

**W.S. – Writing Equations of Lines Given Various Information**

Write an equation in slope-intercept form of each line described.

1. slope = -3 y-intercept = 4

2. slope = 3 passes through (4,1)

3. slope = -1 passes through (8,5)

4. slope =  $\frac{1}{3}$  passes through (0,0)

5. slope =  $-\frac{2}{5}$  passes through (5,7)

6. slope = 0 passes through (2,5)

Write the equations of the following lines given 2 points that the line passes through.

7. (8, 1) (1,8)

8. (0, -1) (1, 4)

9.  $(-3, 4)$   $(3, -4)$

10.  $(-3, -1)$   $(1, -4)$

11.  $(2, 5)$   $(-4, 5)$

12.  $(1, 3)$   $(1, -5)$

13. Write the equation of the line that passes through  $(-1, 3)$  and is parallel to  $3x - 4y = 4$ .

14. Write the equation of the line that is perpendicular to  $3x - 5y = 7$  and passes through  $(5, 2)$ .

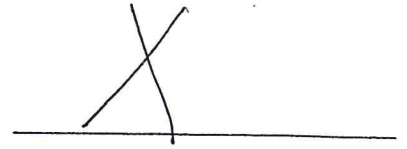
5. Write the equation of the line that passes through  $(-4, 5)$  and has the same y-intercept as  $x + 3y = -9$ .

16. Write the equation of the line that is parallel to  $x - 2y = -7$  and contains the point  $(-4, 0)$ .

17. Write the equation of the line that is parallel to  $y = -5$  and passes through the point  $(7, -3)$ .

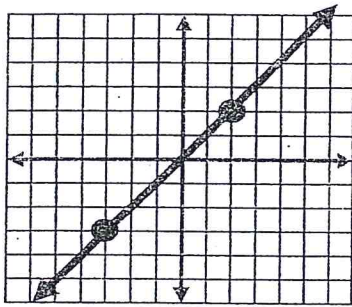
18. Write the equation of the line that is perpendicular to  $y = \frac{2}{3}x - 9$  and has the same y-intercept as  $x - y = 6$ .

~~12.~~ Write the equation of a line with an x-intercept of 6 and a y-intercept of 2.

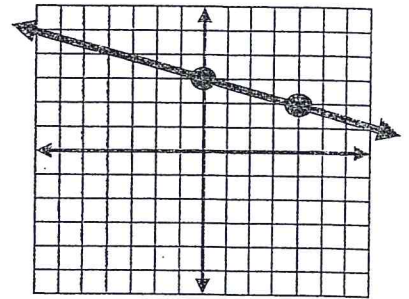


For #13 – 18 use the graph to write the equation of the line in slope-intercept form.

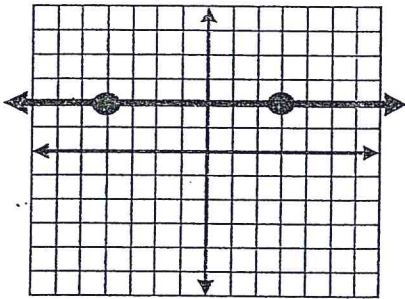
19 13.



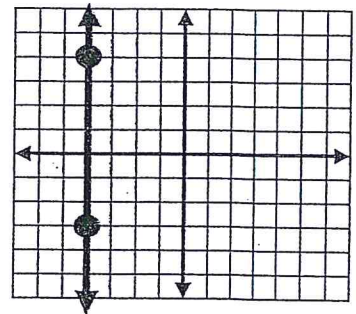
20 14.



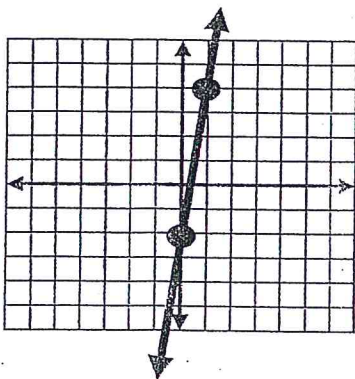
21 15.



22 16.



23 17.



24 18.

