

# Carver E&S

## Algebra 1 Skills Assessment

### Review Packet

A DETAILED SOLUTIONS  
GUIDE CAN BE FOUND AT:  
[www.shanhogan.com](http://www.shanhogan.com)  
Click on the "Mathematics  
Department" tab.

Students applying to take Honors Geometry, Honors Algebra 2, or the block Honors Algebra 2/Honors Precalculus are required to take the Algebra 1 Skills Assessment.

Attached you will find 80 sample problems similar to those on the exam. The answers to the review problems are at the end of the packet.

#### **FORMAT OF ALGEBRA 1 SKILLS ASSESSMENT:**

- 85 questions
- 60 minutes
- Calculator permitted (and required for some problems.)

**The exam will be administered online on Friday 2/12/2021 from 1PM-2:15PM.**

The exam will be a Google form.

You will come to the Zoom and the link to the form will be dropped in the chat.

You will stay on the Zoom throughout the exam and may log off after you submit your test.

If you are having technical issues, Hogan will be on the Zoom to help you.

You may use a calculator (or online calculator like Desmos.)

You may not collaborate with others or use the internet to research/find answers.

Results from this exam will be used in conjunction with your grades and teacher recommendations to place you in an appropriate mathematics course next year.

**There will be no make-up test for this assessment. Please plan accordingly.**

Need help preparing? You have options for additional assistance while working through the review.

- 1) Check the solutions guide (every problem in the review is worked out in detail.)
- 2) Ask your current mathematics teacher.
- 3) Ask Hogan (email [smhogan@philasd.org](mailto:smhogan@philasd.org))
- 4) If you have 5th lunch, Hogan has a 5th-period tutoring Zoom with two seniors that are very good math tutors.

**1** Is the equation  $3(2x - 4) = -18$  equivalent to  $6x - 12 = -18$ ?

- A Yes, the equations are equivalent by the Associative Property of Multiplication.
- B Yes, the equations are equivalent by the Commutative Property of Multiplication.
- C Yes, the equations are equivalent by the Distributive Property of Multiplication over Addition.
- D No, the equations are not equivalent.

CSA10108

**2**  $\sqrt{16} + \sqrt[3]{8} =$

- A 4
- B 6
- C 9
- D 10

CSA00471

**3** Which expression is equivalent to  $x^6x^2$ ?

- A  $x^4x^3$
- B  $x^5x^3$
- C  $x^7x^3$
- D  $x^9x^3$

CSA20167

**4** Which number does *not* have a reciprocal?

- A -1
- B 0
- C  $\frac{1}{1000}$
- D 3

CSA10152

**5** What is the multiplicative inverse of  $\frac{1}{2}$ ?

- A -2
- B  $-\frac{1}{2}$
- C  $\frac{1}{2}$
- D 2

CSA10153

**6** What is the solution for this equation?

$$|2x - 3| = 5$$

- A  $x = -4$  or  $x = 4$
- B  $x = -4$  or  $x = 3$
- C  $x = -1$  or  $x = 4$
- D  $x = -1$  or  $x = 3$

CSA00264

7 What is the solution set of the inequality  $5 - |x + 4| \leq -3$ ?

- A  $-2 \leq x \leq 6$
- B  $x \leq -2$  or  $x \geq 6$
- C  $-12 \leq x \leq 4$
- D  $x \leq -12$  or  $x \geq 4$

CSA10036

8 Which equation is equivalent to  $5x - 2(7x + 1) = 14x$ ?

- A  $-9x - 2 = 14x$
- B  $-9x + 1 = 14x$
- C  $-9x + 2 = 14x$
- D  $12x - 1 = 14x$

CSA00206

9 Which equation is equivalent to  $4(2 - 5x) = 6 - 3(1 - 3x)$ ?

- A  $8x = 5$
- B  $8x = 17$
- C  $29x = 5$
- D  $29x = 17$

CSA00059

10 The total cost ( $c$ ) in dollars of renting a sailboat for  $n$  days is given by the equation

$$c = 120 + 60n.$$

If the total cost was \$360, for how many days was the sailboat rented?

- A 2
- B 4
- C 6
- D 8

CSA00485

11 Solve:  $3(x + 5) = 2x + 35$

Step 1:  $3x + 15 = 2x + 35$

Step 2:  $5x + 15 = 35$

Step 3:  $5x = 20$

Step 4:  $x = 4$

Which is the first *incorrect* step in the solution shown above?

- A Step 1
- B Step 2
- C Step 3
- D Step 4

CSA00332

12 A 120-foot-long rope is cut into 3 pieces. The first piece of rope is twice as long as the second piece of rope. The third piece of rope is three times as long as the second piece of rope. What is the length of the longest piece of rope?

- A 20 feet
- B 40 feet
- C 60 feet
- D 80 feet

CSA10052

- 13** The cost to rent a construction crane is \$750 per day plus \$250 per hour of use. What is the maximum number of hours the crane can be used each day if the rental cost is not to exceed \$2500 per day?

A 2.5  
B 3.7  
C 7.0  
D 13.0

CSA10057

- 14** What is the solution to the inequality  $x - 5 > 14$ ?

A  $x > 9$   
B  $x > 19$   
C  $x < 9$   
D  $x < 19$

CSA00487

- 15** The lengths of the sides of a triangle are  $y$ ,  $y + 1$ , and 7 centimeters. If the perimeter is 56 centimeters, what is the value of  $y$ ?

A 24  
B 25  
C 31  
D 32

CSA10046

- 16** Which number serves as a counterexample to the statement below?

All positive integers are divisible by 2 or 3.

A 100  
B 57  
C 30  
D 25

CSG10197

- 17** What is the conclusion of the statement in the box below?

