

Name: _____

Date: _____

1.

Where would $|-7|$ be on the number line?

- A. 7 units to the right of zero.
- B. 7 units to the left of zero
- C. 7 units to the left and right of zero
- D. 7 units from zero

2. A car-rental agency charges \$38 per day plus \$0.21 for each mile driven. Sandra paid \$88.40 for renting a car from them for one day. Which of the following could be used to find the number of miles she drove that day?

- A. $0.21x + 38 = 88.4$
- B. $0.21x = 88.4$
- C. $38x = 0.21(88.4)$
- D. $38x + 0.21 = 88.4$

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3.

Which number is the largest?

$-10, -5, -\frac{1}{2}, -\frac{1}{3}$

- A. -10
- B. -5
- C. $-\frac{1}{2}$
- D. $-\frac{1}{3}$

4.

Which of these shapes can be created using two congruent isosceles triangles?

- A. rhombus
- B. rectangle
- C. trapezoid
- D. parallelogram

5.

What is the value of $(5x + 2y + 19) + (9y + 7x - 10)$?

- A. $26xy$
 - B. $23xy + 9$
 - C. $14x + 9y + 9$
 - D. $12x + 11y + 9$
-

6.

Multiply.

$$-10 \times -33$$

- A. -330
 - B. -33
 - C. 33
 - D. 330
-

7. Betsy's spelling test scores were 65, 80, 85, 70, and 70. What is her average (mean) score in spelling?

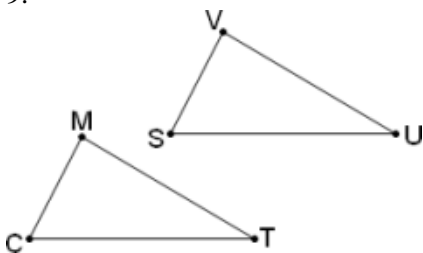
- A. 65
 - B. 70
 - C. 74
 - D. 75
-

8.

Given the equation $3x + 2y = 0$, what would happen to the value of x if y was multiplied by a factor of three?

- A. x would decrease by a factor of three
 - B. x would decrease by a factor of two
 - C. x would increase by a factor of three
 - D. x would increase by a factor of two
-

9.

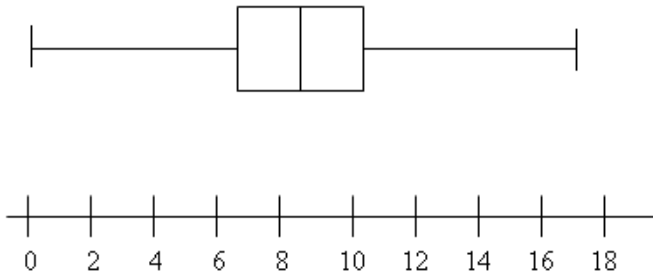


The triangles shown are congruent. Which of the following two sides **MUST** be proportional?

- A. CM and SV
 - B. CM and MT
 - C. CT and VU
 - D. CT and MT
-

10.

Number of Orange Skittles in an Individual Package of Skittles



What is the approximate median number of orange Skittles in a bag?

- A. 4
 - B. 6
 - C. 8
 - D. 12
-

11.

A fruit delivery truck traveled 65 miles for Monday deliveries. The truck starts and the fruit distribution center, makes 3 deliveries, and returns to the fruit distribution center. The 4 distances traveled are consecutive numbers that differ by half a mile. How far is it from the fruit distribution center to his first delivery?

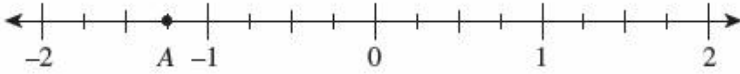
- A. 15.5 miles
 - B. 16 miles
 - C. 16.5 miles
 - D. 17 miles
-

12.

Triangle JKL is located at $J(1, 1)$, $K(1, 5)$ and $L(5, 5)$. Point K will be translated one unit up and 6 units to the right. What shape will triangle $JK'L$ become?

