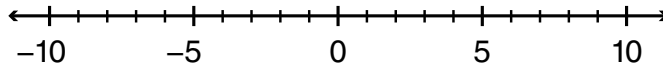
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 4**

7. Label the following numbers on the number line below:

a.  $-5$

b.  $-1$

c.  $-(-4)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$35x - 8 < 100$	2	
$27x + 8 < 100$	8	

9. Complete the ratio table:

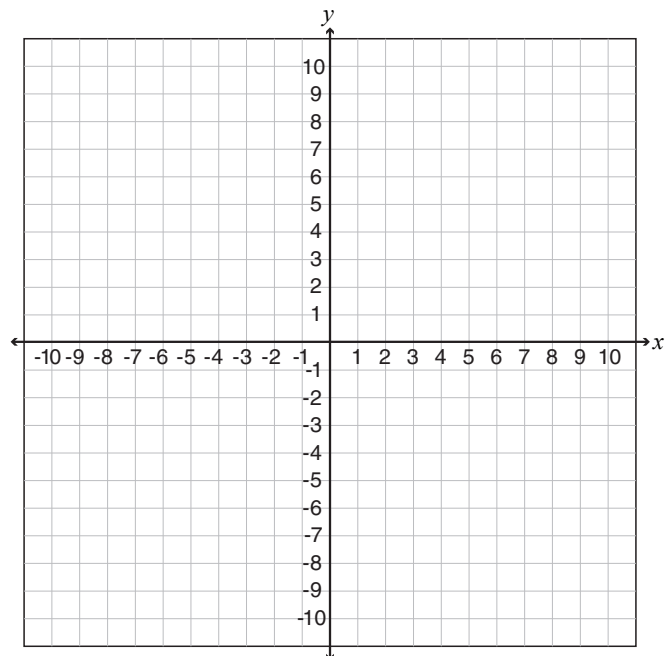
5	7
15	21
20	
	35

10. Hatfield is plotting the location of whales in the bay on a graph.

The whales are located at  
 $(9, 6)$ ,  $(9, -3)$ ,  $(-8, -3)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





# Acadience® Math / Concepts and Applications

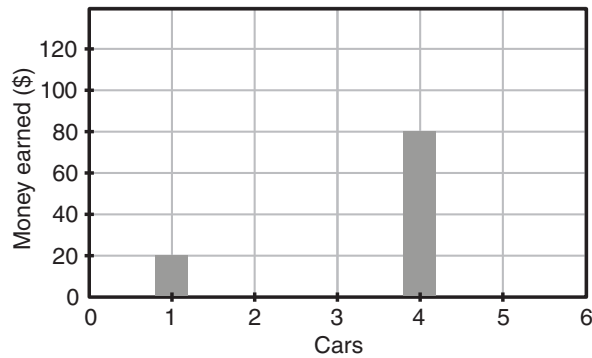
## Level 6 / Progress Monitoring 4

11. Maleah's basketball team is doing a car wash to raise money for their tournament. They earn \$20 for each car that they wash.

A. Fill in the table below to determine how much money Maleah's team earned.

Car	Money Earned
1	\$20
2	
3	
4	\$80
5	

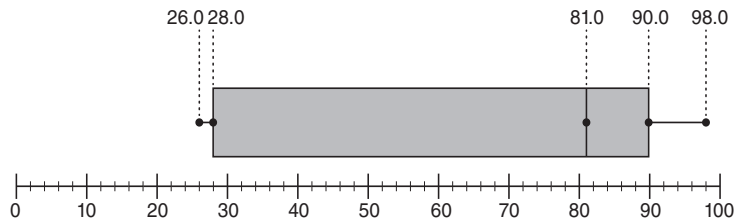
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of cars ( $c$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 8 loaves of bread for \$32. If all the loaves cost the same, what is the cost for each loaf of bread?  
\$\_\_\_\_\_ per loaf of bread.

13. Below is the number of minutes that the people jogged:



What is the range of the minutes jogged? \_\_\_\_\_

What is the median number of the minutes jogged? \_\_\_\_\_

What is the maximum number of the minutes jogged? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-46$  feet. Diver B dove to  $-55$  feet.

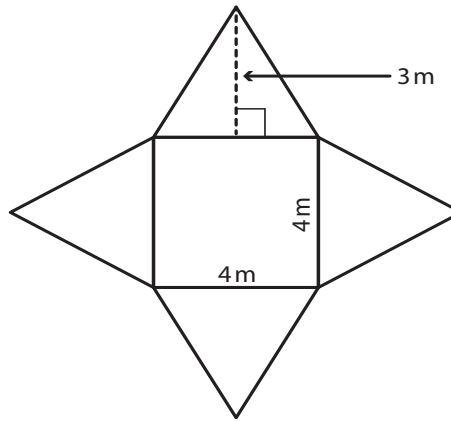
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $5^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 4**

16. Dan wanted to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_  $\text{m}^2$ .



17. Astrid can run 5 miles in 40 minutes. If she runs at a constant speed, how long will it take her to run 7 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 18 and 81? \_\_\_\_\_

19. Zoe scores 4 more than 7 times the goals that Dorian scored.

Let  $D$  = the number of goals that Dorian scored.

Write an equation using  $x$  that describes how many goals Zoe scored. \_\_\_\_\_

20. Joe's house is 6 feet below sea level. Stella's house is 2 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 5**

**Total:** \_\_\_\_\_

1. On the farm, there are 82 chickens and 73 turkeys. What is the ratio of chickens to turkeys? \_\_\_\_\_

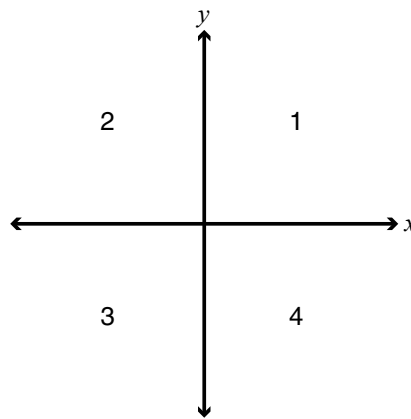
2. Alex found seashells on the beach. Each day he found a certain number of seashells. The following are the number of seashells that Alex found each day: **9, 7, 3, 4, 2**.

A. What is the mean number of seashells that Alex found? \_\_\_\_\_

B. What is the median number of seashells that Alex found? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-1, 8)$	
$(-5, -6)$	
$(8, -5)$	4
$(7, 7)$	



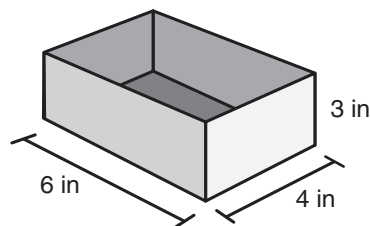
4. A. Write an expression for **6 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **9 added to  $x$** : \_\_\_\_\_

5. Mateo has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Mateo's box?  
 \_\_\_\_\_ dice.



6. Marge reads 8 books every 4 weeks. At this rate, how long will it take her to read 6 books?

\_\_\_\_\_ week(s).

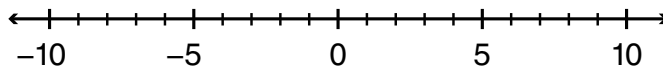
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 5**

7. Label the following numbers on the number line below:

a.  $-6$

b.  $-5$

c.  $-(-4)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$18x + 8 < 100$	3	
$14x - 4 < 100$	5	

9. Complete the ratio table:

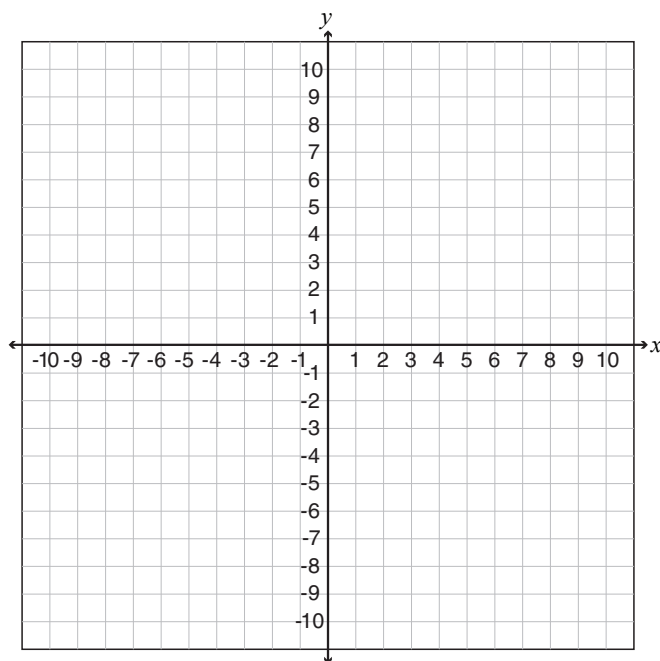
9	6
27	18
36	
	30

10. Yanna is plotting the location of lions at the zoo on a graph.

The lions are located at  
 $(2, 7)$ ,  $(2, -4)$ ,  $(-9, -4)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



# Acadience® Math / Concepts and Applications

## Level 6 / Progress Monitoring 5

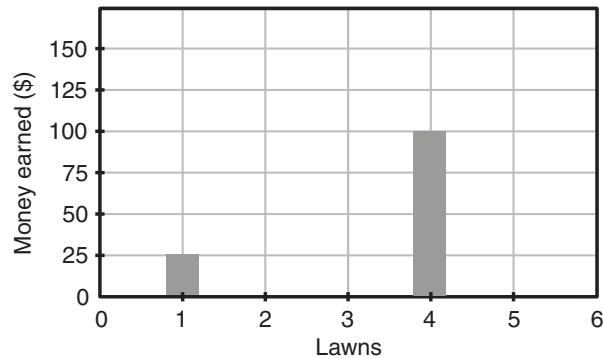
11. Elsie has a summer job mowing lawns. Elsie earns \$25 per lawn.

A. Fill in the table below to determine how much money Elsie earned.

Lawns	Money Earned
1	\$25
2	
3	
4	\$100
5	

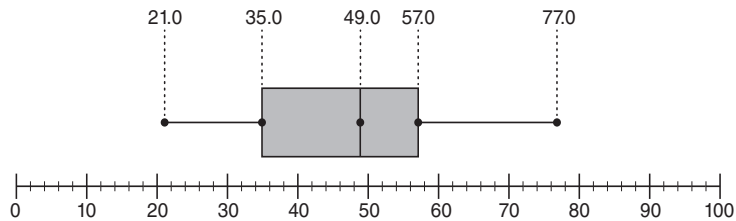
B. Write an equation that illustrates the relationship between the number of lawns ( $l$ ) and the money earned ( $m$ ): \_\_\_\_\_

C. Make a bar graph for the amount of money earned:



12. You bought 9 pies for \$63. If all the pies cost the same, what is the cost for each pie?  
\$\_\_\_\_\_ per pie.

13. Below is the number of minutes that the elephants spent eating grass:



What is the range of the minutes spent eating? \_\_\_\_\_

What is the median number of minutes spent eating? \_\_\_\_\_

What is the maximum number of minutes spent eating? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-15$  feet. Diver B dove to  $-14$  feet.

Which diver dove deeper? \_\_\_\_\_

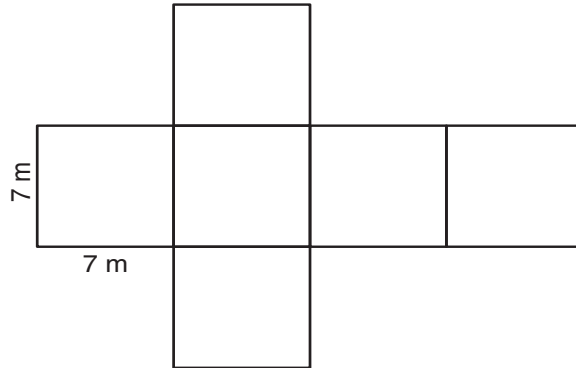
Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $4^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 5**

16. Rafael wanted to figure out the surface area of a box. What is the surface area of the box?

\_\_\_\_\_  $\text{m}^2$ .



17. Peyton can run 2 miles in 14 minutes. If she runs at a constant speed, how long will it take her to run 4 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 32 and 16? \_\_\_\_\_

19. Titus won 6 more than 9 times the tickets that Ellie won.

Let  $E$  = the number of tickets that Ellie won.

Write an equation using  $x$  that describes how many tickets Titus won. \_\_\_\_\_

20. José's house is 7 feet below sea level. Rick's house is 5 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications  
Level 6 / Progress Monitoring 6**

**Total:** \_\_\_\_\_

1. At the park, there were 69 trees and 95 bushes. What is the ratio of trees to bushes? \_\_\_\_\_

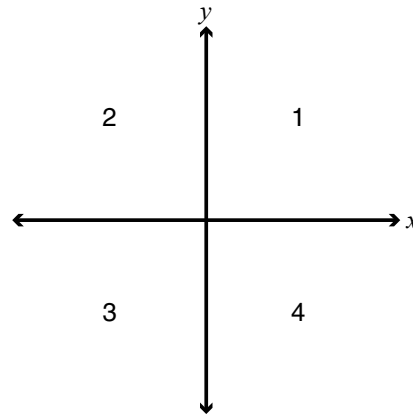
2. Miles likes to draw. Each day he draws a certain number of pictures. The following are the number of pictures that Miles drew per day: **4, 9, 2, 7, 3**.