If  $x^2 = 4$ , then  $x = -2$  or  $x = 2$ .

A  $x^2 = 4$   
B  $x = -2$   
C  $x = 2$   
D  $x = -2$  or  $x = 2$

CSA30045

- 18** Which of the following is a valid conclusion to the statement “If a student is a high school band member, then the student is a good musician”?

A All good musicians are high school band members.  
B A student is a high school band member.  
C All students are good musicians.  
D All high school band members are good musicians.

CSA30095

- 19** The chart below shows an expression evaluated for four different values of  $x$ .

$x$	$x^2 + x + 5$
1	7
2	11
6	47
7	61

Josiah concluded that for all positive values of  $x$ ,  $x^2 + x + 5$  produces a prime number. Which value of  $x$  serves as a counterexample to prove Josiah's conclusion false?

- A 5
- B 11
- C 16
- D 21

CSA20027

- 20** John's solution to an equation is shown below.

Given:  $x^2 + 5x + 6 = 0$

Step 1:  $(x + 2)(x + 3) = 0$

Step 2:  $x + 2 = 0$  or  $x + 3 = 0$

Step 3:  $x = -2$  or  $x = -3$

Which property of real numbers did John use for Step 2?

- A multiplication property of equality
- B zero product property of multiplication
- C commutative property of multiplication
- D distributive property of multiplication over addition

CSA20034

- 21** Stan's solution to an equation is shown below.

Given:  $n + 8(n + 20) = 110$

Step 1:  $n + 8n + 20 = 110$

Step 2:  $9n + 20 = 110$

Step 3:  $9n = 110 - 20$

Step 4:  $9n = 90$

Step 5:  $\frac{9n}{9} = \frac{90}{9}$

Step 6:  $n = 10$

Which statement about Stan's solution is true?

- A Stan's solution is correct.
- B Stan made a mistake in Step 1.
- C Stan made a mistake in Step 3.
- D Stan made a mistake in Step 5.

CSA20035

- 22** When is this statement true?

The opposite of a number is less than the original number.

- A This statement is never true.
- B This statement is always true.
- C This statement is true for positive numbers.
- D This statement is true for negative numbers.

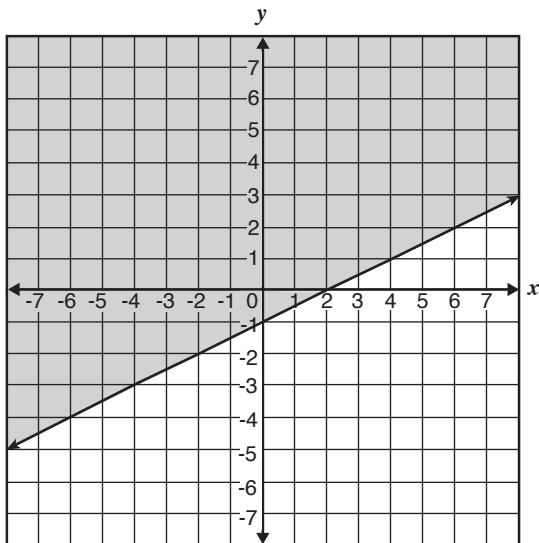
CSA20147

**23** What is the y-intercept of the graph of  $4x + 2y = 12$ ?

- A -4
- B -2
- C 6
- D 12

CSA00239

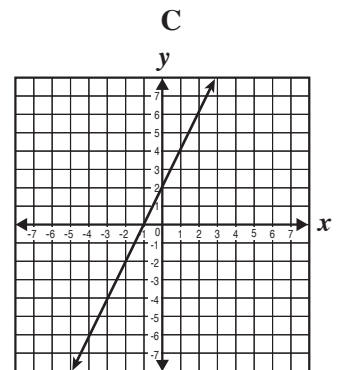
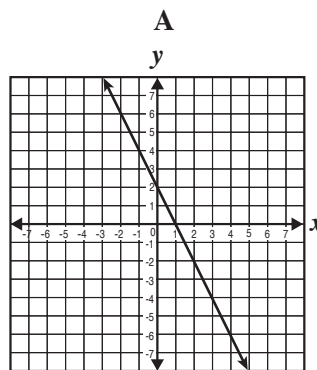
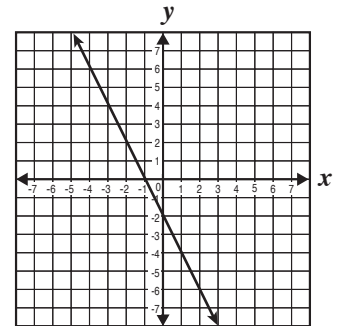
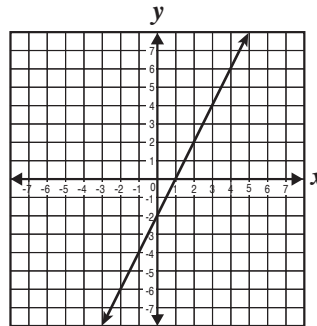
**24** Which inequality is shown on the graph below?



