

Class Name : *MT* Math 095 MW Fall 18 - Math 095
MW Fall18 B02

Instructor Name : Bottom

Student Name : _____

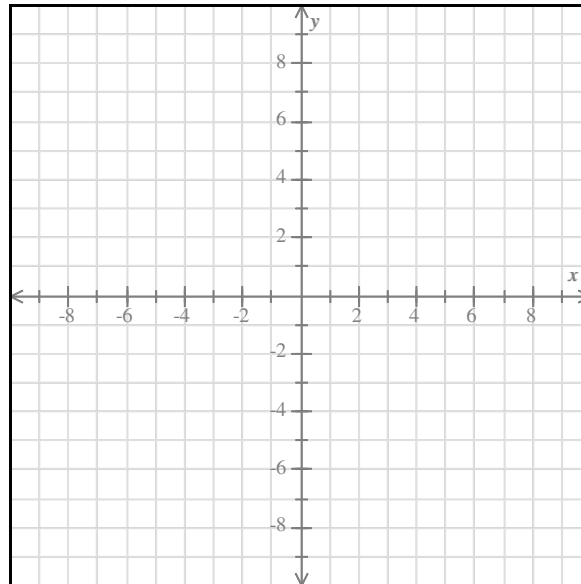
Instructor Note : _____

1. For each ordered pair, determine whether it is a solution to $y = 6x - 4$.

(x, y)	Is it a solution?	
	Yes	No
$(-6, 27)$	☐	☐
$(-4, -9)$	☐	☐
$(3, -14)$	☐	☐
$(8, 44)$	☐	☐

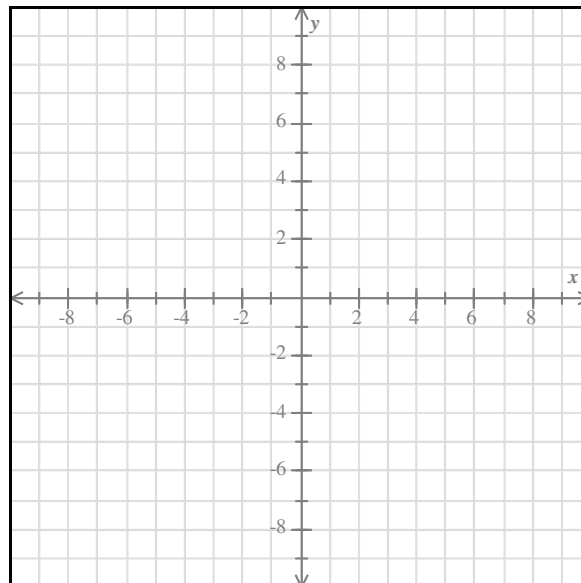
2. Graph the line.