A. What is the mean number of pictures that Miles drew? \_\_\_\_\_

B. What is the median number of pictures that Miles drew? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-6, -1)$	
$(-6, 9)$	
$(3, -2)$	4
$(9, 8)$	



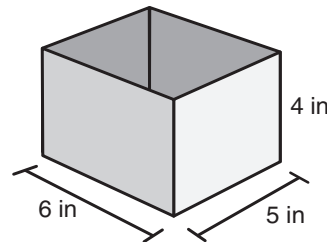
4. A. Write an expression for **5 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **4 added to  $x$** : \_\_\_\_\_

5. Doug has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Doug's box?  
\_\_\_\_\_ dice.



6. Tim hikes 8 miles in 2 weeks. At this rate, how long will it take him to hike 4 miles?  
\_\_\_\_\_ week(s).

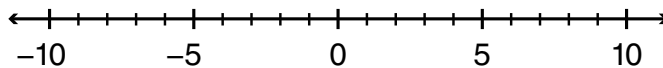
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 6**

7. Label the following numbers on the number line below:

a.  $-7$

b.  $-(-2)$

c.  $-4$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$24x + 8 < 100$	4	
$42x - 7 < 100$	9	

9. Complete the ratio table:

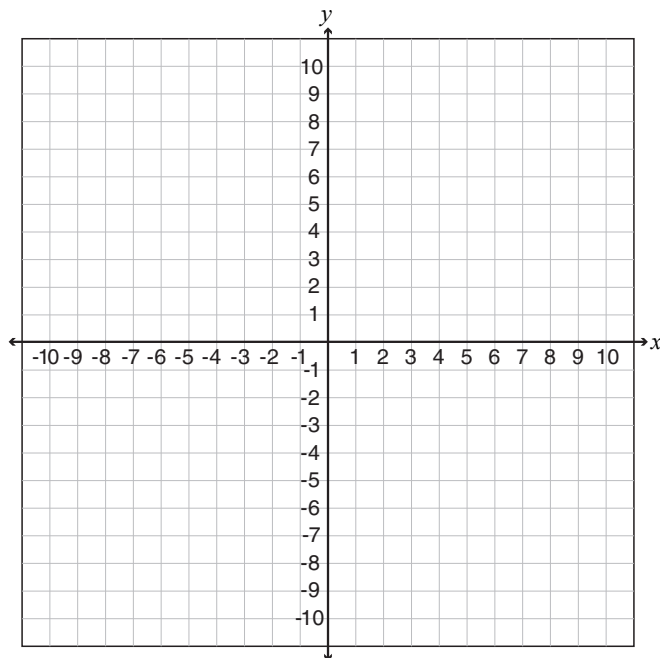
6	9
18	27
24	
	45

10. Ken is plotting the location of ponds on a graph.

The ponds are located at  
 $(7, 4)$ ,  $(7, -3)$ ,  $(-6, -3)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





# Acadience® Math / Concepts and Applications

## Level 6 / Progress Monitoring 6

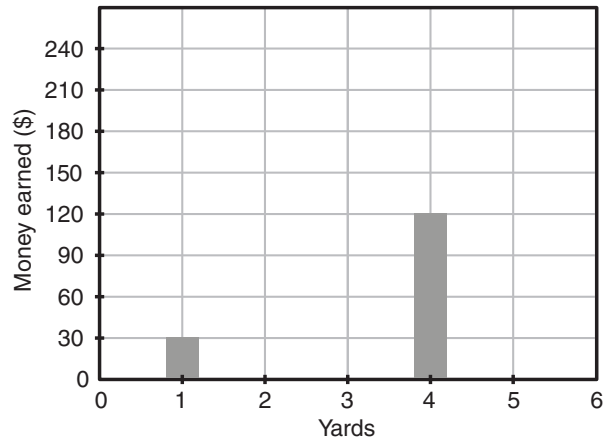
11. Margaret is paid for mowing yards. She earns \$30 per yard.

A. Fill in the table below to determine how much money Margaret earned.

Yards	Money Earned
1	\$30
2	
3	
4	\$120
5	

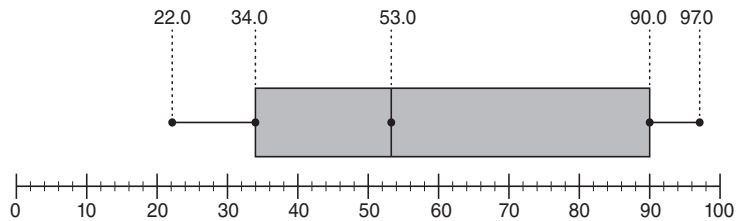
B. Write an equation that illustrates the relationship between the number of yards ( $y$ ) and the money earned ( $m$ ): \_\_\_\_\_

C. Make a bar graph for the amount of money earned:



12. You bought 5 notebooks for \$30. If all the notebooks cost the same, what is the cost for each notebook?  
\$\_\_\_\_\_ per notebook.

13. Below is the number of minutes people in a neighborhood spent raking leaves:



What is the range of the minutes spent raking leaves? \_\_\_\_\_

What is the median number of minutes spent raking leaves? \_\_\_\_\_

What is the maximum number of minutes spent raking leaves? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-49$  feet. Diver B dove to  $-60$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

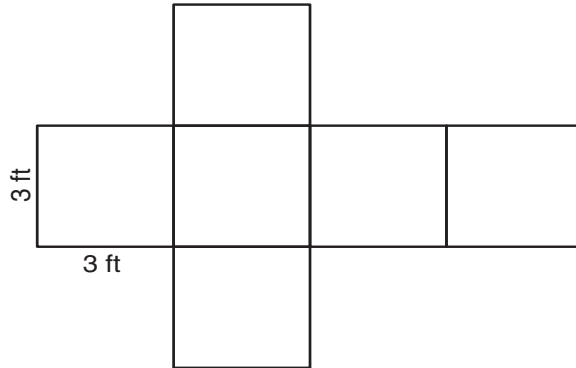
15.  $2^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 6**

16. Fred wants to figure out the surface area of the box.

What is the surface area of the box?

\_\_\_\_\_  $\text{ft}^2$ .



17. Eric bikes 4 miles in 36 minutes. If he bikes at a constant speed, how long will it take him to bike 7 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 45 and 18? \_\_\_\_\_

19. José eats 6 more than 4 times the cherries that Sara eats.

Let  $S$  = the number of cherries that Sara eats.

Write an equation using  $x$  that describes how many cherries José eats. \_\_\_\_\_

20. Jack's house is 9 feet below sea level. Camila's house is 7 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 7**

**Total:** \_\_\_\_\_

1. At the lake, there were 35 canoes and 53 boats. What is the ratio of canoes to boats? \_\_\_\_\_

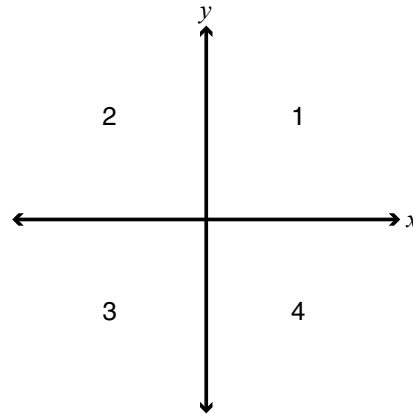
2. Dominic walks dogs. Each day he walks a certain number of dogs. The following are the number of dogs that Dominic walked per day: **3, 1, 9, 8, 4**.

A. What is the mean number of dogs that Dominic walked? \_\_\_\_\_

B. What is the median number of dogs that Dominic walked? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(3, 7)	
(5, -6)	4
(-8, -1)	
(-1, 2)	



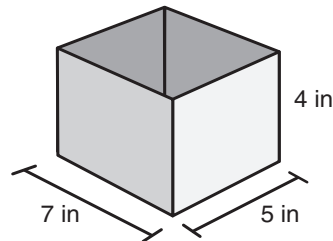
4. A. Write an expression for **6 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **5 added to  $x$** : \_\_\_\_\_

5. Fred has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Fred's box?  
 \_\_\_\_\_ dice.



6. Sam bakes 6 cakes in 3 weeks. At this rate, how long will it take him to bake 8 cakes?  
 \_\_\_\_\_ week(s).

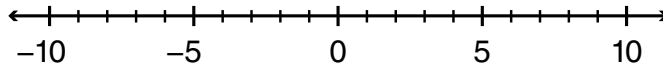
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 7**

7. Label the following numbers on the number line below:

a.  $-4$

b.  $-2$

c.  $-(-9)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$22x + 4 < 100$	5	
$34x - 5 < 100$	7	

9. Complete the ratio table:

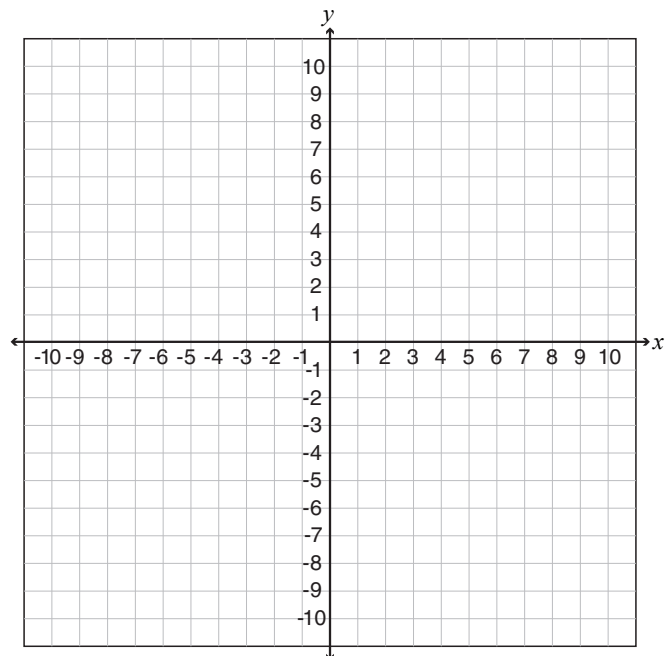
6	7
18	21
24	
	35

10. Mary is plotting the location of farms on a graph.

The farms are located at  
 $(4, 7)$ ,  $(4, -2)$ ,  $(-8, -2)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



# Acadience® Math / Concepts and Applications

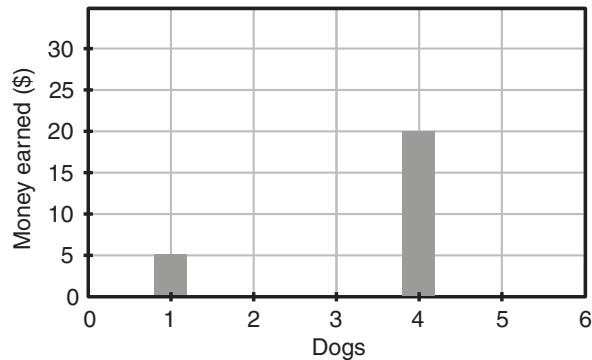
## Level 6 / Progress Monitoring 7

11. Roy is paid for walking dogs. He earns \$5 per dog.

A. Fill in the table below to determine how much money Roy earned.

Dogs	Money Earned
1	\$5
2	
3	
4	\$20
5	

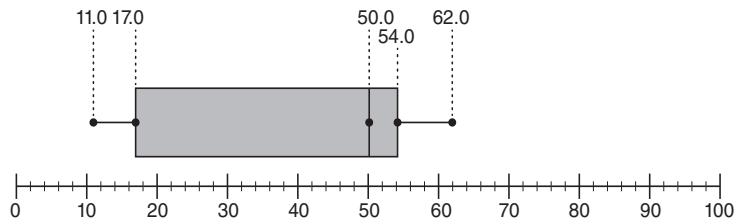
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of dogs ( $d$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 5 paintbrushes for \$15. If all the paintbrushes cost the same, what is the cost for each paintbrush?  
\$\_\_\_\_\_ per paintbrush.

13. Below is the number of minutes students spent on science projects:



What is the range of the minutes spent on science projects? \_\_\_\_\_

What is the median number of minutes spent on science projects? \_\_\_\_\_

What is the maximum number of minutes spent on science projects? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-92$  feet. Diver B dove to  $-23$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

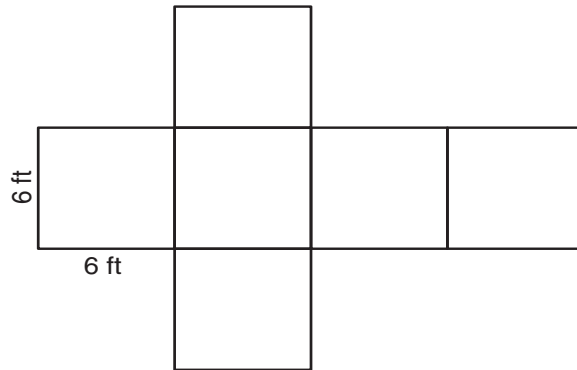
15.  $5^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 7**

16. John wants to figure out the surface area of the box.

What is the surface area of the box?

\_\_\_\_\_  $\text{ft}^2$ .



17. Jamal runs 3 miles in 21 minutes. If he runs at a constant speed, how long will it take him to run 8 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 24 and 30? \_\_\_\_\_

19. Zoe eats 6 more than 9 times the jelly beans that Jesse eats.

Let  $J$  = the number of jelly beans that Jesse eats.

Write an equation using  $x$  that describes how many jelly beans Zoe eats. \_\_\_\_\_

20. Hope's house is 5 feet below sea level. George's house is 6 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 8**

1. In the forest, there were 14 foxes and 35 rabbits. What is the ratio of foxes to rabbits? \_\_\_\_\_

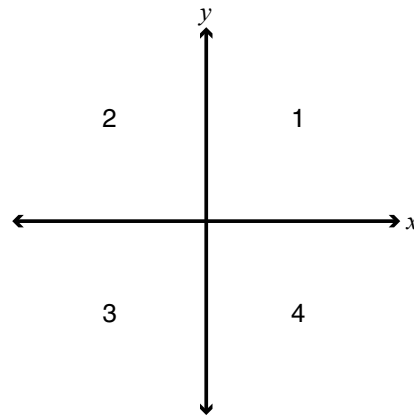
2. Charlotte likes to go running. Each day she runs a certain number of miles. The following are the number of miles that Charlotte ran per day: **9, 7, 8, 2, 4**.

A. What is the mean number of miles that Charlotte ran? \_\_\_\_\_

B. What is the median number of miles that Charlotte ran? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-7, 6)$	
$(5, -4)$	4
$(4, 4)$	
$(-6, -4)$	



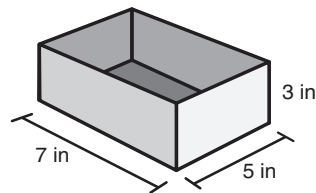
4. A. Write an expression for **7 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **4 added to  $x$** : \_\_\_\_\_

5. Emily has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Emily's box?  
 \_\_\_\_\_ dice.



6. Ray makes 9 pies in 3 weeks. At this rate, how long will it take him to make 6 pies?  
 \_\_\_\_\_ week(s).

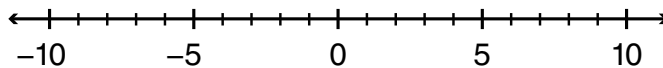
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 8**

7. Label the following numbers on the number line below:

a.  $-(-4)$

b.  $-6$

c.  $-5$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$15x + 9 < 100$	7	
$39x - 6 < 100$	4	

9. Complete the ratio table:

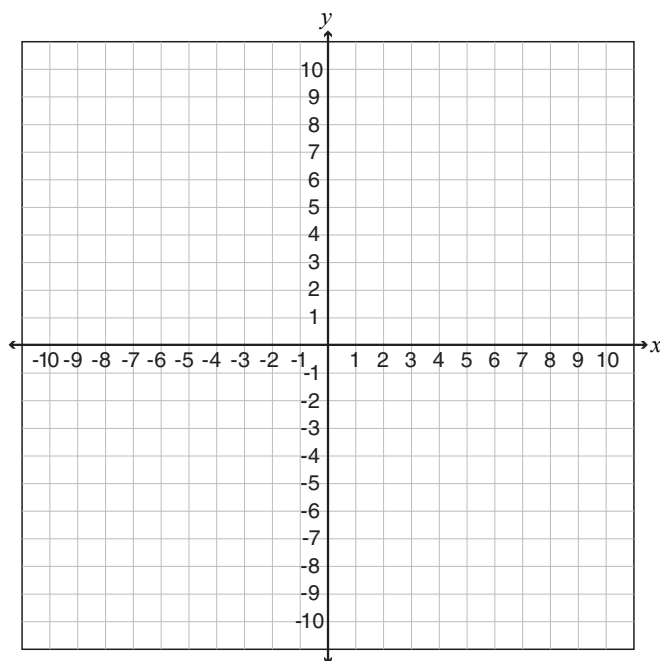
4	8
12	24
16	
	40

10. Liam is plotting the location of slides on a graph.

The slides are located at  
 $(2, 9)$ ,  $(2, -7)$ ,  $(-5, -7)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





# Acadience® Math / Concepts and Applications

## Level 6 / Progress Monitoring 8

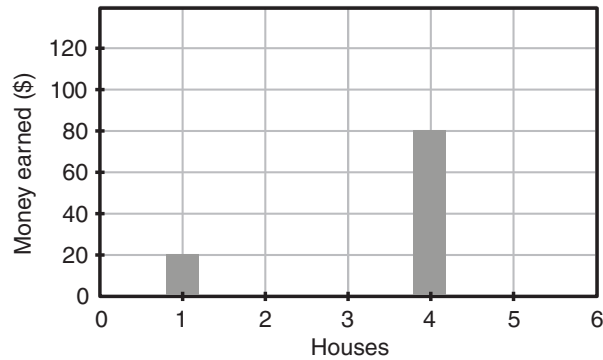
11. Lincoln is paid for house sitting. He earns \$20 per house.