- A  $y < \frac{1}{2}x - 1$
- B  $y \leq \frac{1}{2}x - 1$
- C  $y > \frac{1}{2}x - 1$
- D  $y \geq \frac{1}{2}x - 1$

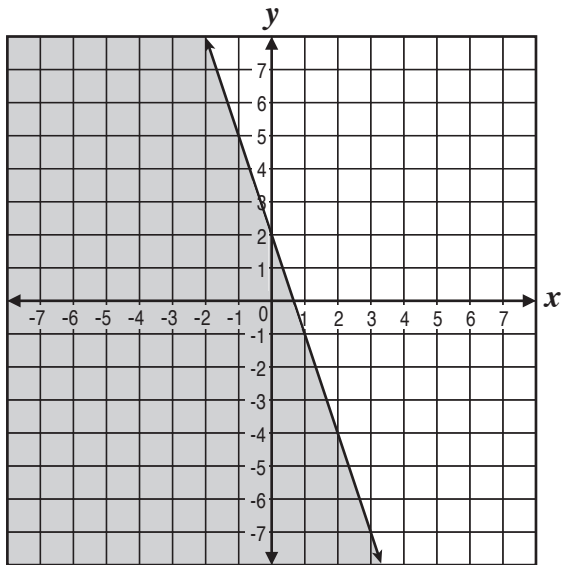
CSA10130

**25** Which *best* represents the graph of  $y = 2x - 2$ ?



CSA00299

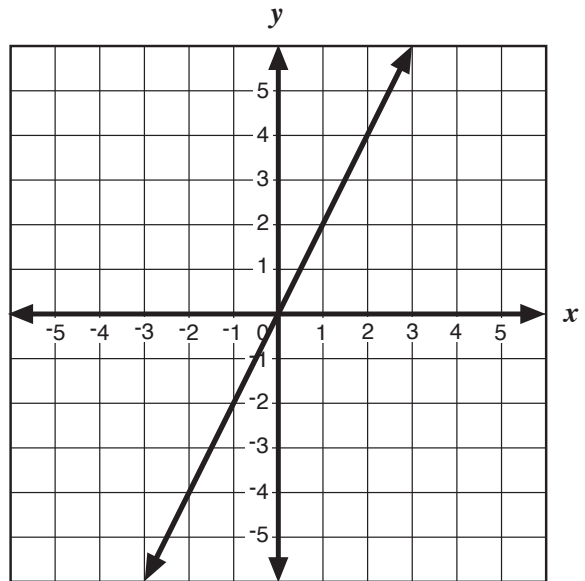
- 26 Which inequality does the shaded region of the graph represent?



- A  $3x + y \leq 2$   
 B  $3x + y \geq 2$   
 C  $3x + y \leq -2$   
 D  $3x + y \geq -2$

CSA20055

27



Which equation *best* represents the graph above?

- A  $y = x$   
 B  $y = 2x$   
 C  $y = x + 2$   
 D  $y = 2x + 2$

CSA00508

- 28 Which point lies on the line defined by  $3x + 6y = 2$ ?

- A  $(0, 2)$   
 B  $(0, 6)$   
 C  $\left(1, -\frac{1}{6}\right)$   
 D  $\left(1, -\frac{1}{3}\right)$

CSA00009

- 29** What is the equation of the line that has a slope of 4 and passes through the point  $(3, -10)$ ?

- A  $y = 4x - 22$   
 B  $y = 4x + 22$   
 C  $y = 4x - 43$   
 D  $y = 4x + 43$

CSA10150

- 30** The data in the table show the cost of renting a bicycle by the hour, including a deposit.

Renting a Bicycle

Hours ( $h$ )	Cost in dollars ( $c$ )
2	15
5	30
8	45

If hours,  $h$ , were graphed on the horizontal axis and cost,  $c$ , were graphed on the vertical axis, what would be the equation of a line that fits the data?

- A  $c = 5h$   
 B  $c = \frac{1}{5}h + 5$   
 C  $c = 5h + 5$   
 D  $c = 5h - 5$

CSA10005

- 31** Some ordered pairs for a linear function of  $x$  are given in the table below.

$x$	$y$
1	1
3	7
5	13
7	19

Which of the following equations was used to generate the table above?

- A  $y = 2x + 1$   
 B  $y = 2x - 1$   
 C  $y = 3x - 2$   
 D  $y = 4x - 3$

CSA10181

- 32** The equation of line  $l$  is  $6x + 5y = 3$ , and the equation of line  $q$  is  $5x - 6y = 0$ . Which statement about the two lines is true?

- A Lines  $l$  and  $q$  have the same  $y$ -intercept.  
 B Lines  $l$  and  $q$  are parallel.  
 C Lines  $l$  and  $q$  have the same  $x$ -intercept.  
 D Lines  $l$  and  $q$  are perpendicular.

CSA00241



**33** Which equation represents a line that is

parallel to  $y = -\frac{5}{4}x + 2$ ?

A  $y = -\frac{5}{4}x + 1$

B  $y = -\frac{4}{5}x + 2$

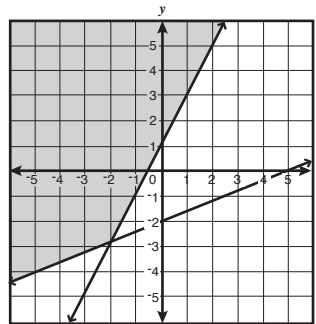
C  $y = \frac{4}{5}x + 3$

D  $y = \frac{5}{4}x + 4$

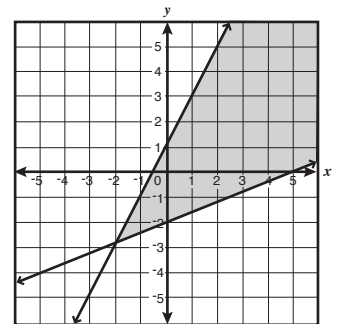
CSA10112

**34** Which graph *best* represents the solution to this system of inequalities?

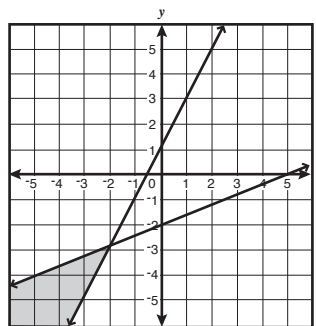
$$\begin{cases} 2x \geq y - 1 \\ 2x - 5y \leq 10 \end{cases}$$