$$y = \frac{3}{2}x$$

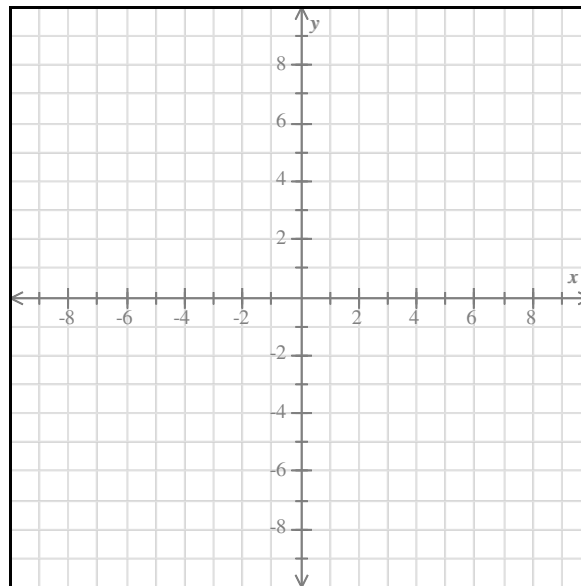


3. Graph the line.

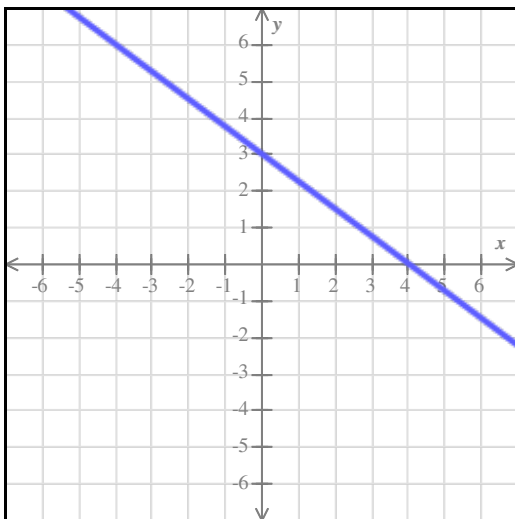
$$y = 2x - 7$$



4. Graph the line $y = -1$.



5. Find the x -intercept and the y -intercept of the line below.



6. Find the x -intercept and y -intercept of the line.

$$6x + 5y = -12$$

x -intercept: _____

y -intercept: _____

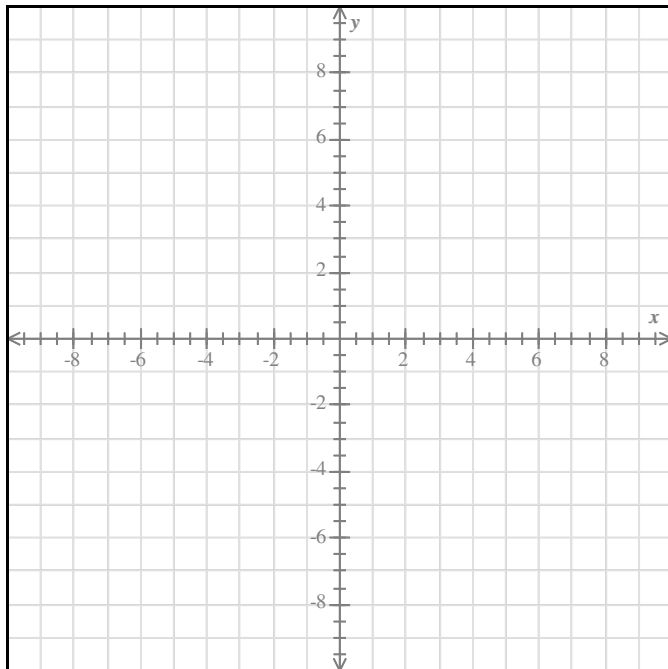
7. The equation of a line is given below.

$$6x - 9y = 27$$

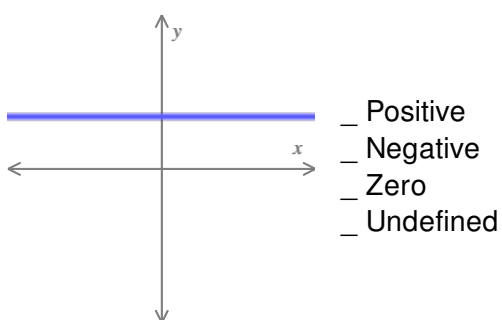
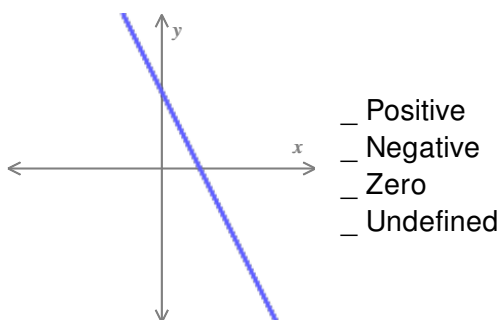
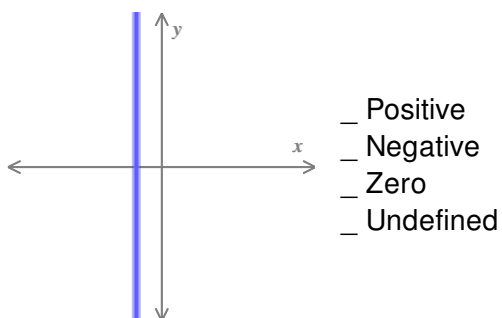
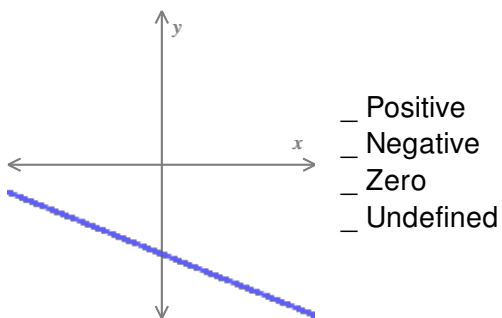
Find the x -intercept and the y -intercept.
Then use them to graph the line.