A. Fill in the table below to determine how much money Lincoln earned.

Houses	Money Earned
1	\$20
2	
3	
4	\$80
5	

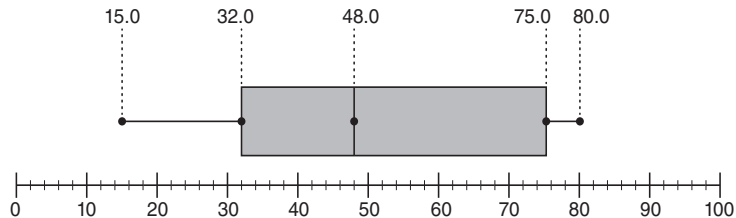
B. Write an equation that illustrates the relationship between the number of houses ( $h$ ) and the money earned ( $m$ ): \_\_\_\_\_

C. Make a bar graph for the amount of money earned:



12. You bought 9 boxes of pens for \$27. If all the boxes of pens cost the same, what is the cost for each box of pens?  
\$\_\_\_\_\_ per box of pens.

13. Below is the number of minutes gardeners spent planting seeds:



What is the range of the minutes gardeners spent planting seeds? \_\_\_\_\_

What is the median number of minutes gardeners spent planting seeds? \_\_\_\_\_

What is the maximum number of minutes gardeners spent planting seeds? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-83$  feet. Diver B dove to  $-76$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

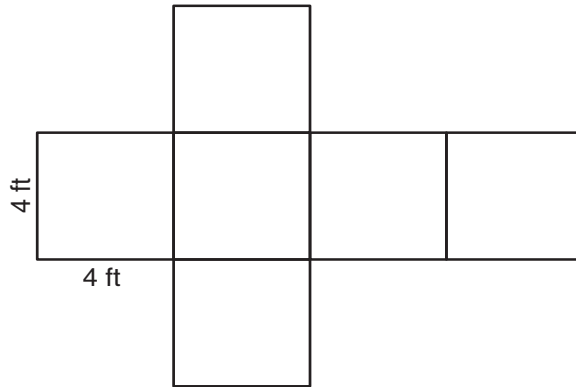
15.  $2^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 8**

16. Hank wants to figure out the surface area of the box.

What is the surface area of the box?

\_\_\_\_\_  $\text{ft}^2$ .



17. Maria runs 5 miles in 30 minutes. If she runs at a constant speed, how long will it take her to run 8 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 40 and 48? \_\_\_\_\_

19. Natalie scores 2 more than 6 times the ping pong points that Diego scores.

Let  $D$  = the number of ping pong points that Diego scores.

Write an equation using  $x$  that describes how many ping pong points Natalie scores. \_\_\_\_\_

20. Ron's house is 7 feet below sea level. Pete's house is 6 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications  
Level 6 / Progress Monitoring 9**

**Total:** \_\_\_\_\_

1. In the pond, there were 66 fish and 91 frogs. What is the ratio of fish to frogs? \_\_\_\_\_

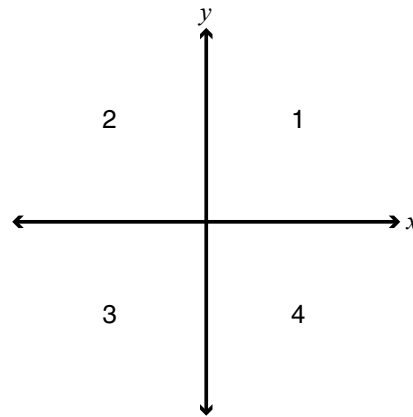
2. Ben plays basketball. Each day he scores a certain number of times. The following are the number of times that Ben scored per day: **3, 1, 6, 8, 2**.

A. What is the mean number of times that Ben scored? \_\_\_\_\_

B. What is the median number of times that Ben scored? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(1, 8)	
(-2, -6)	
(-2, 7)	
(8, -9)	4



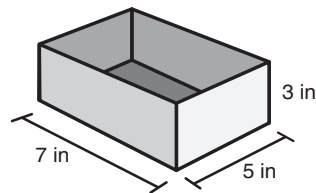
4. A. Write an expression for **6 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **9 added to  $x$** : \_\_\_\_\_

5. Joseph has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Joseph's box?  
\_\_\_\_\_ dice.



6. Kylie reads 8 comic books in 2 weeks. At this rate, how long will it take her to read 4 comic books?  
\_\_\_\_\_ week(s).

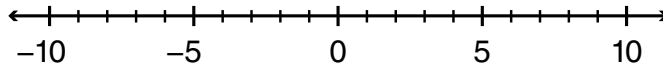
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 9**

7. Label the following numbers on the number line below:

a.  $-(-3)$

b.  $-6$

c.  $-2$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$30x + 3 < 100$	3	
$37x - 8 < 100$	5	

9. Complete the ratio table:

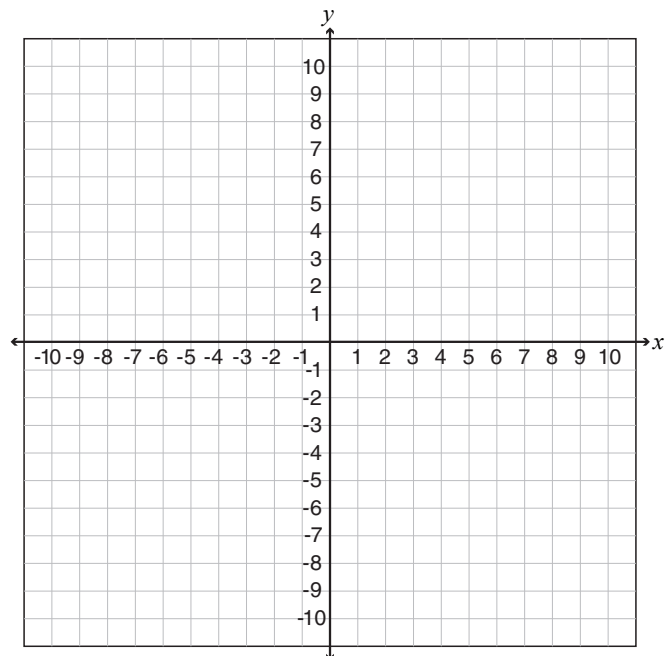
6	8
18	24
24	
	40

10. Louise is plotting the location of book stores on a graph.

The book stores are located at  
 $(7, 8)$ ,  $(7, -4)$ ,  $(-3, -4)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



# Acadience® Math / Concepts and Applications

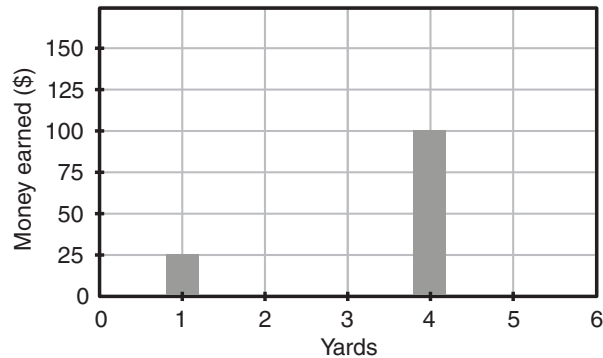
## Level 6 / Progress Monitoring 9

11. Emerson is paid for doing yard work. He earns \$25 per yard.

A. Fill in the table below to determine how much money Emerson earned.

Yards	Money Earned
1	\$25
2	
3	
4	\$100
5	

C. Make a bar graph for the amount of money earned:

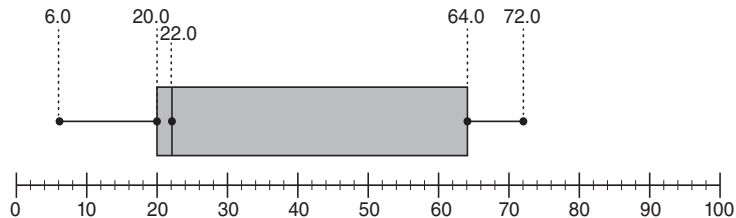


B. Write an equation that illustrates the relationship between the number of yards ( $y$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 6 t-shirts for \$54. If all the t-shirts cost the same, what is the cost for each t-shirt?

\$\_\_\_\_\_ per t-shirt.

13. Below is the number of minutes people spent at the grocery store:



What is the range of the minutes people spent at the grocery store? \_\_\_\_\_

What is the median number of minutes people spent at the grocery store? \_\_\_\_\_

What is the maximum number of minutes people spent at the grocery store? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-69$  feet. Diver B dove to  $-89$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

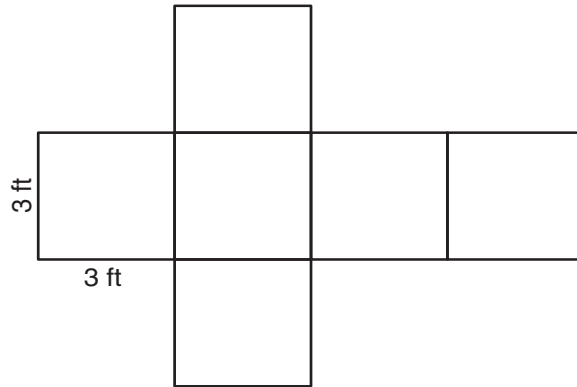
15.  $5^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 9**

16. Rick wants to figure out the surface area of the box.

What is the surface area of the box?

\_\_\_\_\_  $\text{ft}^2$ .



17. Sage runs 3 miles in 18 minutes. If she runs at a constant speed, how long will it take her to run 7 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 28 and 35? \_\_\_\_\_

19. Oliver scores 2 more than 7 times the points that Lynn scores.

Let  $L$  = the number of points that Lynn scores.

Write an equation using  $x$  that describes how many points Oliver scores. \_\_\_\_\_

20. Harry's house is 4 feet below sea level. Sonia's house is 9 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 10**

**Total:** \_\_\_\_\_

1. In the garden, there were 63 flowers and 65 weeds. What is the ratio of flowers to weeds? \_\_\_\_\_

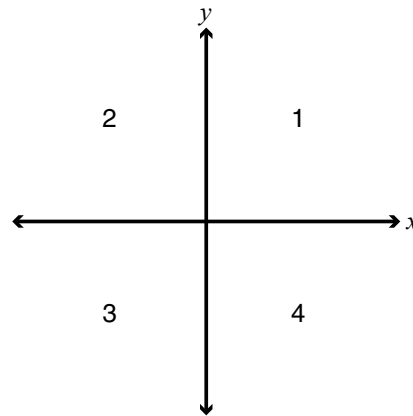
2. Cassie likes to make paper airplanes. Each day she makes a certain number of paper airplanes. The following are the number of paper airplanes that Cassie made per day: **3, 8, 1, 2, 6**.

A. What is the mean number of paper airplanes that Cassie made? \_\_\_\_\_

B. What is the median number of paper airplanes that Cassie made? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-2, 8)$	
$(7, 5)$	
$(-5, -6)$	
$(7, -9)$	4



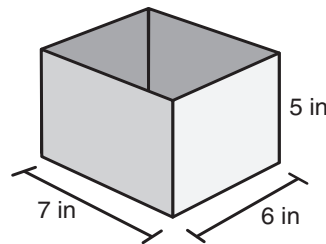
4. A. Write an expression for **8 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **3 added to  $x$** : \_\_\_\_\_

5. Lisa has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Lisa's box?  
 \_\_\_\_\_ dice.



6. Tony eats 6 apples in 3 weeks. At this rate, how long will it take him to eat 8 apples?  
 \_\_\_\_\_ week(s).

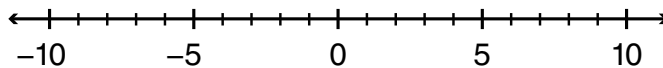
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 10**

7. Label the following numbers on the number line below:

a.  $-5$

b.  $-(-3)$

c.  $-8$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$39x + 9 < 100$	2	
$14x - 8 < 100$	4	

9. Complete the ratio table:

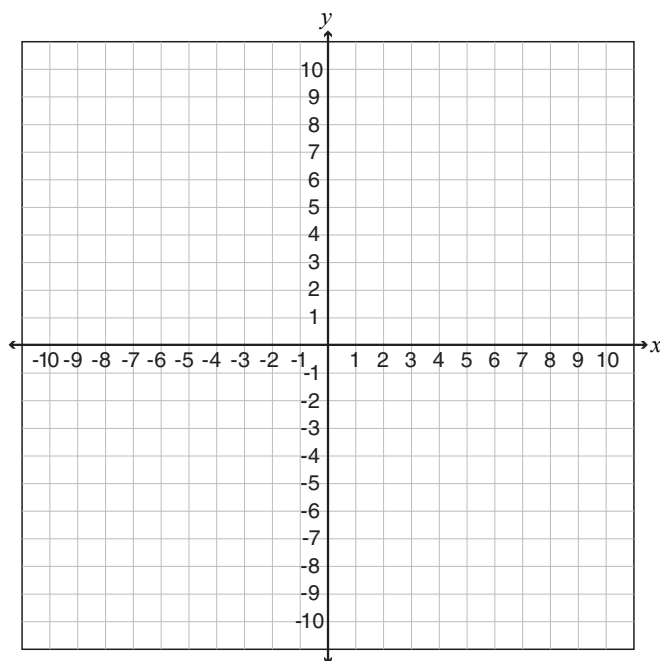
9	6
27	18
36	
	30

10. Ruby is plotting the location of swimming pools on a graph.

The swimming pools are located at  $(7, 8)$ ,  $(7, -2)$ ,  $(-5, -2)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





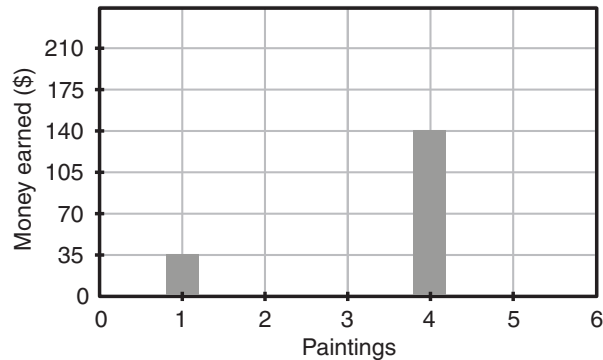
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 10**

11. Ross sells paintings. He earns \$35 per painting.

A. Fill in the table below to determine how much money Ross earned.

Paintings	Money Earned
1	\$35
2	
3	
4	\$140
5	

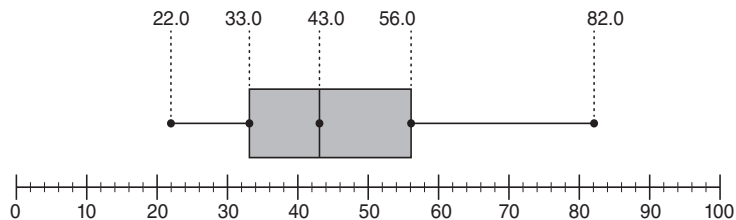
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of paintings ( $p$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 8 jars of jelly for \$40. If all the jars of jelly cost the same, what is the cost for each jar of jelly?  
 \$\_\_\_\_\_ per jar of jelly.