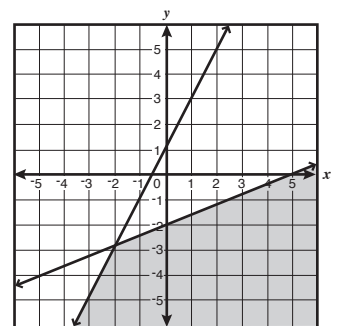
A



C



B



D

CSA00516

**35** What is the solution to this system of equations?

$$\begin{cases} y = -3x - 2 \\ 6x + 2y = -4 \end{cases}$$

A (6, 2)

B (1, -5)

C no solution

D infinitely many solutions

CSA00027

- 36** Which ordered pair is the solution to the system of equations below?

$$\begin{cases} x + 3y = 7 \\ x + 2y = 10 \end{cases}$$

- A  $\left(\frac{7}{2}, \frac{13}{4}\right)$   
 B  $\left(\frac{7}{2}, \frac{17}{5}\right)$   
 C  $(-2, 3)$   
 D  $(16, -3)$

CSA10131

- 37** Marcy has a total of 100 dimes and quarters. If the total value of the coins is \$14.05, how many quarters does she have?

- A 27  
 B 40  
 C 56  
 D 73

CSA20083

- 38** Which of the following *best* describes the graph of this system of equations?

$$\begin{cases} y = -2x + 3 \\ 5y = -10x + 15 \end{cases}$$

- A two identical lines  
 B two parallel lines  
 C two lines intersecting in only one point  
 D two lines intersecting in only two points

CSA00509

**39**  $\frac{5x^3}{10x^7} =$

- A  $2x^4$   
 B  $\frac{1}{2x^4}$   
 C  $\frac{1}{5x^4}$   
 D  $\frac{x^4}{5}$

CSA00303

**40**  $(4x^2 - 2x + 8) - (x^2 + 3x - 2) =$

- A  $3x^2 + x + 6$   
 B  $3x^2 + x + 10$   
 C  $3x^2 - 5x + 6$   
 D  $3x^2 - 5x + 10$

CSA00086

- 41** The sum of two binomials is  $5x^2 - 6x$ . If one of the binomials is  $3x^2 - 2x$ , what is the other binomial?

- A  $2x^2 - 4x$   
 B  $2x^2 - 8x$   
 C  $8x^2 + 4x$   
 D  $8x^2 - 8x$

CSA10160

**42** Which of the following expressions is equal to

$$(x + 2) + (x - 2)(2x + 1)?$$

- A  $2x^2 - 2x$
- B  $2x^2 - 4x$
- C  $2x^2 + x$
- D  $4x^2 + 2x$

CSA10191

**43** A volleyball court is shaped like a rectangle. It has a width of  $x$  meters and a length of  $2x$  meters. Which expression gives the area of the court in square meters?

- A  $3x$
- B  $2x^2$
- C  $3x^2$
- D  $2x^3$

CSA00496

**44** Which is the factored form of  $3a^2 - 24ab + 48b^2$ ?

- A  $(3a - 8b)(a - 6b)$
- B  $(3a - 16b)(a - 3b)$
- C  $3(a - 4b)(a - 4b)$
- D  $3(a - 8b)(a - 8b)$

CSA00066

**45** Which is a factor of  $x^2 - 11x + 24$ ?

- A  $x + 3$
- B  $x - 3$
- C  $x + 4$
- D  $x - 4$

CSA00503

**46** Which of the following shows  $9t^2 + 12t + 4$  factored completely?

- A  $(3t + 2)^2$
- B  $(3t + 4)(3t + 1)$
- C  $(9t + 4)(t + 1)$
- D  $9t^2 + 12t + 4$

CSA20106

**47** What is the complete factorization of  $32 - 8z^2$ ?

- A  $-8(2 + z)(2 - z)$
- B  $8(2 + z)(2 - z)$
- C  $-8(2 + z)^2$
- D  $8(2 - z)^2$

CSA20105

**48** If  $x^2$  is added to  $x$ , the sum is 42. Which of the following could be the value of  $x$ ?

- A  $-7$
- B  $-6$
- C  $14$
- D  $42$

CSA10171

- 49** What quantity should be added to both sides of this equation to complete the square?

$$x^2 - 8x = 5$$

- A 4
- B -4
- C 16
- D -16

CSA00478

- 50** What are the solutions for the quadratic equation  $x^2 + 6x = 16$ ?

- A -2, -8
- B -2, 8
- C 2, -8
- D 2, 8

CSA10062

- 51** Leanne correctly solved the equation  $x^2 + 4x = 6$  by completing the square. Which equation is part of her solution?

- A  $(x + 2)^2 = 8$
- B  $(x + 2)^2 = 10$
- C  $(x + 4)^2 = 10$
- D  $(x + 4)^2 = 22$

CSA20139

- 52** Carter is solving this equation by factoring.

$$10x^2 - 25x + 15 = 0$$

Which expression could be one of his correct factors?

- A  $x + 3$
- B  $x - 3$
- C  $2x + 3$
- D  $2x - 3$

CSA00162

- 53** Toni is solving this equation by completing the square.

$$ax^2 + bx + c = 0 \text{ (where } a \geq 0\text{)}$$

Step 1:  $ax^2 + bx = -c$

Step 2:  $x^2 + \frac{b}{a}x = -\frac{c}{a}$

Step 3: ?

Which should be Step 3 in the solution?