- A. right triangle
 - B. acute triangle
 - C. obtuse triangle
 - D. equilateral triangle
-

13. Which of the following **best** represents the location of point *A* on the number line shown below?



A. $-2\frac{3}{4}$

B. $-2\frac{1}{4}$

C. $-1\frac{1}{2}$

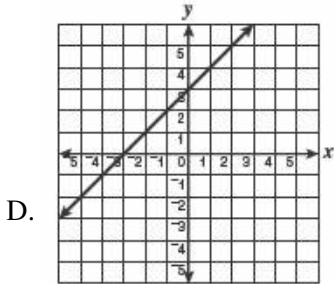
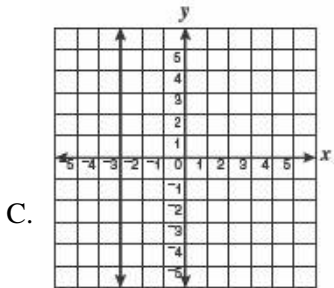
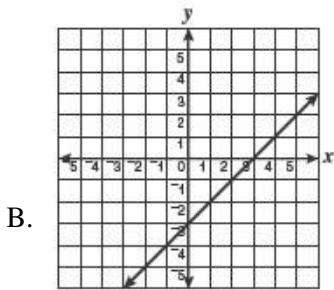
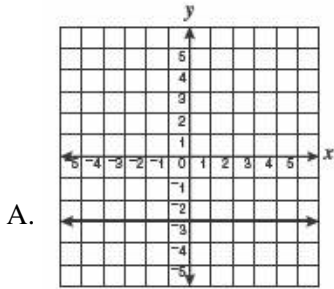
D. $-1\frac{1}{4}$

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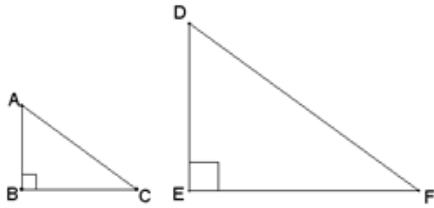
| x | y |
|-----|-----|
| 3 | -3 |
| 0 | -3 |
| -3 | -3 |

14.

If the line containing these points is plotted on a coordinate plane, what should the graph look like?



15.



Given: $\triangle ABC \sim \triangle DEF$.

Which statement shown is a correct similarity statement?

- A. $\triangle BCA \sim \triangle EDF$
 - B. $\triangle BAC \sim \triangle EDF$
 - C. $\triangle CBA \sim \triangle DFE$
 - D. $\triangle CBA \sim \triangle FDE$
-

16.

A model of a house has been drawn on a coordinate grid. One corner of the house has been drawn at $(1, 5)$. The drawing will be translated two units up and three units to the right. Where will the same corner of the house be after the translation?

- A. $(-2, 3)$
 - B. $(-1, 2)$
 - C. $(3, 8)$
 - D. $(4, 7)$
-

17. Edwina bought a book for \$13. She now has \$47. How much money did Edwina have before she bought the book?

- A. \$21
 - B. \$34
 - C. \$60
 - D. \$73
-

18.

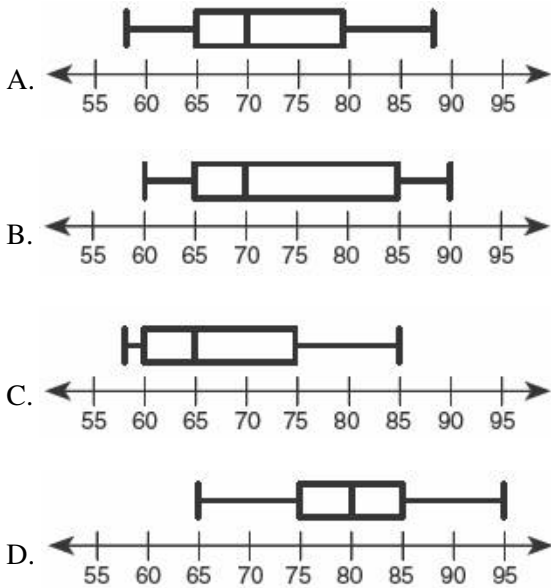
Leah and Zack earned (d) dollars an hour for each hour they worked. Leah worked 29 hours. Zack worked 36 hours. Which expression represents the combined amount of money Leah and Zack earned?

