

Name _____ Block _____

State whether the two equations are parallel, perpendicular or neither.

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

2) $y = 4x$
 $y = -\frac{x}{4} - 3$

3) $y = \frac{3}{4}x + 2$
 $y = -\frac{3}{4}x + 2$

4) $y = 6x - 1$
 $y = 6x + 3$

5) $x + 7y = 10$
 $x + 7y = 5$

6) $x - 6y = 4$
 $6x + y = 6$

7) $x - 3y = 11$
 $x + 3y = 11$

8) $x + 5y = 1$
 $y - 5x = -1$

Write the equation of the line passing through the given point that is **parallel** to the given equation.

9) $y = 3x - 2$, $(2, -3)$

10) $y = \frac{1}{2}x + 7$, $(4, -1)$

Write the equation of the line passing through the given point that is **perpendicular** to the given equation.

11) $y = -\frac{1}{3}x$, $(-1, -4)$

12) $y = \frac{2}{3}x + 5$, $(4, 3)$