A  $x^2 = -\frac{c}{b} - \frac{b}{a}x$

B  $x + \frac{b}{a} = -\frac{c}{ax}$

C  $x^2 + \frac{b}{a}x + \frac{b}{2a} = -\frac{c}{a} + \frac{b}{2a}$

D  $x^2 + \frac{b}{a}x + \left(\frac{b}{2a}\right)^2 = -\frac{c}{a} + \left(\frac{b}{2a}\right)^2$

CSA00072

- 54** Four steps to derive the quadratic formula are shown below.

I	$x^2 + \frac{bx}{a} = \frac{-c}{a}$
II	$\left(x + \frac{b}{2a}\right)^2 = \frac{b^2 - 4ac}{4a^2}$
III	$x = \pm \sqrt{\frac{b^2 - 4ac}{4a^2}} - \frac{b}{2a}$
IV	$x^2 + \frac{bx}{a} + \left(\frac{b}{2a}\right)^2 = \frac{-c}{a} + \left(\frac{b}{2a}\right)^2$

What is the correct order for these steps?

- A I, IV, II, III  
 B I, III, IV, II  
 C II, IV, I, III  
 D II, III, I, IV

CSA20062

- 55** Which is one of the solutions to the equation  $2x^2 - x - 4 = 0$ ?

- A  $\frac{1}{4} - \sqrt{33}$   
 B  $-\frac{1}{4} + \sqrt{33}$   
 C  $\frac{1 + \sqrt{33}}{4}$   
 D  $\frac{-1 - \sqrt{33}}{4}$

CSA00314

- 56** Which statement *best* explains why there is no real solution to the quadratic equation  $2x^2 + x + 7 = 0$ ?

- A The value of  $1^2 - 4 \cdot 2 \cdot 7$  is positive.  
 B The value of  $1^2 - 4 \cdot 2 \cdot 7$  is equal to 0.  
 C The value of  $1^2 - 4 \cdot 2 \cdot 7$  is negative.  
 D The value of  $1^2 - 4 \cdot 2 \cdot 7$  is not a perfect square.

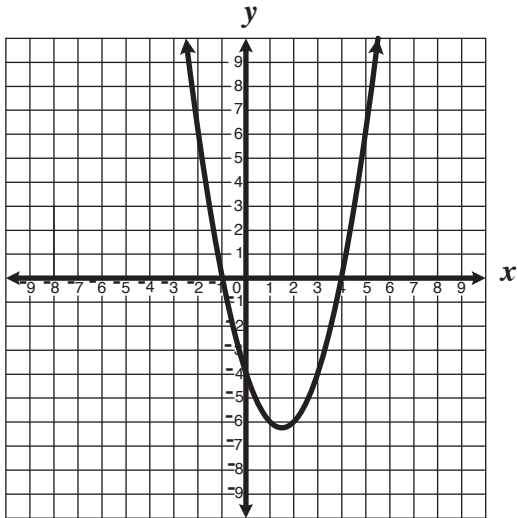
CSA10147

- 57** What is the solution set of the quadratic equation  $8x^2 + 2x + 1 = 0$ ?

- A  $\left\{-\frac{1}{2}, \frac{1}{4}\right\}$   
 B  $\{-1 + \sqrt{2}, -1 - \sqrt{2}\}$   
 C  $\left\{\frac{-1 + \sqrt{7}}{8}, \frac{-1 - \sqrt{7}}{8}\right\}$   
 D no real solution

CSA10179

- 58** The graph of the equation  $y = x^2 - 3x - 4$  is shown below.

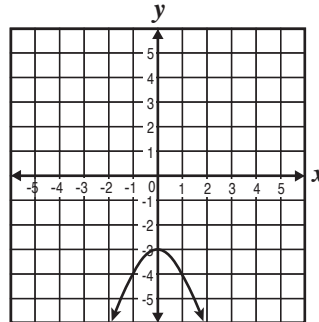


For what value or values of  $x$  is  $y = 0$ ?

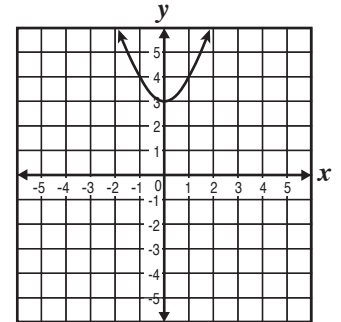
- A  $x = -1$  only
- B  $x = -4$  only
- C  $x = -1$  and  $x = 4$
- D  $x = 1$  and  $x = -4$

CSA00514

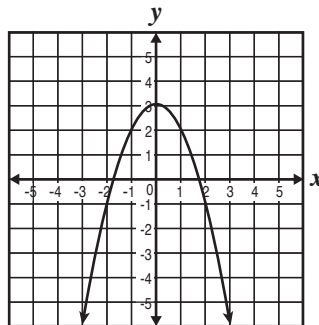
- 59** Which *best* represents the graph of  $y = -x^2 + 3$ ?



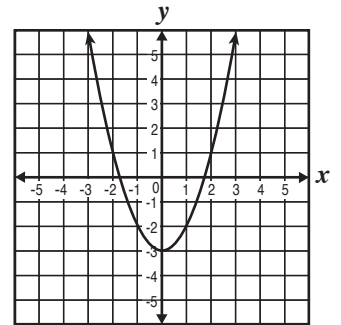
A



C



B



D

CSA00519

- 60** Which quadratic function, when graphed, has  $x$ -intercepts of 4 and  $-3$ ?