- A. $7d$
 - B. $65d$
 - C. $7 + d$
 - D. $65 + d$
-

19. A study was conducted to determine the effectiveness of a speed limit sign. The speeds of cars at the 65 mph sign were:

60 70 65 70 85 74 58 71 88 65

Which box-and-whisker plot correctly displays the information?

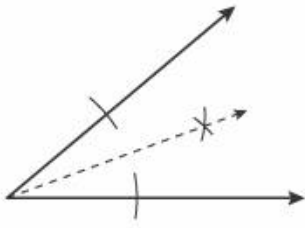


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20.

Devon bought a tie. The tie cost \$22.50 before tax. After tax, Devon spent \$24.30. What was the percent of sales tax?

- A. 1.8%
- B. 1.94%
- C. 7.4%
- D. 8%



21.

The drawing shows a compass and straightedge construction of —

- A. a perpendicular to a given line from a point not on the line.
- B. a perpendicular to a given line at a point on the line.
- C. the bisector of a given angle.
- D. an angle congruent to a given angle.

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22.

A point was graphed at $(-3, 3)$. The point was translated to $(3, 3)$ and then translated to $(3, -3)$. Which translations occurred?

- A. two equal dilations
- B. reflection over the x -axis, then a rotation
- C. reflection over the y -axis, then a reflection over the x -axis
- D. reflection over the x -axis, then a reflection over the y -axis

23. Last season, Ellen and Janet together won 32 tennis matches. Ellen won 6 more matches than Janet. How many matches did Ellen win?

- A. 13
- B. 16
- C. 19
- D. 25

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24.

Bethany's family can eat $(13h - 6)$ hotdogs. Clark's family can eat $(10h + 3)$ hotdogs. Which expression shows the difference between the number of hotdogs Bethany's family can eat and the number of hotdogs Clark's family can eat?

- A. $3h - 9$
 - B. $3h - 3$
 - C. $-3h + 9$
 - D. $-3h + 3$
-

25. Darrell had biology test scores of

76, 78, 76, 82, 62, and 100.

For this data, which measure is greatest?

- A. Mean
- B. Median
- C. Mode
- D. Range

Answer Key

1. A) 7 units to the right of zero.

2. A) $0.21x + 38 = 88.4$

3. D) $-\frac{1}{3}$

4. A) rhombus

5. D) $12x + 11y + 9$

6. D) 330

7. C) 74

8. B) x would decrease by a factor of two

9. A) CM and SV

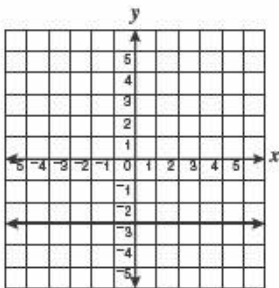
10. C) 8

11. A) 15.5 miles

12. C) obtuse triangle

13. D) $-1\frac{1}{4}$

14. A)

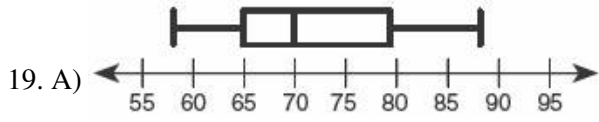


15. B) $\triangle BAC \sim \triangle EDF$

16. D) (4, 7)

17. C) \$60

18. B) $65d$



20. D) 8%

21. C) the bisector of a given angle.

22. C) reflection over the y -axis, then a reflection over the x -axis

23. C) 19

24. A) $3h - 9$

25. A) Mean