x -intercept: _____

y -intercept: _____



8. For each line, determine whether the slope is positive, negative, zero, or undefined.



9. Fill in the blanks below.

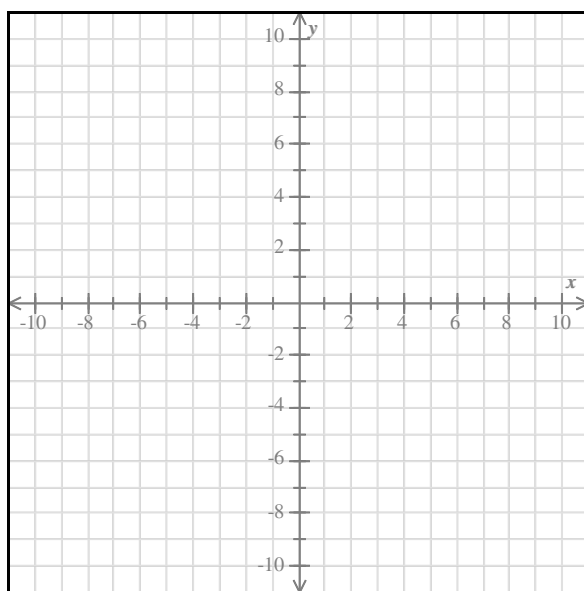
Find the slope of the line passing through the points $(-8, 5)$ and $(8, 5)$.

slope:

Find the slope of the line passing through the points $(9, -2)$ and $(-2, -2)$.

slope:

10. Graph the line with slope $\frac{1}{2}$ passing through the point $(4, 2)$.



11. Find the y-intercept and the slope of the line.

$$y = -\frac{1}{5}x - \frac{1}{2}$$

12. Find the y-intercept and the slope of the line.

$$-2x + 5y = -4$$

Write your answers in simplest form.

13. A line passes through the point $(-3, -6)$ and has a slope of 5.

Write an equation in slope-intercept form for this line.

14. Write an equation in slope-intercept form for the line with slope $-\frac{1}{2}$ and y-intercept 7.

15. The equations of three lines are given below.

Line 1: $y = \frac{1}{3}x - 7$

Line 2: $3x + 9y = -9$

Line 3: $y = -3x + 6$

For each pair of lines, determine whether they are parallel, perpendicular, or neither.

Line 1 and Line 2: ☐ Parallel ☐ Perpendicular ☐ Neither

Line 1 and Line 3: ☐ Parallel ☐ Perpendicular ☐ Neither

Line 2 and Line 3: ☐ Parallel ☐ Perpendicular ☐ Neither

16. Consider the line $y = \frac{1}{3}x$.

What is the slope of a line perpendicular to this line?

What is the slope of a line parallel to this line?

17. Consider the line $8x + 4y = 3$.

What is the slope of a line parallel to this line?

What is the slope of a line perpendicular to this line?