- A  $y = (x - 3)(x + 4)$
- B  $y = (x + 3)(2x - 8)$
- C  $y = (3x - 1)(4x + 1)$
- D  $y = (3x + 1)(8x - 2)$

CSA20115

**61** How many times does the graph of  $y = 2x^2 - 2x + 3$  intersect the  $x$ -axis?

- A none
- B one
- C two
- D three

CSA10084

**62** An object that is projected straight downward with initial velocity  $v$  feet per second travels a distance  $s = vt + 16t^2$ , where  $t =$  time in seconds. If Ramón is standing on a balcony 84 feet above the ground and throws a penny straight down with an initial velocity of 10 feet per second, in how many seconds will it reach the ground?

- A 2 seconds
- B 3 seconds
- C 6 seconds
- D 8 seconds

CSA00158

**63** The height of a triangle is 4 inches greater than twice its base. The area of the triangle is 168 square inches. What is the base of the triangle?

- A 7 in.
- B 8 in.
- C 12 in.
- D 14 in.

CSA00104

**64** What is  $\frac{x^2 - 4xy + 4y^2}{3xy - 6y^2}$  reduced to lowest terms?

- A  $\frac{x-2y}{3}$
- B  $\frac{x-2y}{3y}$
- C  $\frac{x+2y}{3}$
- D  $\frac{x+2y}{3y}$

CSA00463

**65** Simplify  $\frac{6x^2 + 21x + 9}{4x^2 - 1}$  to lowest terms.

- A  $\frac{3(x+1)}{2x-1}$
- B  $\frac{3(x+3)}{2x-1}$
- C  $\frac{3(2x+3)}{4(x-1)}$
- D  $\frac{3(x+3)}{2x+1}$

CSA10025

**66** What is  $\frac{x^2 - 4x + 4}{x^2 - 3x + 2}$  reduced to lowest terms?

A  $\frac{x-2}{x-1}$

B  $\frac{x-2}{x+1}$

C  $\frac{x+2}{x-1}$

D  $\frac{x+2}{x+1}$

CSA10189

**67** What is  $\frac{12a^3 - 20a^2}{16a^2 + 8a}$  reduced to lowest terms?

A  $\frac{a}{2}$

B  $\frac{3a-5}{2a+1}$

C  $-\frac{2a}{4+2a}$

D  $\frac{a(3a-5)}{2(2a+1)}$

CSA00013

**68**  $\frac{7z^2 + 7z}{4z + 8} \cdot \frac{z^2 - 4}{z^3 + 2z^2 + z} =$

A  $\frac{7(z-2)}{4(z+1)}$

B  $\frac{7(z+2)}{4(z-1)}$

C  $\frac{7z(z+1)}{4(z+2)}$

D  $\frac{7z(z-1)}{4(z+2)}$

CSA00067

**69** Which fraction equals the product

$$\left(\frac{x+5}{3x+2}\right)\left(\frac{2x-3}{x-5}\right)?$$

A  $\frac{2x-3}{3x+2}$

B  $\frac{3x+2}{4x-3}$

C  $\frac{x^2-25}{6x^2-5x-6}$

D  $\frac{2x^2+7x-15}{3x^2-13x-10}$

CSA10029



70

$$\frac{x^2 + 8x + 16}{x + 3} \div \frac{2x + 8}{x^2 - 9} =$$

- A  $\frac{2(x+4)^2}{(x-3)(x+3)^2}$
- B  $\frac{2(x+3)(x-3)}{x+4}$
- C  $\frac{(x+4)(x-3)}{2}$
- D  $\frac{(x+4)(x-3)^2}{2(x+3)}$

CSA20164

71

Which fraction is equivalent to  $\frac{\frac{3x}{5}}{\frac{x}{4} + \frac{x}{2}}$ ?

- A  $\frac{x^2}{5}$
- B  $\frac{9x^2}{20}$
- C  $\frac{4}{5}$
- D  $\frac{9}{5}$

CSA10141

72

A pharmacist mixed some 10%-saline solution with some 15%-saline solution to obtain 100 mL of a 12%-saline solution. How much of the 10%-saline solution did the pharmacist use in the mixture?

- A 60 mL
- B 45 mL
- C 40 mL
- D 25 mL

CSA00333

73

Andy's average driving speed for a 4-hour trip was 45 miles per hour. During the first 3 hours he drove 40 miles per hour. What was his average speed for the last hour of his trip?

- A 50 miles per hour
- B 60 miles per hour
- C 65 miles per hour
- D 70 miles per hour

CSA00576

74

One pipe can fill a tank in 20 minutes, while another takes 30 minutes to fill the same tank. How long would it take the two pipes together to fill the tank?

- A 50 min
- B 25 min
- C 15 min
- D 12 min

CSA00161

**75** Two airplanes left the same airport traveling in opposite directions. If one airplane averages 400 miles per hour and the other airplane averages 250 miles per hour, in how many hours will the distance between the two planes be 1625 miles?

- A 2.5
- B 4
- C 5
- D 10.8

CSA10055

**76** Lisa will make punch that is 25% fruit juice by adding pure fruit juice to a 2-liter mixture that is 10% pure fruit juice. How many liters of pure fruit juice does she need to add?

