

ALEKS® Final Prep Quiz 2 #1

Beginning and Intermediate Algebra Combined / MATH 101 - Fall 2014 – 504 (Prof. Miller)

Student Name/ID:

Instructor Note:

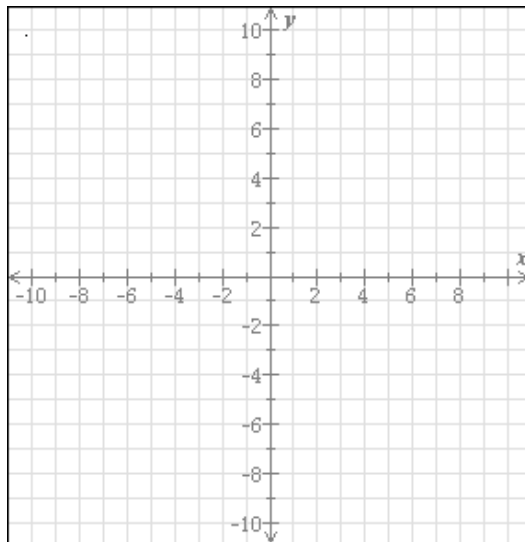
Directions: Every problem is worth two points. One point is for trying the problem and showing your work and one point is for getting the correct answer. There are an additional five points for demonstrating the study strategy that is posted on the board and talked about at the beginning of class.

1. A movie club surveyed 250 high school students. The students were asked how often they go to the movies and whether they prefer action movies or dramas. Their responses are summarized in the following table.

	Twice a month or less	Three times a month or more
Action	78	32
Drama	87	53

- (a) What percentage of the students go to the movies three times a month or more?
- (b) What percentage of the students prefer dramas ?

2. Graph the line whose y -intercept is -9 and whose x -intercept is -2



3. Evaluate the following.

$$45 \div (-5) = \boxed{}$$

$$-6 \times (-5) = \boxed{}$$

4. Find an ordered pair (x, y) that is a solution to the equation.

$$2x - y = 3$$

5. Solve the inequality for y

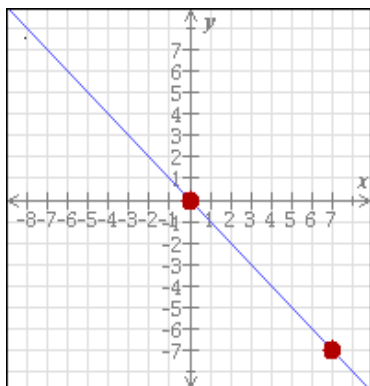
$$\frac{5}{8}y - 1 > 6y - \frac{3}{2}$$

Simplify your answer as much as possible.

6. Solve for u

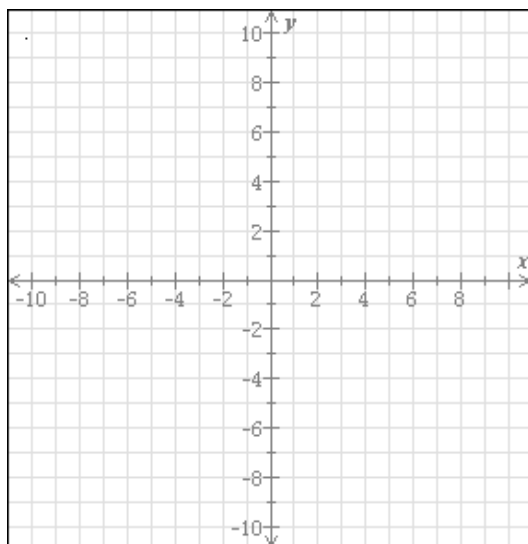
$$|u| - 16 = -8$$

7. Write an equation of the line below.



8. Graph the line.

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



9. A wire is first bent into the shape of a rectangle with width 11 cm and length 13 cm. Then the wire is unbent and reshaped into a triangle. If each side of the triangle has equal length, what is this length?

10. The sets A and E are given below.

$$A = \{ 1, 2, 3, 4, 6 \}$$

$$E = \{ 0, 2, 3, 8 \}$$

Find the union of A and E

Find the intersection of A and E

Write your answers using set notation.

11. Use the distributive property to remove the parentheses.

$$-5(-y - 4w + 3)$$

12. Evaluate.

$$(-9)^2 = \boxed{}$$

$$(-4)^3 = \boxed{}$$

13. Solve for w

$$|w| - 21 = -14$$

14. Evaluate.

$$4 + 2 \cdot 6^2$$

15. Solve the following proportion for v

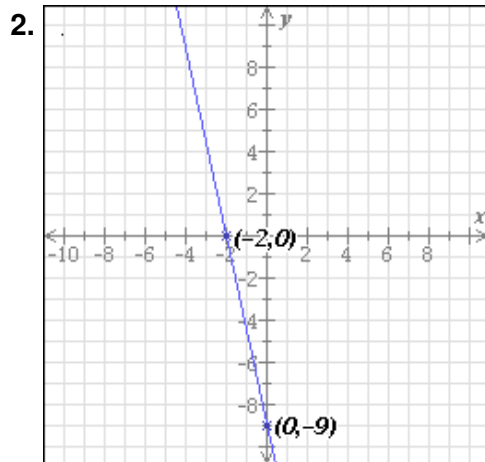
$$\frac{v}{7} = \frac{8}{3}$$

Round your answer to the nearest tenth.

Final Prep Quiz 2 #1 Answers for class Beginning and Intermediate Algebra Combined / MATH 101 - Fall 2014 – 504

1. (a) 34%

(b) 56%



3. $45 \div (-5) = -9$

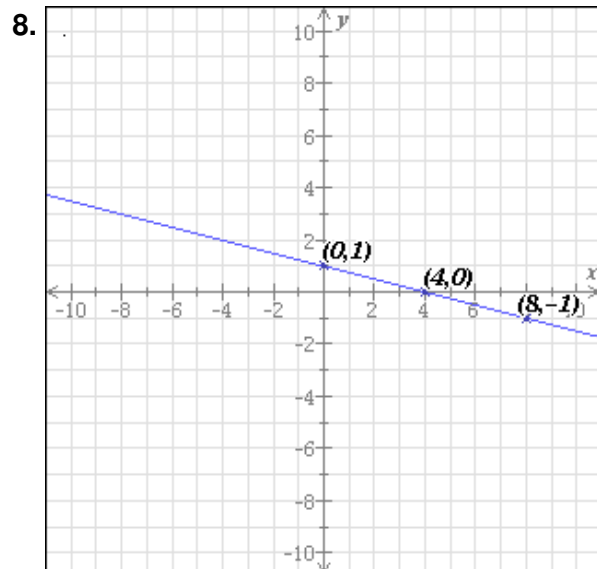
$$-6 \times (-5) = 30$$

4. One possible answer is $(x, y) = (0, -3)$

5. $y < \frac{4}{43}$

6. $u = 8, -8$

7. $y = -x$



9. 16 cm

10. $A \cup E = \{ 0, 1, 2, 3, 4, 6, 8 \}$

$A \cap E = \{ 2, 3 \}$

11. $5y + 20w - 15$

12. $(-9)^2 = 81$

$(-4)^3 = -64$

13. $w = 7, -7$

14. 76

15. $v = 18.7$