13. Below is the number of minutes farmers spent planting tomatoes:



What is the range of the minutes farmers spent planting tomatoes? \_\_\_\_\_

What is the median number of minutes farmers spent planting tomatoes? \_\_\_\_\_

What is the maximum number of minutes farmers spent planting tomatoes? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-17$  feet. Diver B dove to  $-93$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

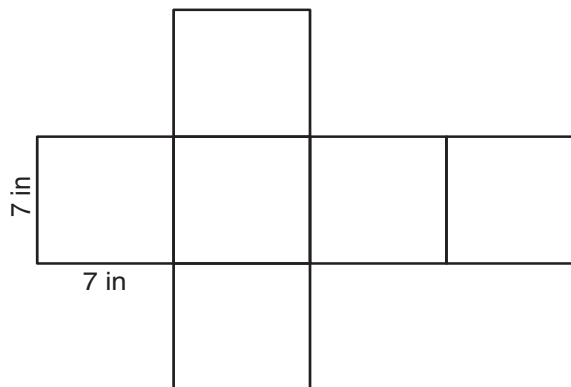
15.  $3^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 10**

16. Paul wants to figure out the surface area of the box.

What is the surface area of the box?

\_\_\_\_\_ in<sup>2</sup>.



17. Tucker runs 2 miles in 14 minutes. If he runs at a constant speed, how long will it take him to run 5 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 24 and 40? \_\_\_\_\_

19. Kim has 9 more than 5 times the marbles that Sam has.

Let  $S$  = the number of marbles that Sam has.

Write an equation using  $x$  that describes how many marbles Kim has. \_\_\_\_\_

20. Martin's house is 7 feet below sea level. Sanjay's house is 3 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 11**

**Total:** \_\_\_\_\_

1. In the yard, there were 15 chickens and 22 chicks. What is the ratio of chickens to chicks? \_\_\_\_\_

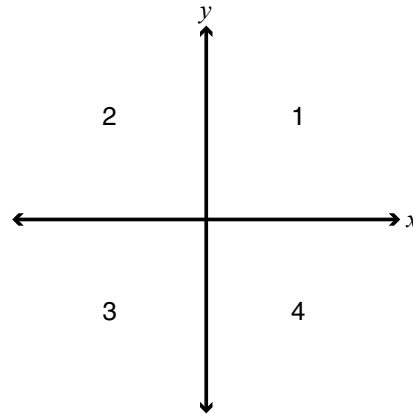
2. Denzel likes to go hiking. Each day he hikes a certain number of miles. The following are the number of miles that Denzel hiked per day: **1, 3, 7, 3, 6**.

A. What is the mean number of miles that Denzel hiked? \_\_\_\_\_

B. What is the median number of miles that Denzel hiked? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(1, -7)	4
(-7, -2)	
(8, 2)	
(-3, 2)	



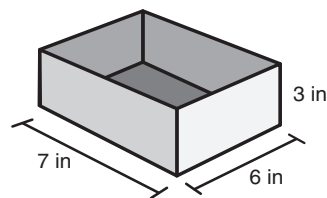
4. A. Write an expression for **7 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **2 added to  $x$** : \_\_\_\_\_

5. Nick has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Nick's box?  
 \_\_\_\_\_ dice.



6. Meg writes 6 songs in 2 weeks. At this rate, how long will it take her to write 3 songs?  
 \_\_\_\_\_ week(s).

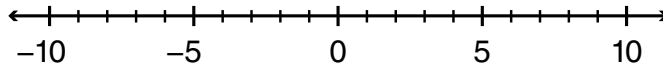
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 11**

7. Label the following numbers on the number line below:

a.  $-(-9)$

b.  $-4$

c.  $-1$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$17x + 8 < 100$	5	
$42x - 9 < 100$	3	

9. Complete the ratio table:

5	4
15	12
20	
	20

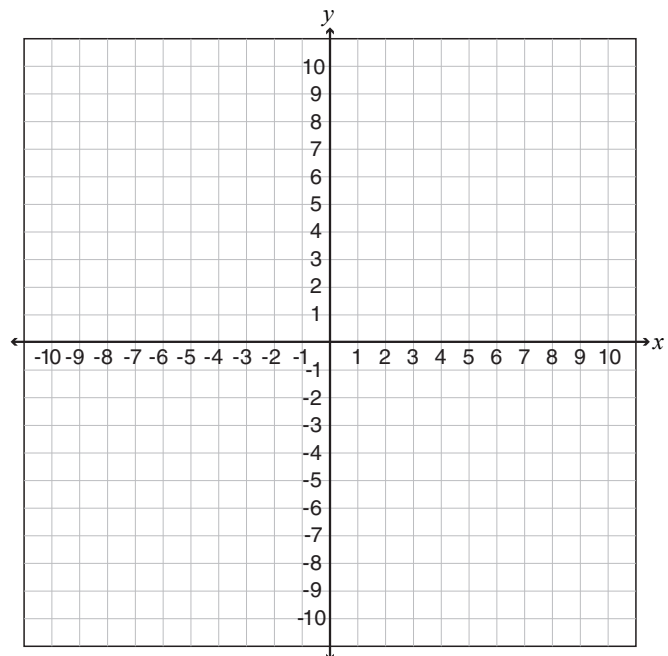
10. Felix is plotting the location of submarines on a graph.

The submarines are located at

$(2, 6)$ ,  $(2, -3)$ ,  $(-9, -3)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 11**

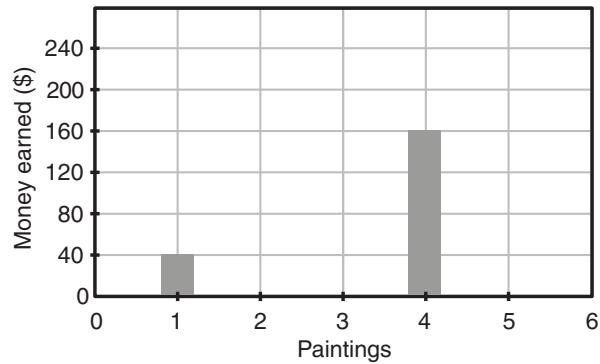
11. Rose earns money for painting art. She earns \$40 per painting.

A. Fill in the table below to determine how much money Rose earned.

Paintings	Money Earned
1	\$40
2	
3	
4	\$160
5	

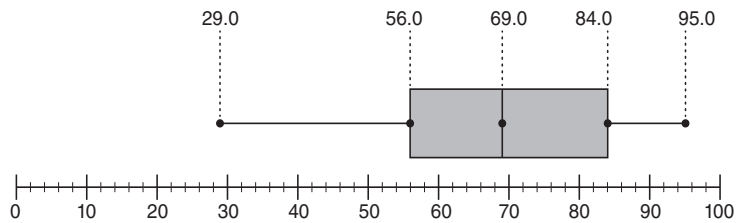
B. Write an equation that illustrates the relationship between the number of paintings ( $p$ ) and the money earned ( $m$ ): \_\_\_\_\_

C. Make a bar graph for the amount of money earned:



12. You bought 3 journals for \$27. If all the journals cost the same, what is the cost for each journal?  
 \$\_\_\_\_\_ per journal.

13. Below is the number of minutes kids spent running on the playground:



What is the range of the minutes kids spent running on the playground? \_\_\_\_\_

What is the median number of minutes kids spent running on the playground? \_\_\_\_\_

What is the maximum number of minutes kids spent running on the playground? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-65$  feet. Diver B dove to  $-95$  feet.

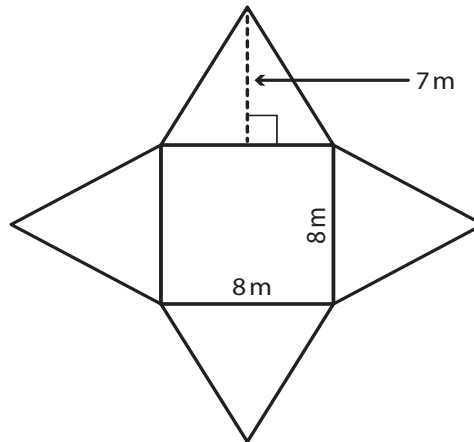
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $5^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 11**

16. Hope wants to figure out the surface area of the pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_  $\text{m}^2$ .



17. Pablo bikes 5 miles in 45 minutes. If he bikes at a constant speed, how long will it take him to bike 7 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 54 and 42? \_\_\_\_\_

19. Lucy eats 8 more than 9 times the peanuts that Mason eats.

Let  $M$  = the number of peanuts that Mason eats.

Write an equation using  $x$  that describes how many peanuts Lucy eats. \_\_\_\_\_

20. Matt's house is 6 feet below sea level. Mark's house is 9 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 12**

**Total:** \_\_\_\_\_

1. At the animal shelter, there were 53 kittens and 41 puppies. What is the ratio of kittens to puppies? \_\_\_\_\_

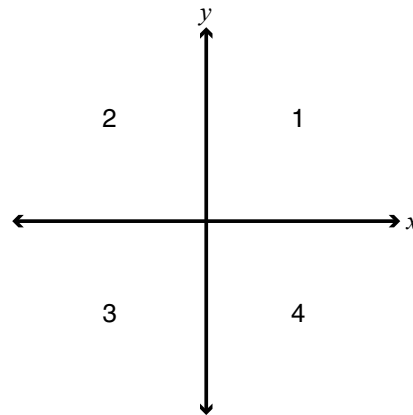
2. Beth fixes bikes. Each day she fixes a certain number of bikes. The following are the number of bikes that Beth fixed per day: **4, 9, 2, 3, 7**.

A. What is the mean number of bikes that Beth fixed? \_\_\_\_\_

B. What is the median number of bikes that Beth fixed? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(1, -7)	4
(-9, 8)	
(5, 1)	
(-6, -2)	



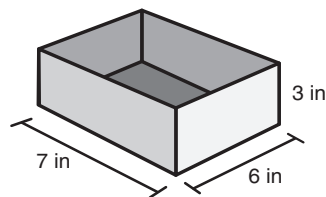
4. A. Write an expression for **9 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **7 added to  $x$** : \_\_\_\_\_

5. Wu has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Wu's box?  
 \_\_\_\_\_ dice.



6. The chicken lays 6 eggs in 2 weeks. At this rate, how long will it take it to lay 9 eggs?  
 \_\_\_\_\_ week(s).

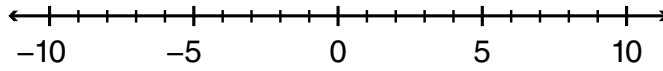
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 12**

7. Label the following numbers on the number line below:

a.  $-(-3)$

b.  $-4$

c.  $-7$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$23x + 7 < 100$	8	
$29x - 3 < 100$	6	

9. Complete the ratio table:

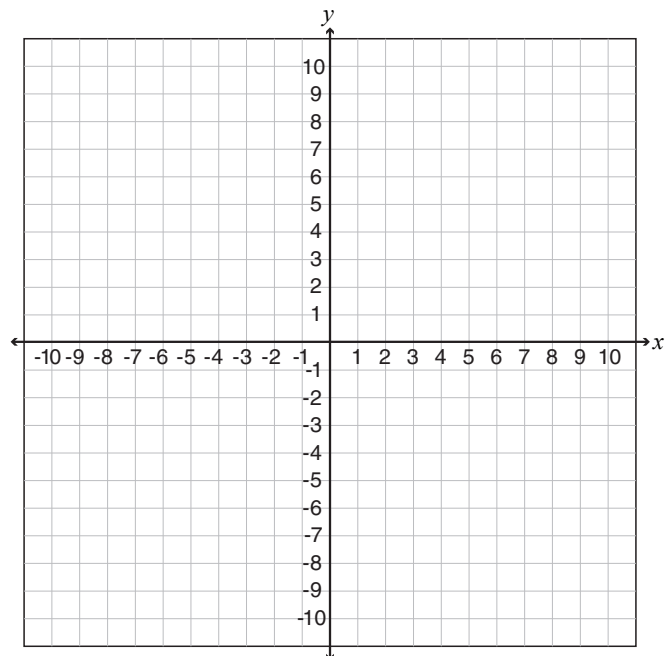
9	8
27	24
36	
	40

10. Jay is plotting the location of barns on a graph.

The barns are located at  
 $(4, 2)$ ,  $(4, -7)$ ,  $(-6, -7)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





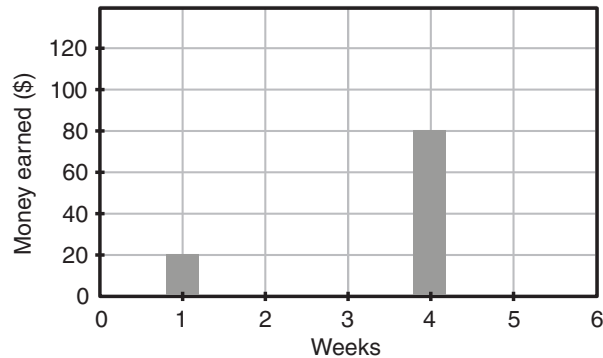
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 12**

11. Ben helps his mom with chores every week. He earns \$20 per week.

A. Fill in the table below to determine how much money Ben earned.

Weeks	Money Earned
1	\$20
2	
3	
4	\$80
5	

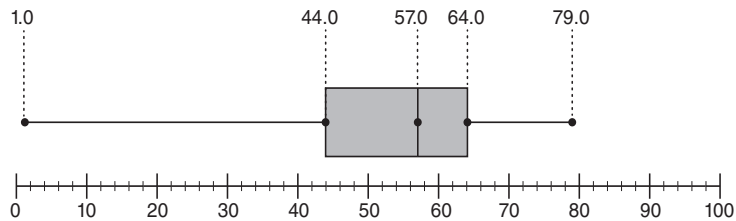
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of weeks ( $W$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 4 candles for \$12. If all the candles cost the same, what is the cost for each candle?  
 \$\_\_\_\_\_ per candle.