- A 0.4 liter
- B 0.5 liter
- C 2 liters
- D 8 liters

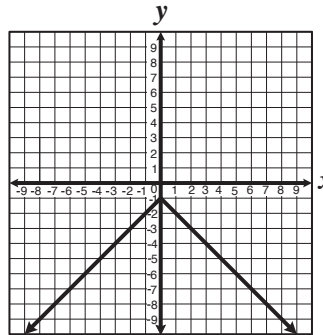
CSA10186

**77** Which relation is a function?

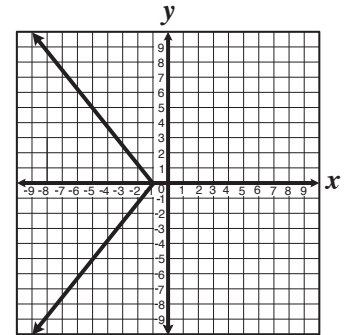
- A  $\{(-1, 3), (-2, 6), (0, 0), (-2, -2)\}$
- B  $\{(-2, -2), (0, 0), (1, 1), (2, 2)\}$
- C  $\{(4, 0), (4, 1), (4, 2), (4, 3)\}$
- D  $\{(7, 4), (8, 8), (10, 8), (10, 10)\}$

CSA10070

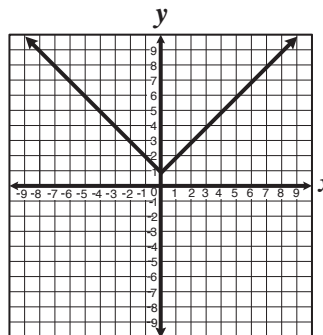
**78** For which equation graphed below are *all* the y-values negative?



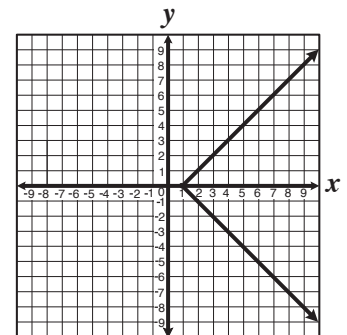
A



C



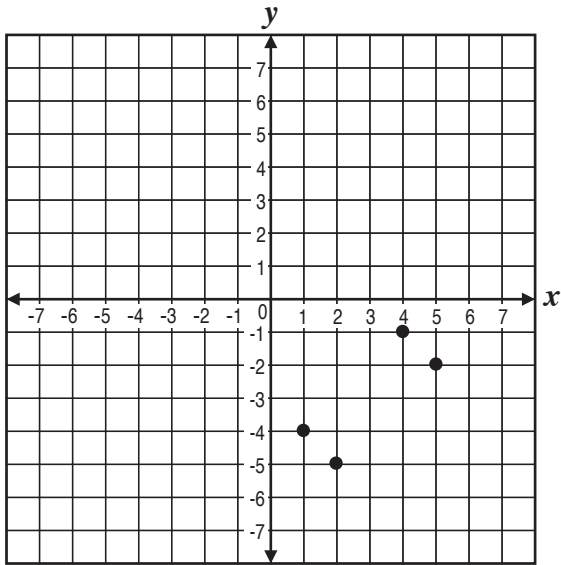
B



D

CSA00522

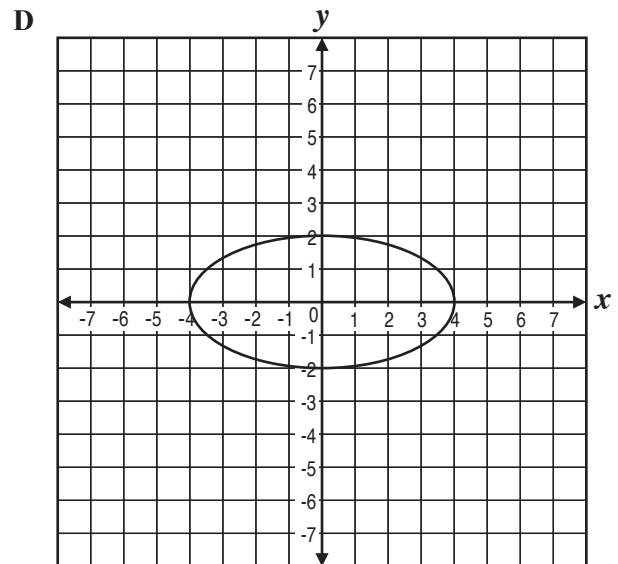
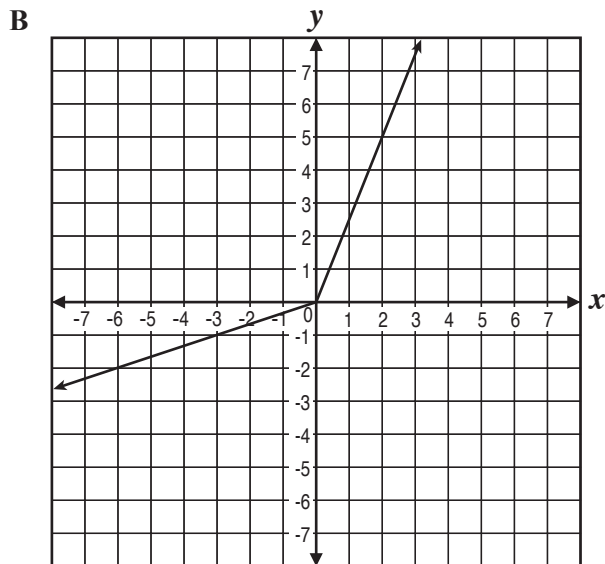
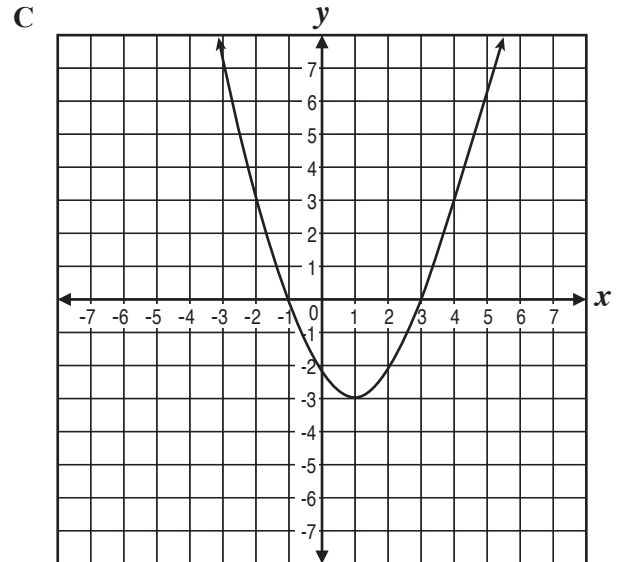
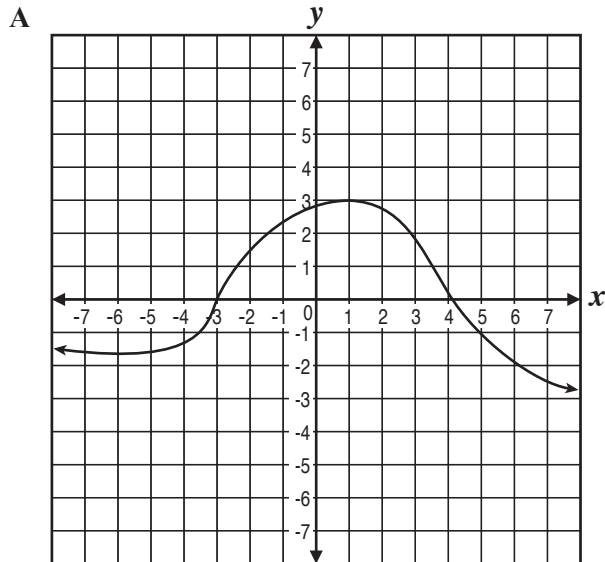
- 79 What is the domain of the function shown on the graph below?