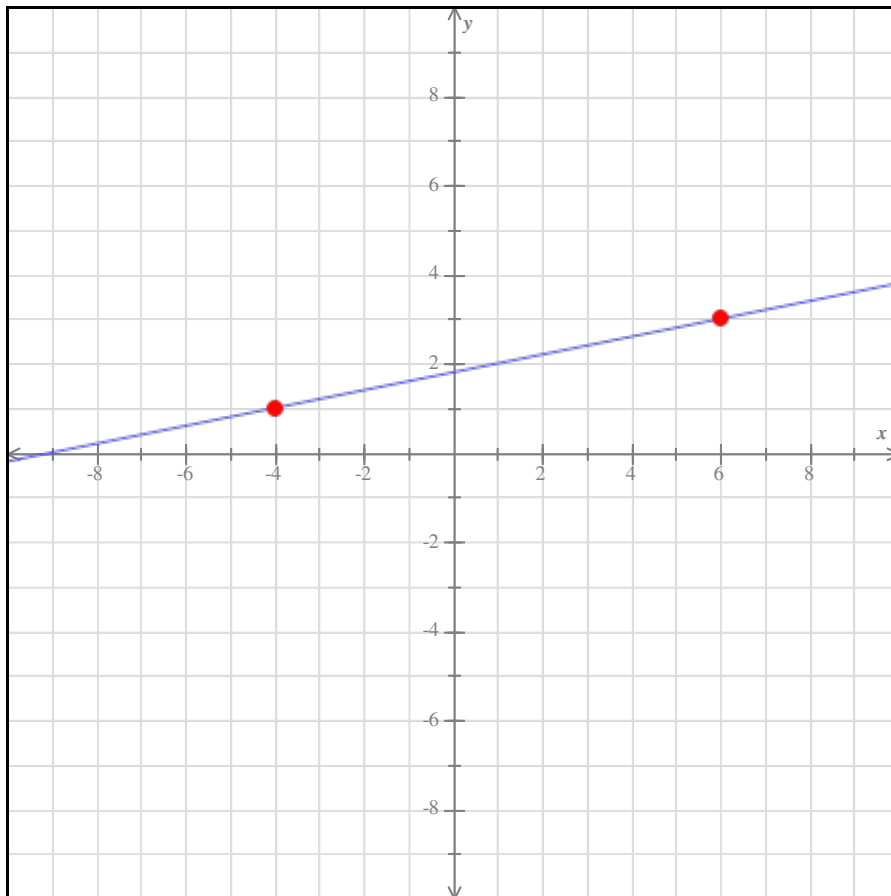
18. A line passes through the point $(-4, 2)$ and has a slope of 3.

Write an equation in point-slope form for this line.

19. A line passes through the point $(10, 2)$ and has a slope of $\frac{1}{2}$.

Write an equation in slope-intercept form for this line.

20. Find an equation for the line below.

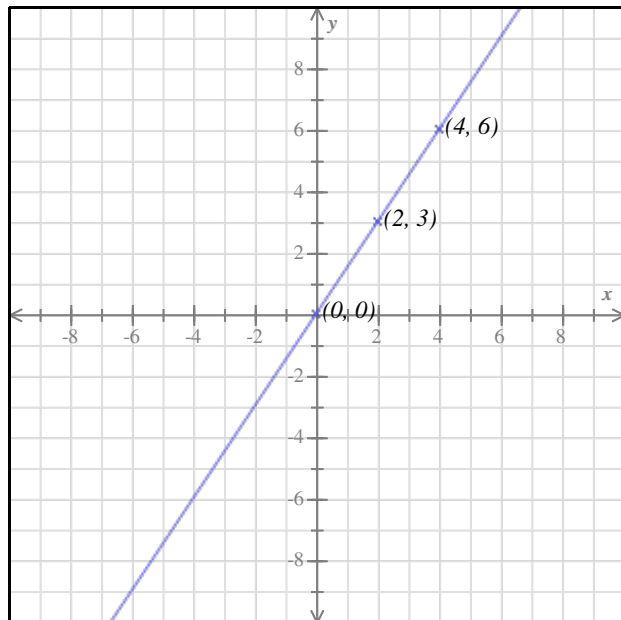


Quiz 2 Chapter 3 #1 Answers for class *MT* Math 095 MW Fall 18 - Math 095 MW Fall18 B02