13. Below is the number of minutes a group of dogs spent playing at the dog park:



What is the range of the minutes the dogs spent playing at the dog park? \_\_\_\_\_

What is the median number of minutes the dogs spent playing at the dog park? \_\_\_\_\_

What is the maximum number of minutes the dogs spent playing at the dog park? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-80$  feet. Diver B dove to  $-53$  feet.

Which diver dove deeper? \_\_\_\_\_

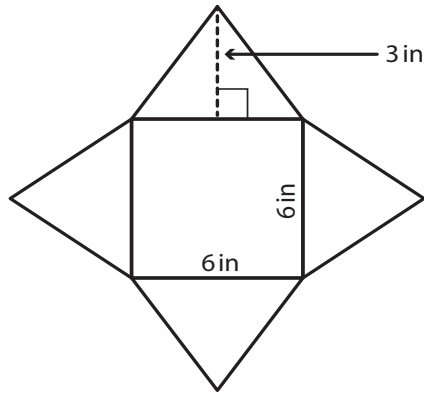
Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $4^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 12**

16. Luke wants to figure out the surface area of the pyramid. What is the surface area of the pyramid?

\_\_\_\_\_ in<sup>2</sup>.



17. Chloe bikes 5 miles in 35 minutes. If she bikes at a constant speed, how long will it take her to bike 4 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 27 and 18? \_\_\_\_\_

19. Henry has 2 more than 5 times the hats that Chen has.

Let  $C$  = the number of hats that Chen has.

Write an equation using  $x$  that describes how many hats Henry has. \_\_\_\_\_

20. Doug's house is 9 feet below sea level. Juan's house is 4 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 13**

**Total:** \_\_\_\_\_

1. In the sea, there were 95 whales and 76 sharks. What is the ratio of whales to sharks? \_\_\_\_\_

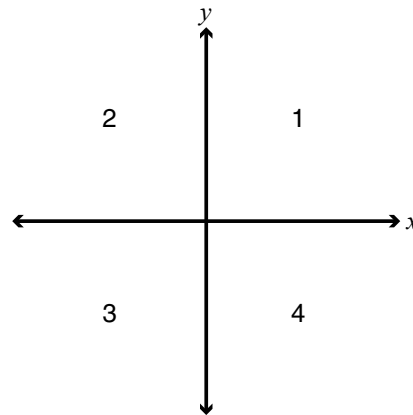
2. Ken has a garden. Each day he picks a certain number of peppers. The following are the number of peppers that Ken picked per day: **9, 1, 5, 3, 2**.

A. What is the mean number of peppers that Ken picked? \_\_\_\_\_

B. What is the median number of peppers that Ken picked? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(2, 5)	
(5, -9)	4
(-1, 2)	
(-3, -7)	



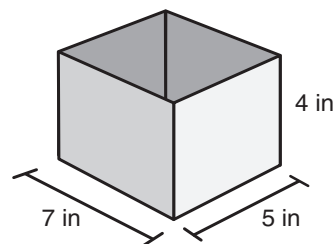
4. A. Write an expression for **3 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **7 added to  $x$** : \_\_\_\_\_

5. Scarlett has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Scarlett's box?  
 \_\_\_\_\_ dice.



6. Jackson cleans his room 4 times every 2 weeks. At this rate, how long will it take him to clean his room 6 times?  
 \_\_\_\_\_ week(s).

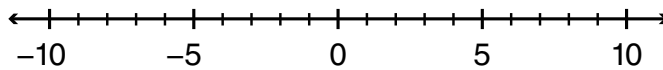
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 13**

7. Label the following numbers on the number line below:

a.  $-3$

b.  $-(-6)$

c.  $-9$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$44x + 9 < 100$	3	
$13x - 5 < 100$	2	

9. Complete the ratio table:

6	8
18	24
24	
	40

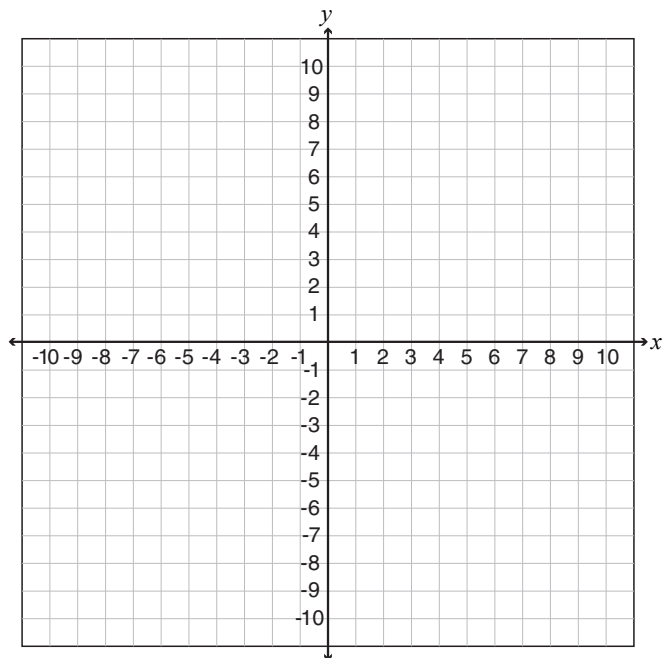
10. Jamal is plotting the location of tree houses on a graph.

The tree houses are located at

$(3, 6)$ ,  $(3, -7)$ ,  $(-8, -7)$ .

A. If the vertices form a rectangle, find the location of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



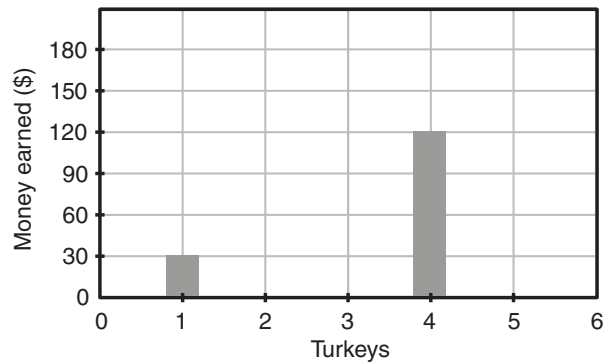
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 13**

11. Sophie sells turkeys. She earns \$30 per turkey.

A. Fill in the table below to determine how much money Sophie earned.

Turkeys	Money Earned
1	\$30
2	
3	
4	\$120
5	

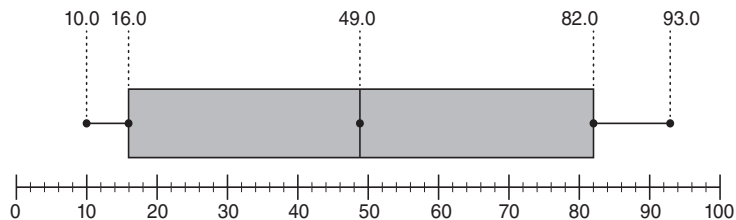
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of turkeys ( $t$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 5 pies for \$45. If all the pies cost the same, what is the cost for each pie?  
 \$\_\_\_\_\_ per pie.

13. Below is the number of minutes a group of children spent at the fair:



What is the range of the minutes the children spent at the fair? \_\_\_\_\_

What is the median number of minutes the children spent at the fair? \_\_\_\_\_

What is the maximum number of minutes the children spent at the fair? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-17$  feet. Diver B dove to  $-58$  feet.

Which diver dove deeper? \_\_\_\_\_

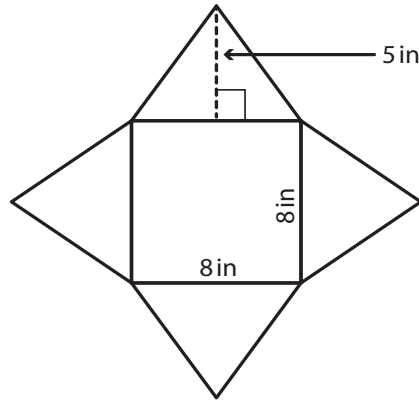
Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $3^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 13**

16. Seth wants to figure out the surface area of the pyramid. What is the surface area of the pyramid?

\_\_\_\_\_ in<sup>2</sup>.



17. Luke runs 2 miles in 16 minutes. If he runs at a constant speed, how long will it take him to run 8 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 24 and 54? \_\_\_\_\_

19. Isabella has 5 more than 9 times the cows that Will has.

Let  $W$  = the number of cows that Will has.

Write an equation using  $x$  that describes how many cows Isabella has. \_\_\_\_\_

20. Clara's house is 3 feet below sea level. José's house is 7 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications  
Level 6 / Progress Monitoring 14**

**Total:** \_\_\_\_\_

1. On the farm, there were 11 horses and 24 cows. What is the ratio of horses to cows? \_\_\_\_\_

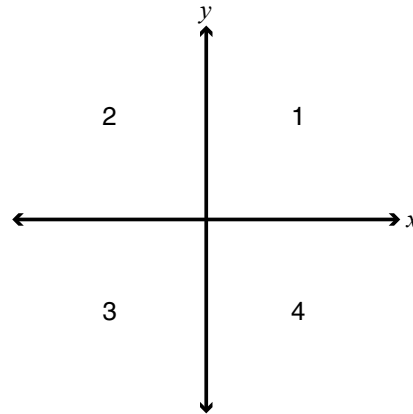
2. Ellie makes kites. Each day she makes a certain number of kites. The following are the number of kites that Ellie made per day: **1, 8, 3, 4, 9**.

A. What is the mean number of kites that Ellie made? \_\_\_\_\_

B. What is the median number of kites that Ellie made? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(8, 6)	
(-9, -6)	
(-1, 9)	
(8, -3)	4



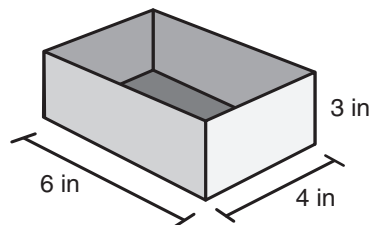
4. A. Write an expression for **5 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **7 added to  $x$** : \_\_\_\_\_

5. Jill has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Jill's box?  
\_\_\_\_\_ dice.



6. Abby feeds her horse 8 apples in 4 weeks. At this rate, how long will it take her to feed it 6 apples?  
\_\_\_\_\_ week(s).

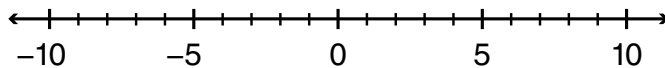
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 14**

7. Label the following numbers on the number line below:

a.  $-9$

b.  $-3$

c.  $-(-2)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$42x + 7 < 100$	4	
$32x - 5 < 100$	7	

9. Complete the ratio table:

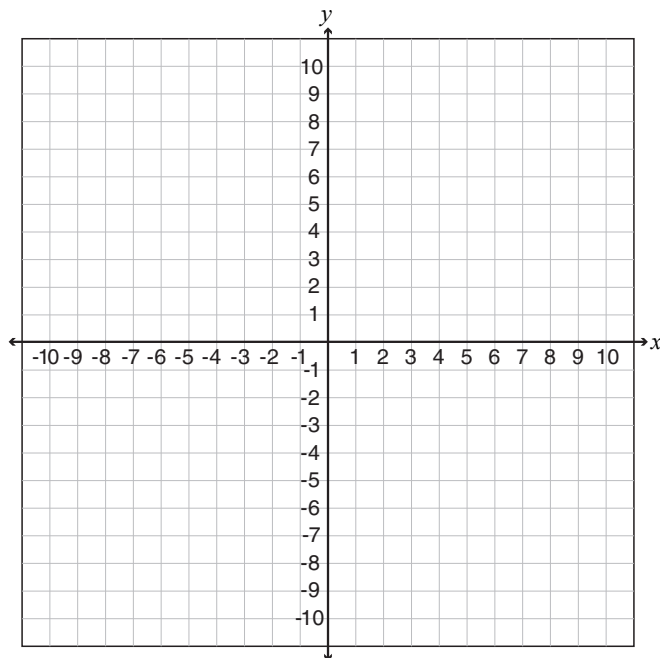
6	7
18	21
24	
	35

10. Yuki is plotting the location of libraries on a graph.

The libraries are located at  
 $(7, 8)$ ,  $(7, -2)$ ,  $(-5, -2)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





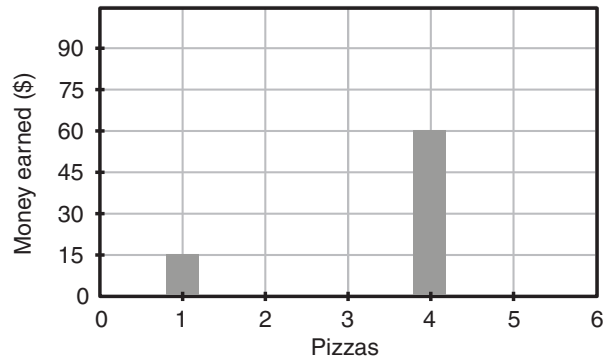
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 14**

11. Gabe sells pizzas. He earns \$15 per pizza.

A. Fill in the table below to determine how much money Gabe earned.

Pizzas	Money Earned
1	\$15
2	
3	
4	\$60
5	

C. Make a bar graph for the amount of money earned:

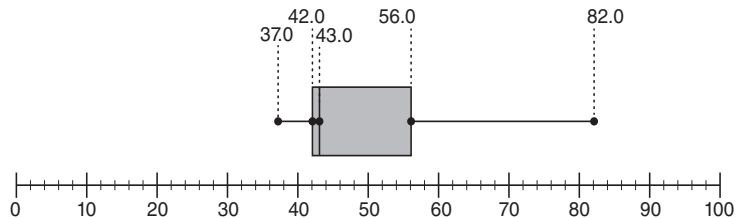


B. Write an equation that illustrates the relationship between the number of pizzas sold ( $p$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 8 chickens for \$48. If all the chickens cost the same, what is the cost for each chicken?

\$\_\_\_\_\_ per chicken.