- A  $\{-1, -2, -3, -4\}$   
B  $\{-1, -2, -4, -5\}$   
C  $\{1, 2, 3, 4\}$   
D  $\{1, 2, 4, 5\}$

CSA10072

80 Which of the following graphs represents a relation that is *not* a function of  $x$ ?



CSA30002

Question Number	Correct Answer	Standard	Year of Release
1	<i>C</i>	1.1	2006
2	<i>B</i>	2.0	2003
3	<i>B</i>	2.0	2005
4	<i>B</i>	2.0	2006
5	<i>D</i>	2.0	2007
6	<i>C</i>	3.0	2003
7	<i>D</i>	3.0	2004
8	<i>A</i>	4.0	2003
9	<i>C</i>	4.0	2005
10	<i>B</i>	5.0	2003
11	<i>B</i>	5.0	2004
12	<i>C</i>	5.0	2004
13	<i>C</i>	5.0	2006
14	<i>B</i>	5.0	2007
15	<i>A</i>	5.0	2007
16	<i>D</i>	24.1	2004
17	<i>D</i>	24.2	2006
18	<i>D</i>	24.2	2007
19	<i>A</i>	24.3	2005
20	<i>B</i>	25.1	2005
21	<i>B</i>	25.2	2006
22	<i>C</i>	25.3	2005
23	<i>C</i>	6.0	2003
24	<i>D</i>	6.0	2004
25	<i>A</i>	6.0	2006
26	<i>A</i>	6.0	2007
27	<i>B</i>	6.0	2007
28	<i>C</i>	7.0	2003
29	<i>A</i>	7.0	2004
30	<i>C</i>	7.0	2005
31	<i>C</i>	7.0	2007
32	<i>D</i>	8.0	2003
33	<i>A</i>	8.0	2004
34	<i>C</i>	9.0	2003
35	<i>D</i>	9.0	2004

Question Number	Correct Answer	Standard	Year of Release
36	<i>D</i>	9.0	2006
37	<i>A</i>	9.0	2006
38	<i>A</i>	9.0	2007
39	<i>B</i>	10.0	2004
40	<i>D</i>	10.0	2005
41	<i>A</i>	10.0	2006
42	<i>A</i>	10.0	2006
43	<i>B</i>	10.0	2007
44	<i>C</i>	11.0	2003
45	<i>B</i>	11.0	2004
46	<i>A</i>	11.0	2005
47	<i>B</i>	11.0	2007
48	<i>A</i>	14.0	2004
49	<i>C</i>	14.0	2005
50	<i>C</i>	14.0	2005
51	<i>B</i>	14.0	2006
52	<i>D</i>	14.0	2007
53	<i>D</i>	19.0	2003
54	<i>A</i>	19.0	2005
55	<i>C</i>	20.0	2003
56	<i>C</i>	20.0	2005
57	<i>D</i>	20.0	2005
58	<i>C</i>	21.0	2003
59	<i>B</i>	21.0	2006
60	<i>B</i>	21.0	2007
61	<i>A</i>	22.0	2004
62	<i>A</i>	23.0	2003
63	<i>C</i>	23.0	2004
64	<i>B</i>	12.0	2003
65	<i>B</i>	12.0	2005
66	<i>A</i>	12.0	2006
67	<i>D</i>	12.0	2007
68	<i>A</i>	13.0	2003
69	<i>D</i>	13.0	2005
70	<i>C</i>	13.0	2006

Question Number	Correct Answer	Standard	Year of Release
71	<i>C</i>	13.0	2007
72	<i>A</i>	15.0	2003
73	<i>B</i>	15.0	2004
74	<i>D</i>	15.0	2006
75	<i>A</i>	15.0	2006
76	<i>A</i>	15.0	2007
77	<i>B</i>	16.0	2004
78	<i>A</i>	17.0	2004
79	<i>D</i>	17.0	2005
80	<i>D</i>	18.0	2007