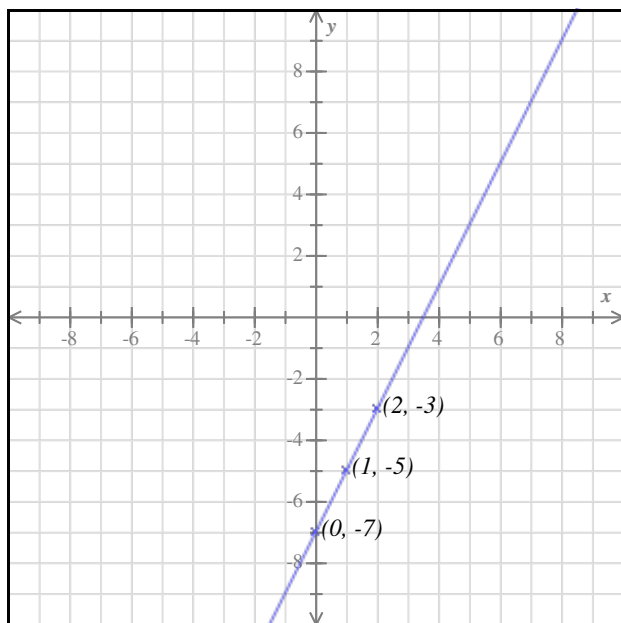
1.

(x, y)	Is it a solution?	
	Yes	No
$(-6, 27)$	☐	☒
$(-4, -9)$	☐	☒
$(3, -14)$	☐	☒
$(8, 44)$	☒	☐

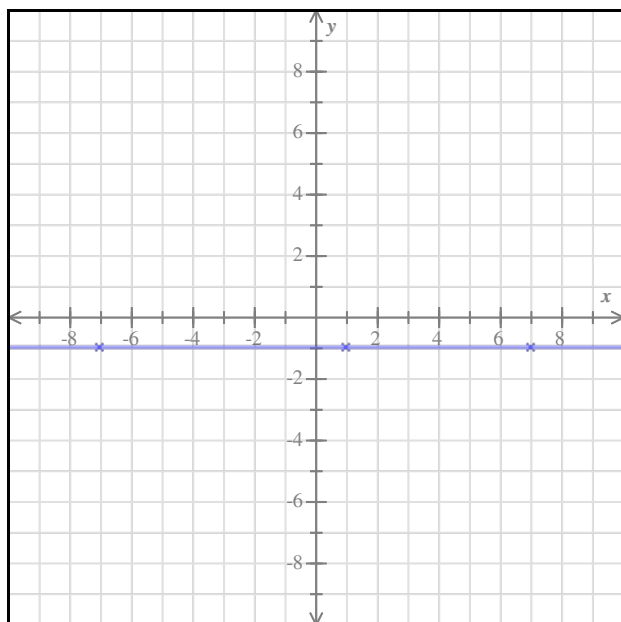
2.



3.



4.

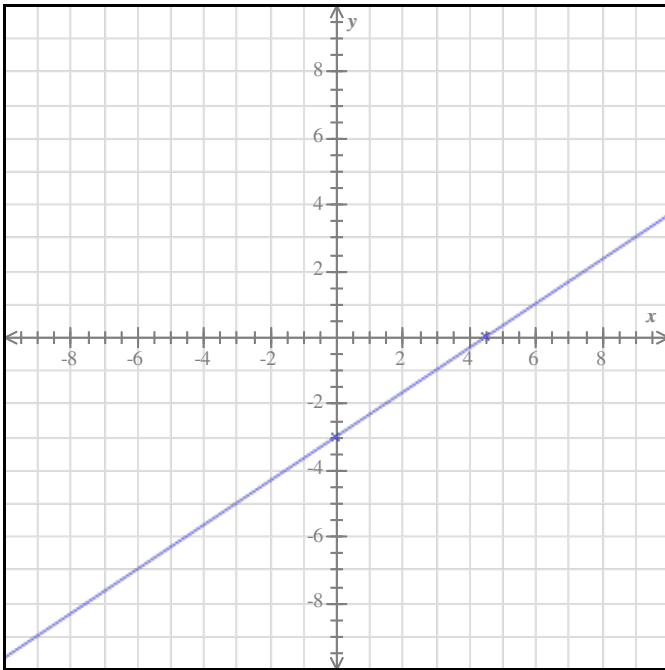


5. x -intercept: 4
 y -intercept: 3

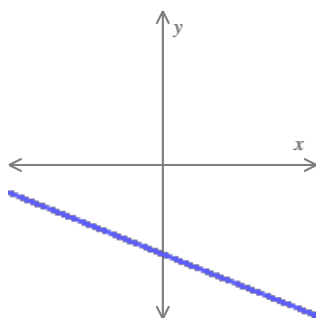
6. x -intercept: -2
 y -intercept: $-\frac{12}{5}$