13. Below is the number of minutes some cats spent playing in the yard:



What is the range of the minutes the cats spent playing in the yard? \_\_\_\_\_

What is the median number of minutes the cats spent playing in the yard? \_\_\_\_\_

What is the maximum number of minutes the cats spent playing in the yard? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-26$  feet. Diver B dove to  $-71$  feet.

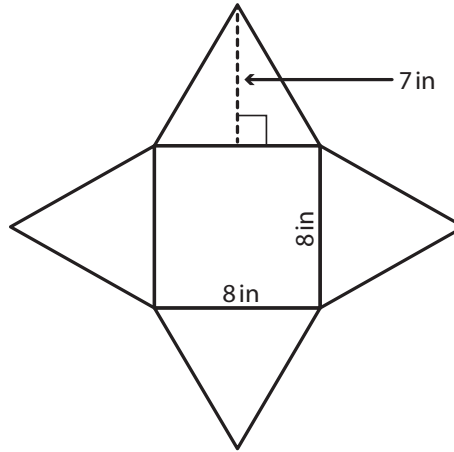
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $2^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 14**

16. Ed wants to figure out the surface area of the pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_ in<sup>2</sup>.



17. Anna runs 3 miles in 21 minutes. If she runs at a constant speed, how long will it take her to run 7 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 56 and 24? \_\_\_\_\_

19. Willa has 5 more than 3 times the tea cups that Hunter has.

Let  $H$  = the number of tea cups that Hunter has.

Write an equation using  $x$  that describes how many tea cups Willa has. \_\_\_\_\_

20. Emily's house is 5 feet below sea level. Alex's house is 8 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 15**

**Total:** \_\_\_\_\_

1. In the forest, there were 11 bears and 24 foxes. What is the ratio of bears to foxes? \_\_\_\_\_

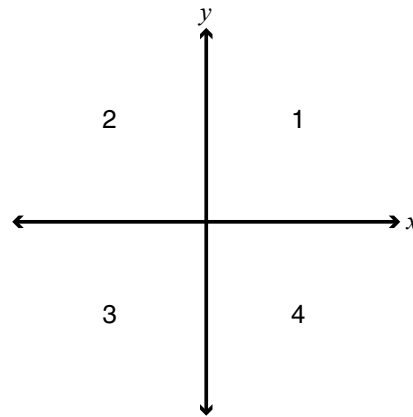
2. Josie writes articles. Each week she writes a certain number of articles. The following are the number of articles that Josie wrote each week: **9, 8, 1, 4, 3**.

A. What is the mean number of articles that Josie wrote? \_\_\_\_\_

B. What is the median number of articles that Josie wrote? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
(-5, 2)	
(8, 2)	
(5, -1)	4
(-9, -3)	



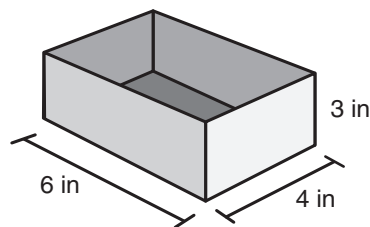
4. A. Write an expression for **5 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **4 added to  $x$** : \_\_\_\_\_

5. Evan has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Evan's box?  
 \_\_\_\_\_ dice.



6. Li feeds her cat 9 treats in 3 weeks. At this rate, how long will it take her to feed it 6 treats?  
 \_\_\_\_\_ week(s).

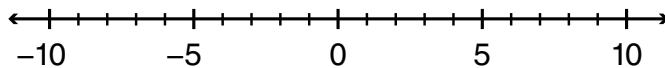
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 15**

7. Label the following numbers on the number line below:

a.  $-4$

b.  $-8$

c.  $-(-7)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$23x + 6 < 100$	4	
$30x - 7 < 100$	9	

9. Complete the ratio table:

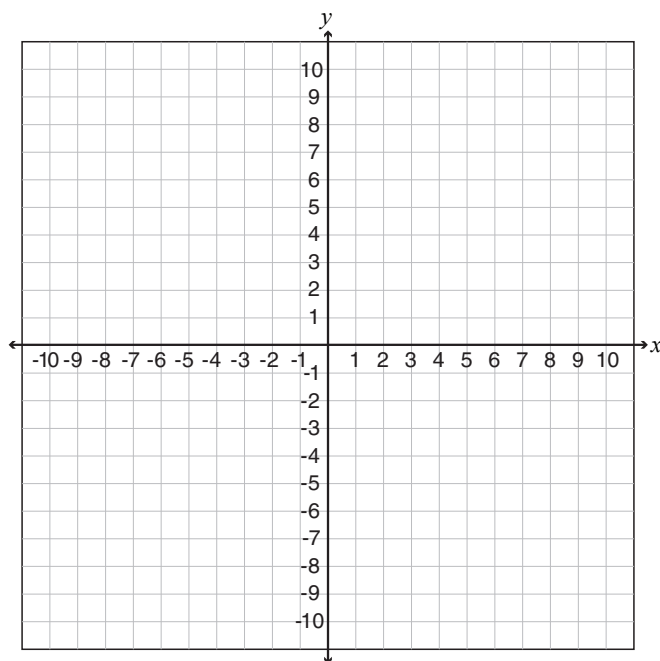
6	3
18	9
24	
	15

10. Kai is plotting the location of houses on a graph.

The houses are located at  
 $(9, 2)$ ,  $(9, -3)$ ,  $(-8, -3)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



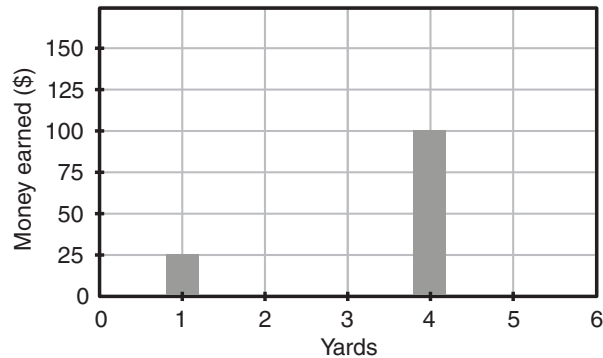
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 15**

11. Emma does yard work. She earns \$25 per yard.

A. Fill in the table below to determine how much money Emma earned.

Yards	Money Earned
1	\$25
2	
3	
4	\$100
5	

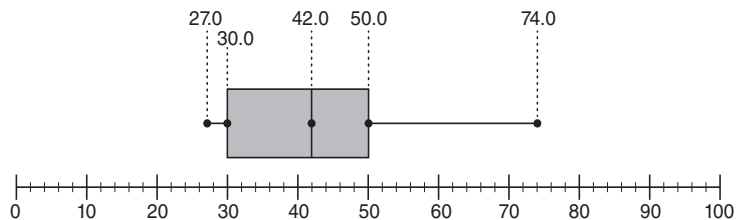
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of yards ( $y$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 4 scarves for \$36. If all the scarves cost the same, what is the cost for each scarf?  
 \$\_\_\_\_\_ per scarf.

13. Below is the number of minutes people on the track team spent running:



What is the range of the minutes people on the track team spent running? \_\_\_\_\_

What is the median number of minutes people on the track team spent running? \_\_\_\_\_

What is the maximum number of minutes people on the track team spent running? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-17$  feet. Diver B dove to  $-25$  feet.

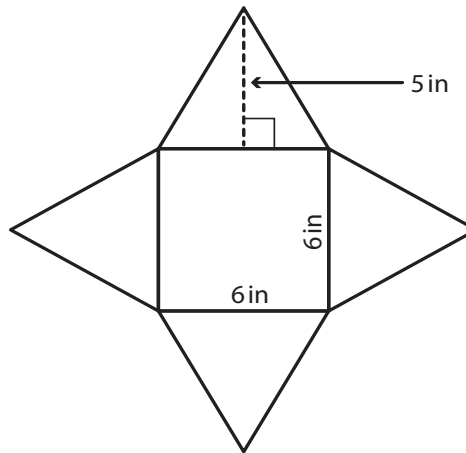
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $5^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 15**

16. Meg wants to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_ in<sup>2</sup>.



17. Dusty bikes 8 miles in 72 minutes. If he bikes at a constant speed, how long will it take him to bike 3 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 21 and 35? \_\_\_\_\_

19. Santos has read 8 more than 9 times the books that Ruby has.

Let  $R$  = the number of books Ruby has read.

Write an equation using  $x$  that describes how many books Santos has read. \_\_\_\_\_

20. Alice's house is 2 feet below sea level. Nora's house is 7 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 16**

**Total:** \_\_\_\_\_

1. At the gift shop, there were 11 candles and 24 books. What is the ratio of candles to books? \_\_\_\_\_

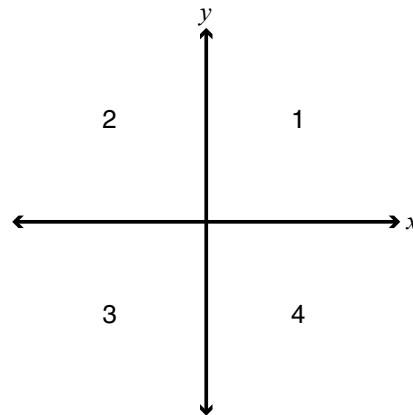
2. Cali played ping pong. Each day she wins a certain number of games. The following are the number of games that Cali won per day: **9, 1, 7, 2, 6**.

A. What is the mean number of games that Cali won? \_\_\_\_\_

B. What is the median number of games that Cali won? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-1, -2)$	
$(3, -8)$	4
$(4, 1)$	
$(-3, 1)$	



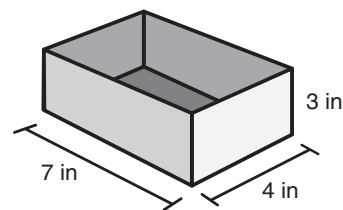
4. A. Write an expression for **2 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **3 added to  $x$** : \_\_\_\_\_

5. Asher has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Asher's box?  
 \_\_\_\_\_ dice.



6. Anna feeds her horse 4 carrots every 2 weeks. At this rate, how long will it take her to feed it 8 carrots?  
 \_\_\_\_\_ week(s).

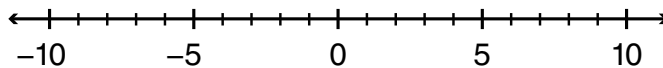
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 16**

7. Label the following numbers on the number line below:

a.  $-2$

b.  $-3$

c.  $-(-1)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$36x + 3 < 100$	4	
$39x - 4 < 100$	6	

9. Complete the ratio table:

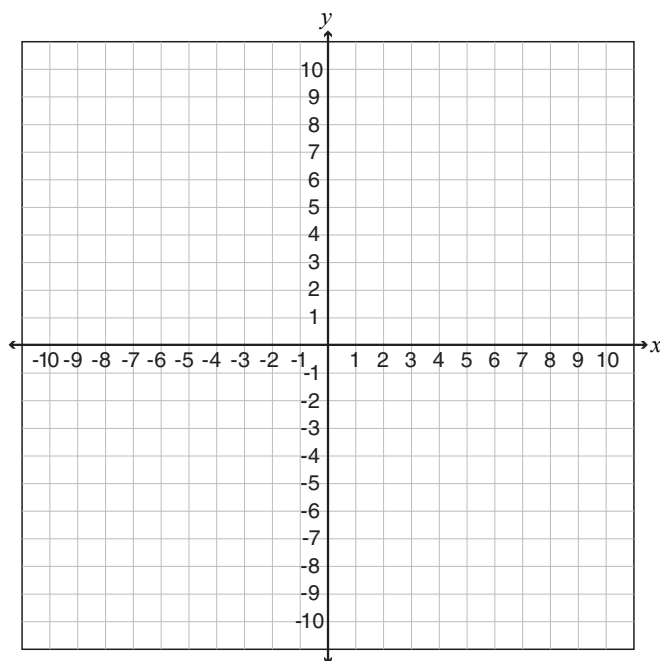
3	4
9	12
12	
	20

10. Ted is plotting the location of trees on a graph.

The trees are located at  
 $(6, 4)$ ,  $(6, -7)$ ,  $(-8, -7)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





# Acadience® Math / Concepts and Applications

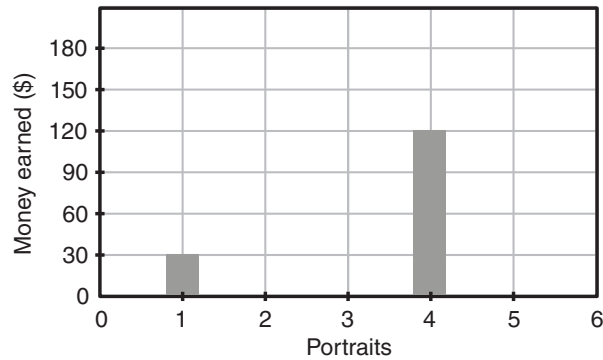
## Level 6 / Progress Monitoring 16

11. Scarlett sells portraits she has painted. She earns \$30 per portrait.

A. Fill in the table below to determine how much money Scarlett earned.

Portraits	Money Earned
1	\$30
2	
3	
4	\$120
5	

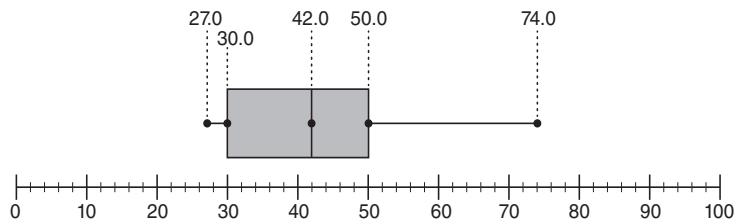
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of portraits ( $p$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 9 board games for \$72. If all the board games cost the same, what is the cost for each board game?  
\$\_\_\_\_\_ per board game.

13. Below is the number of minutes some people spent at a museum:



What is the range of the minutes people spent at the museum? \_\_\_\_\_

What is the median number of minutes people spent at the museum? \_\_\_\_\_

What is the maximum number of minutes people spent at the museum? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-39$  feet. Diver B dove to  $-86$  feet.

Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

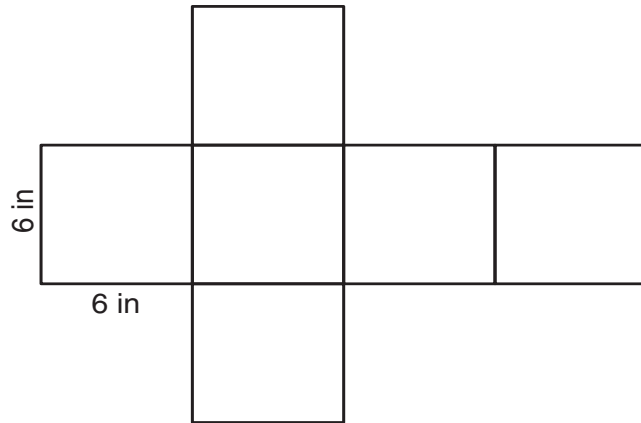
15.  $5^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 16**

16. Clark wants to figure out the surface area of a box.

What is the surface area of the box?