7. x -intercept: $\frac{9}{2}$

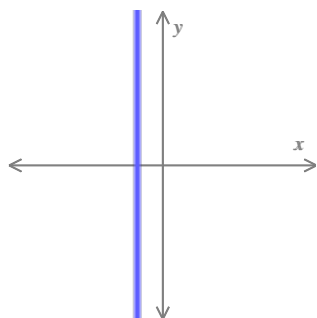
y -intercept: -3



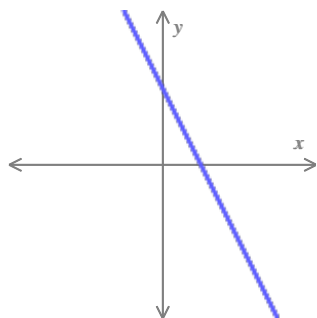
8.



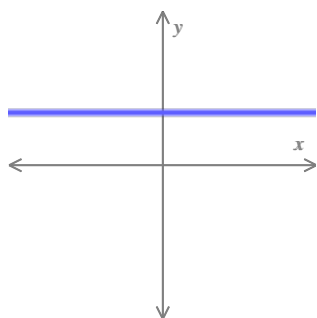
- ☐ Positive
- ☒ Negative
- ☐ Zero
- ☐ Undefined



- ☐ Positive
- ☐ Negative
- ☐ Zero
- ☒ Undefined



- ☐ Positive
- ☒ Negative
- ☐ Zero
- ☐ Undefined



- ☐ Positive
- ☐ Negative
- ☒ Zero
- ☐ Undefined

9.

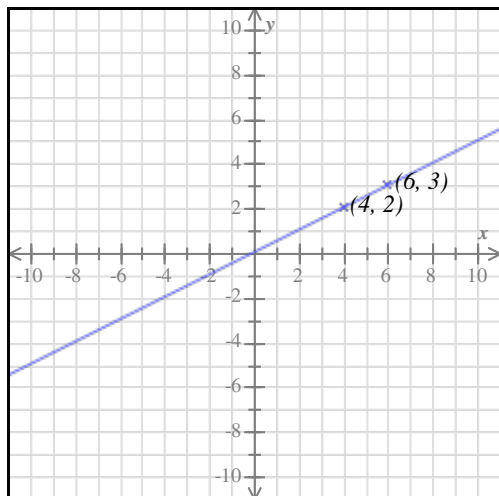
Find the slope of the line passing through the points $(-8, 5)$ and $(8, 5)$.

slope: 0

Find the slope of the line passing through the points $(9, -2)$ and $(-2, -2)$.

slope: 0

10.



11. y-intercept: $-\frac{1}{2}$

slope: $-\frac{1}{5}$

12. y-intercept: $-\frac{4}{5}$

slope: $\frac{2}{5}$

13. $y = 5x + 9$

14. $y = -\frac{1}{2}x + 7$

15.

Line 1 and Line 2: ☐ Parallel ☐ Perpendicular ☒ Neither

Line 1 and Line 3: ☐ Parallel ☒ Perpendicular ☐ Neither

Line 2 and Line 3: ☐ Parallel ☐ Perpendicular ☒ Neither

16.

Slope of a perpendicular line: -3

Slope of a parallel line: $\frac{1}{3}$

17.

Slope of a parallel line: -2

Slope of a perpendicular line: $\frac{1}{2}$

18. $y - 2 = 3(x + 4)$

19. $y = \frac{1}{2}x - 3$

20. $y = \frac{1}{5}x + \frac{9}{5}$