\_\_\_\_\_ in<sup>2</sup>.



17. Johanna runs 3 miles in 24 minutes. If she runs at a constant speed, how long will it take her to run 9 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 18 and 24? \_\_\_\_\_

19. Lee has 2 more than 5 times the hats that Elsa has.

Let  $E$  = the number of hats that Elsa has.

Write an equation using  $x$  that describes how many hats Lee has. \_\_\_\_\_

20. Ray's house is 4 feet below sea level. Sarah's house is 6 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 17**

**Total:** \_\_\_\_\_

1. At the store, there were 11 apples and 24 pears. What is the ratio of apples to pears? \_\_\_\_\_

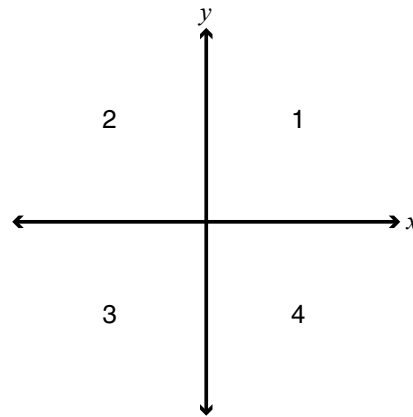
2. Charlotte fixes cars. Each day she fixes a certain number of cars. The following are the number of cars that Charlotte fixed per day: **6, 1, 3, 8, 7**.

A. What is the mean number of cars that Charlotte fixed? \_\_\_\_\_

B. What is the median number of cars that Charlotte fixed? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-6, -1)$	
$(9, 6)$	
$(1, -9)$	4
$(-3, 9)$	



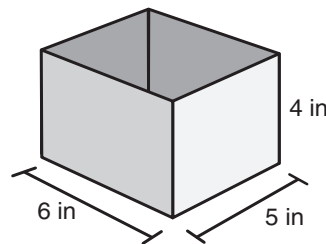
4. A. Write an expression for **5 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **7 added to  $x$** : \_\_\_\_\_

5. Mario has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Mario's box?  
 \_\_\_\_\_ dice.



6. Maya feeds her dog 6 treats in 2 weeks. At this rate, how long will it take her to feed it 9 treats?  
 \_\_\_\_\_ week(s).

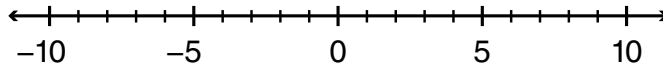
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 17**

7. Label the following numbers on the number line below:

a.  $-7$

b.  $-(-1)$

c.  $-3$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$41x + 3 < 100$	7	
$18x - 9 < 100$	4	

9. Complete the ratio table:

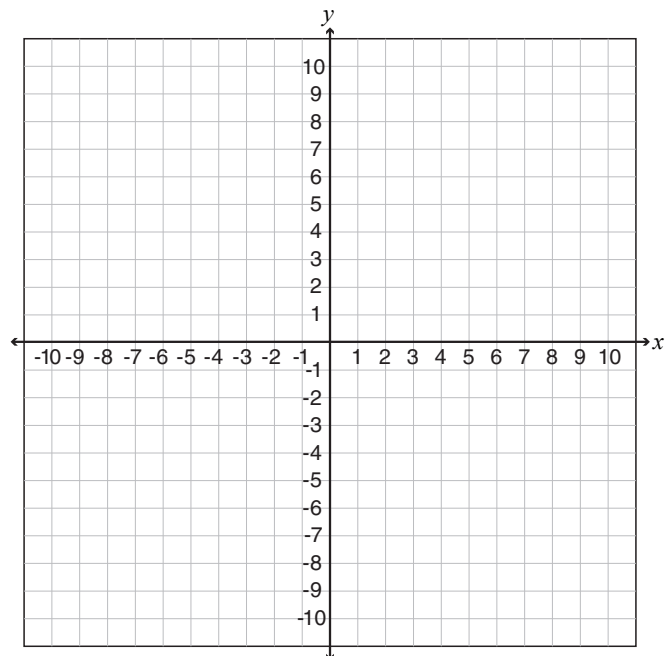
6	8
18	24
24	
	40

10. Seth is plotting the location of rabbits on a graph.

The rabbits are located at  
 $(8, 6)$ ,  $(8, -3)$ ,  $(-2, -3)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



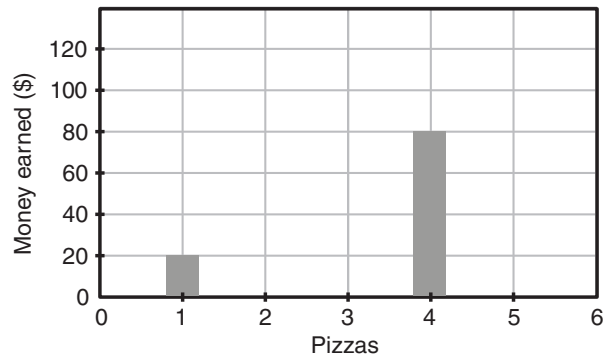
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 17**

11. Sophie sells pizzas. She earns \$20 per pizza.

A. Fill in the table below to determine how much money Sophie earned.

Pizzas	Money Earned
1	\$20
2	
3	
4	\$80
5	

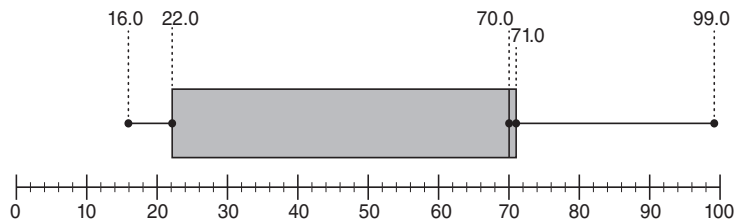
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of pizzas ( $p$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 9 pineapples for \$27. If all the pineapples cost the same, what is the cost for each pineapple?  
 \$\_\_\_\_\_ per pineapple.

13. Below is the number of minutes some children spent playing basketball:



What is the range of the minutes the children spent playing basketball? \_\_\_\_\_

What is the median number of minutes the children spent playing basketball? \_\_\_\_\_

What is the maximum number of minutes the children spent playing basketball? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-32$  feet. Diver B dove to  $-29$  feet.

Which diver dove deeper? \_\_\_\_\_

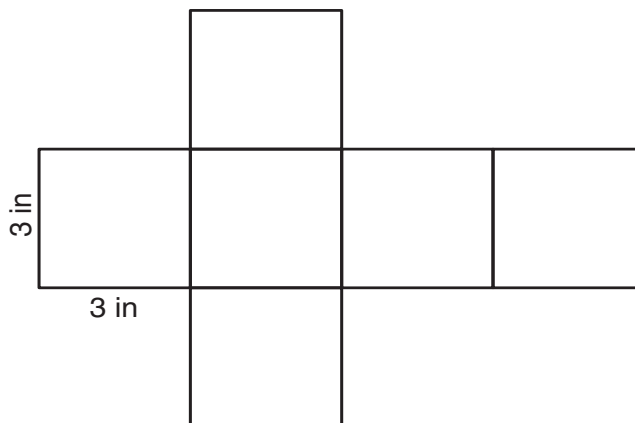
Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $2^2 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 17**

16. Alexander wants to figure out the surface area of a box. What is the surface area of the box?

\_\_\_\_\_ in<sup>2</sup>.



17. Leo runs 6 miles in 54 minutes. If he runs at a constant speed, how long will it take him to run 8 miles?

\_\_\_\_\_ minutes.

18. What is the greatest common factor of 32 and 24? \_\_\_\_\_

19. Finn has 4 more than 6 times the colored pencils that Mary has.

Let  $M$  = the number of colored pencils that Mary has.

Write an equation using  $x$  that describes how many colored pencils Finn has. \_\_\_\_\_

20. Ken's house is 9 feet below sea level. Talia's house is 6 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 18**

**Total:** \_\_\_\_\_

1. In the forest, there were 73 cougars and 62 bobcats. What is the ratio of cougars to bobcats? \_\_\_\_\_

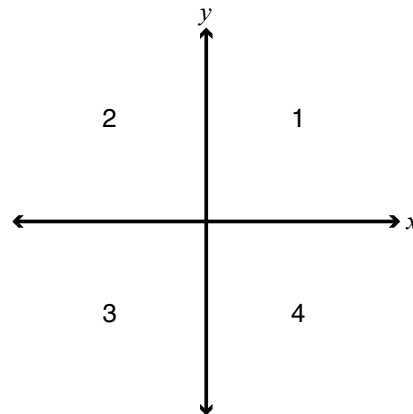
2. Sophia writes articles. Each week she writes a certain number of articles. The following are the number of articles that Sophia wrote per week: **9, 8, 1, 4, 3**.

A. What is the mean number of articles that Sophia wrote? \_\_\_\_\_

B. What is the median number of articles that Sophia wrote? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-7, 2)$	
$(8, 9)$	
$(7, -8)$	4
$(-6, -1)$	



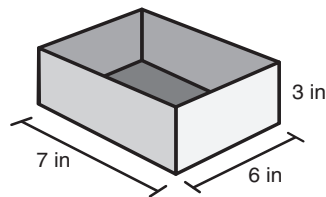
4. A. Write an expression for **3 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **2 added to  $x$** : \_\_\_\_\_

5. Avery has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Avery's box?  
 \_\_\_\_\_ dice.



6. Dave rides his horse 6 times every 3 weeks. At this rate, how long will it take him to ride it 4 times?  
 \_\_\_\_\_ week(s).

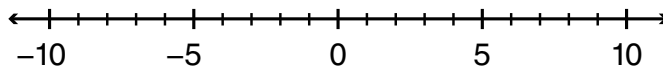
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 18**

7. Label the following numbers on the number line below:

a.  $-3$

b.  $-5$

c.  $-(-6)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$33x + 7 < 100$	2	
$14x - 4 < 100$	7	

9. Complete the ratio table:

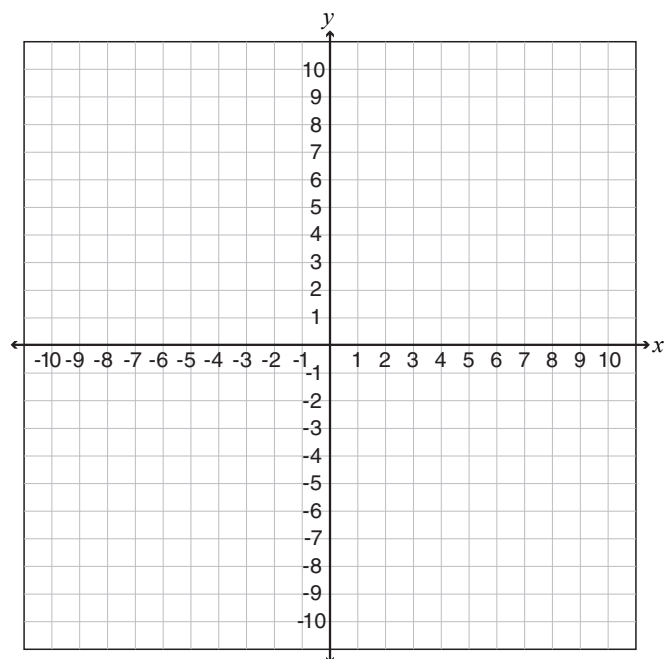
4	8
12	24
16	
	40

10. Eli is plotting the location of grocery stores on a graph.

The grocery stores are located at  
 $(3, 5)$ ,  $(3, -6)$ ,  $(-7, -6)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





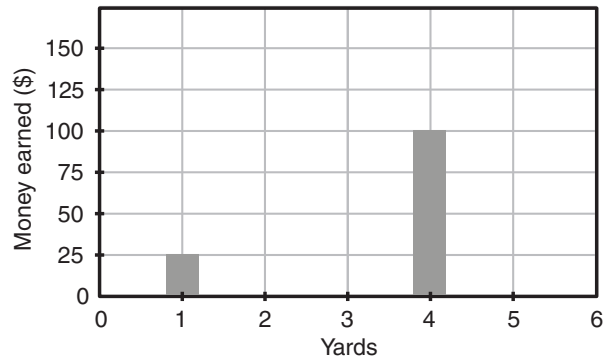
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 18**

11. Sarah does yard work. She earns \$25 per yard.

A. Fill in the table below to determine how much money Sarah earned.

Yards	Money Earned
1	\$25
2	
3	
4	\$100
5	

C. Make a bar graph for the amount of money earned:

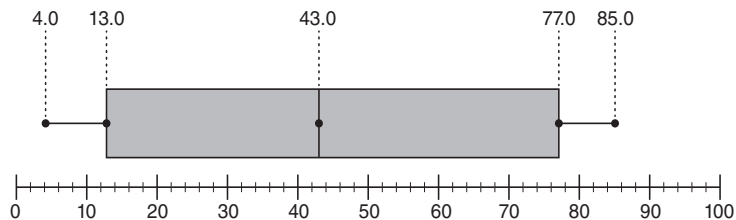


B. Write an equation that illustrates the relationship between the number of yards ( $y$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 3 hats for \$24. If all the hats cost the same, what is the cost for each hat?

\$\_\_\_\_\_ per hat.

13. Below is the number of minutes people spent swimming at the lake:



What is the range of the minutes people spent swimming at the lake? \_\_\_\_\_

What is the median number of minutes people spent swimming at the lake? \_\_\_\_\_

What is the maximum number of minutes people spent swimming at the lake? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-79$  feet. Diver B dove to  $-13$  feet.

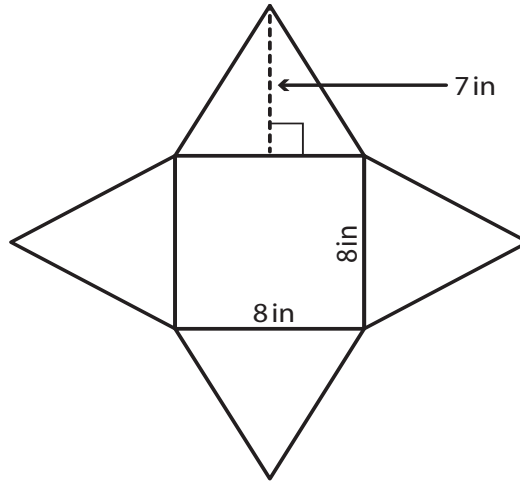
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $3^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 18**

16. Larry wants to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_ in<sup>2</sup>.



17. Erica runs 6 miles in 48 minutes. If she runs at a constant speed, how long will it take her to run 4 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 56 and 48? \_\_\_\_\_

19. Jasmine has 9 more than 8 times the comic books that Ian has.

Let  $I$  = the number of comic books that Ian has.

Write an equation using  $x$  that describes how many comic books Jasmine has. \_\_\_\_\_

20. Julie's house is 2 feet below sea level. Danny's house is 4 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 19**

**Total:** \_\_\_\_\_

1. At the park, there were 49 pigeons and 12 crows. What is the ratio of pigeons to crows? \_\_\_\_\_

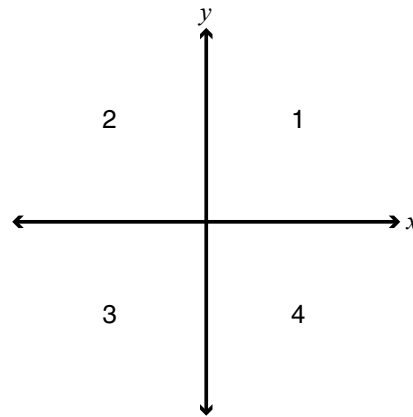
2. Ann likes to draw. Each week she draws a certain number of pictures. The following are the number of pictures that Ann drew per week: **9, 8, 1, 4, 3**.

A. What is the mean number of pictures that Ann drew? \_\_\_\_\_

B. What is the median number of pictures that Ann drew? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-7, -2)$	
$(-4, 3)$	
$(7, -5)$	4
$(6, 2)$	



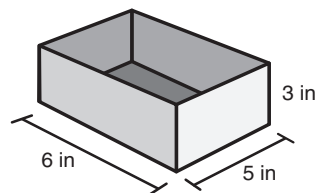
4. A. Write an expression for **8 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **7 added to  $x$** : \_\_\_\_\_

5. Nick has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_  $\text{in}^3$ .

B. How many dice will fit inside Nick's box?  
 \_\_\_\_\_ dice.



6. Pablo feeds his cat 4 treats every 2 weeks. At this rate, how long will it take him to feed it 8 treats?  
 \_\_\_\_\_ week(s).

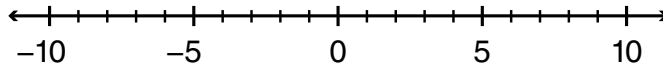
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 19**

7. Label the following numbers on the number line below:

a.  $-6$

b.  $-2$

c.  $-(-7)$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$23x + 4 < 100$	5	
$34x - 8 < 100$	8	

9. Complete the ratio table:

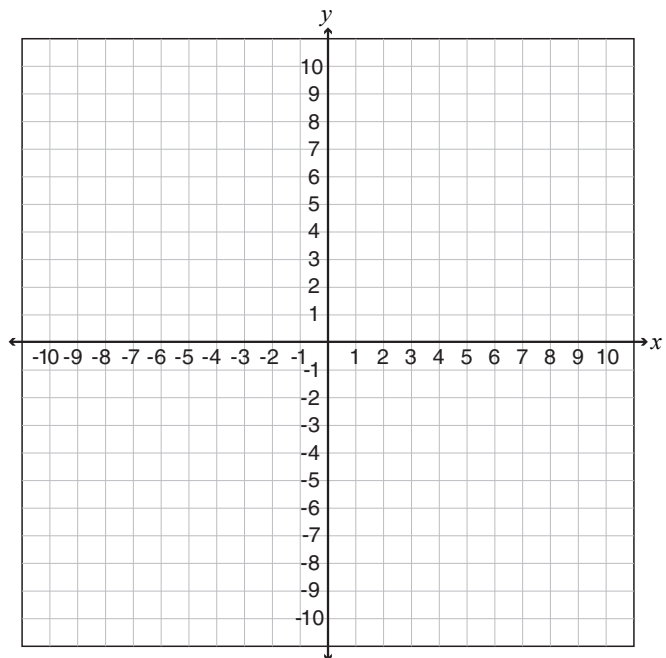
9	8
27	24
36	
	40

10. Eve is plotting the location of ships on a graph.

The ships are located at  
 $(2, 3)$ ,  $(2, -8)$ ,  $(-9, -8)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:



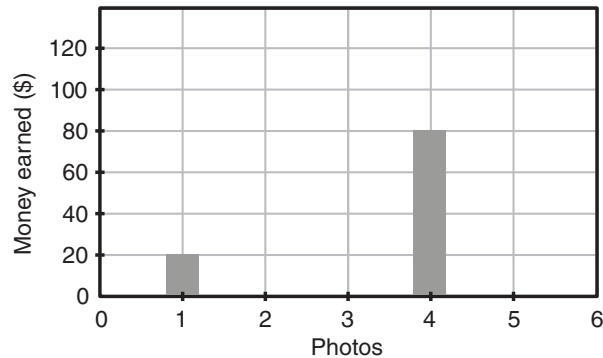
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 19**

11. Luis is a nature photographer. He earns \$20 per photo.

A. Fill in the table below to determine how much money Luis earned.

Photos	Money Earned
1	\$20
2	
3	
4	\$80
5	

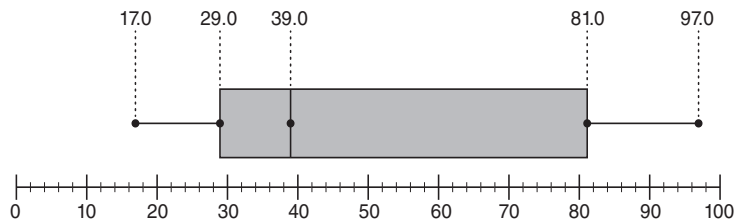
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of photos ( $p$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 3 granola bars for \$9. If all the granola bars cost the same, what is the cost for each granola bar?  
 \$\_\_\_\_\_ per granola bar.

13. Below is the number of minutes people spent hiking:



What is the range of the minutes people spent hiking? \_\_\_\_\_

What is the median number of minutes people spent hiking? \_\_\_\_\_

What is the maximum number of minutes people spent hiking? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-32$  feet. Diver B dove to  $-57$  feet.

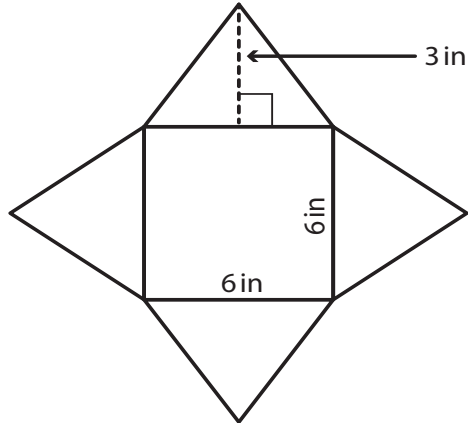
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $4^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 19**

16. Leo wants to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_ in<sup>2</sup>.



17. Maddie runs 2 miles in 12 minutes. If she runs at a constant speed, how long will it take her to run 3 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 21 and 28? \_\_\_\_\_

19. Lilly has 2 more than 8 times the number of marbles that Hector has.

Let  $H$  = the number of marbles that Hector has.

Write an equation using  $x$  that describes how many marbles Lilly has. \_\_\_\_\_

20. Brooke's house is 9 feet below sea level. Juan's house is 8 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 20**

**Total:** \_\_\_\_\_

1. At the store, there were 45 magazines and 68 books. What is the ratio of magazines to books? \_\_\_\_\_

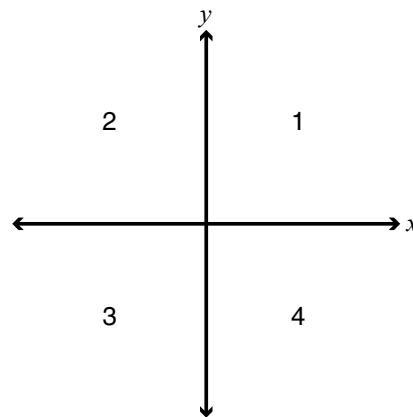
2. Emily writes short stories. Each week she writes a certain number of short stories. The following are the number of short stories that Emily wrote per week: **9, 8, 1, 4, 3**.

A. What is the mean number of short stories that Emily wrote? \_\_\_\_\_

B. What is the median number of short stories that Emily wrote? \_\_\_\_\_

3. Fill in the missing quadrants to complete the table:

Point	Quadrant
$(-3, -9)$	
$(4, -7)$	4
$(3, 7)$	
$(-3, 5)$	



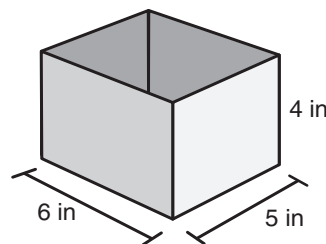
4. A. Write an expression for **4 subtracted from  $x$** : \_\_\_\_\_

B. Write an expression for **2 added to  $x$** : \_\_\_\_\_

5. Tony has a box and a bag of dice. The dice are  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch by  $\frac{1}{2}$  inch.

A. What is the volume of the box? \_\_\_\_\_ in<sup>3</sup>.

B. How many dice will fit inside Tony's box?  
 \_\_\_\_\_ dice.



6. Lucy reads 6 books in 2 weeks. At this rate, how long will it take her to read 9 books?  
 \_\_\_\_\_ week(s).

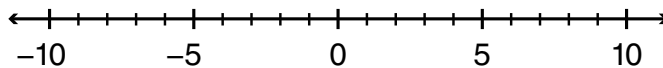
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 20**

7. Label the following numbers on the number line below:

a.  $-(-8)$

b.  $-2$

c.  $-9$



8. Write “True” if the substitution makes the inequality true or write “False” if the substitution makes the inequality false:

Inequality	$x =$	Write True or False
$15x + 3 < 100$	4	
$19x - 7 < 100$	9	

9. Complete the ratio table:

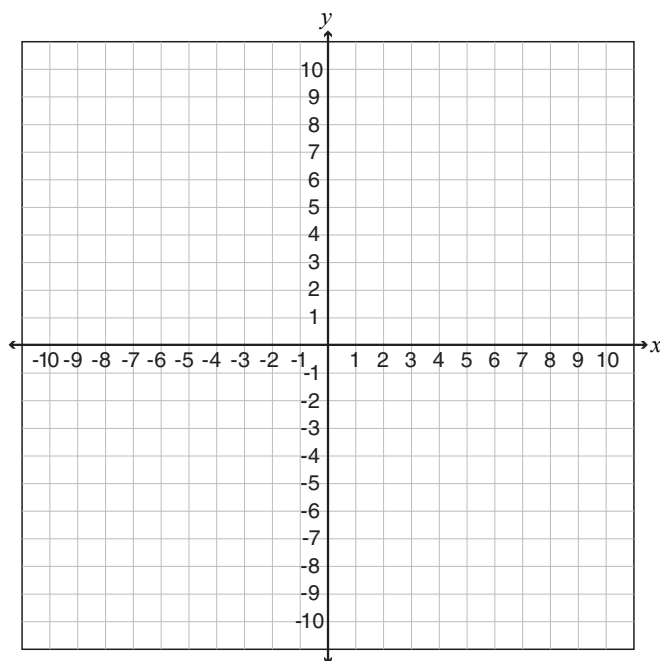
7	9
21	27
28	
	45

10. Matt is plotting the location of schools on a graph.

The schools are located at  
 $(7, 2)$ ,  $(7, -7)$ ,  $(-2, -7)$ .

A. If the vertices form a rectangle, find the location  
of the last vertex: ( \_\_\_\_\_, \_\_\_\_\_ )

B. Plot all the vertices on the graph:





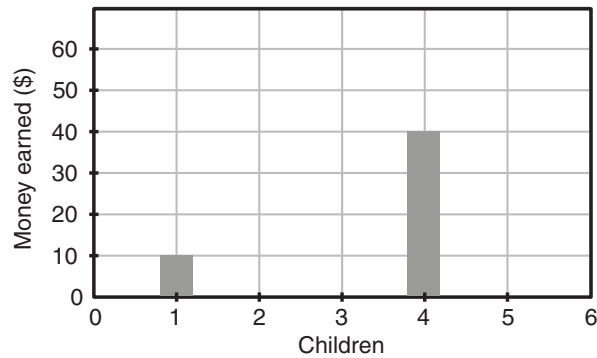
**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 20**

11. Nate often babysits for his neighbors. He earns \$10 per child.

A. Fill in the table below to determine how much money Nate earned.

Children	Money Earned
1	\$10
2	
3	
4	\$40
5	

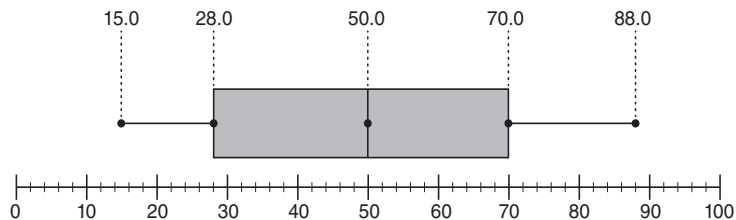
C. Make a bar graph for the amount of money earned:



B. Write an equation that illustrates the relationship between the number of children ( $c$ ) and the money earned ( $m$ ): \_\_\_\_\_

12. You bought 7 small notebooks for \$21. If all the notebooks cost the same, what is the cost for each notebook?  
 \$\_\_\_\_\_ per notebook.

13. Below is the number of minutes people at the birthday party spent dancing:



What is the range of the minutes people spent dancing? \_\_\_\_\_

What is the median number of minutes people spent dancing? \_\_\_\_\_

What is the maximum number of minutes people spent dancing? \_\_\_\_\_

14. Diver A dove to a sea level depth of  $-12$  feet. Diver B dove to  $-97$  feet.

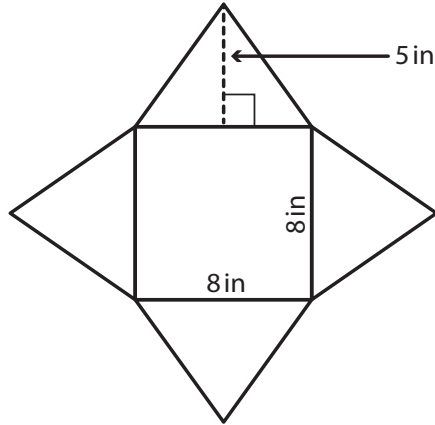
Which diver dove deeper? \_\_\_\_\_

Diver A was how many feet under water? \_\_\_\_\_ feet

15.  $3^3 =$  \_\_\_\_\_

**Acadience® Math / Concepts and Applications**  
**Level 6 / Progress Monitoring 20**

16. Ying wants to figure out the surface area of a pyramid. What is the surface area of the pyramid?  
\_\_\_\_\_ in<sup>2</sup>.



17. Jackson bikes 5 miles in 35 minutes. If he bikes at a constant speed, how long will it take him to bike 7 miles?  
\_\_\_\_\_ minutes.

18. What is the greatest common factor of 15 and 20? \_\_\_\_\_

19. Liam has 7 more than 2 times the points that Pip has.

Let  $P$  = the number of points that Pip has.

Write an equation using  $x$  that describes how many points Liam has. \_\_\_\_\_

20. Zach's house is 2 feet below sea level. Laura's house is 7 feet above sea level. Write an inequality that shows the relationship between these two houses: \_\_\_\_\_