

## Parallel and Perp. Lines

Write the slope-intercept form of the equation of the line described. Graph the line and it given line parallel or perpendicular on the same graph.

1) through:  $(3, 1)$ , parallel to  $y = \frac{4}{3}x + 2$

2) through:  $(4, -4)$ , parallel to  $y = -\frac{3}{7}x$

3) through:  $(-3, -3)$ , parallel to  $y = -4x + 2$

4) through:  $(-3, 2)$ , parallel to  $y = -\frac{5}{3}x + 1$

5) through:  $(1, 3)$ , perp. to  $y = -\frac{1}{5}x + 3$

6) through:  $(-1, 4)$ , perp. to  $y = \frac{1}{5}x - 4$

7) through:  $(1, -1)$ , perp. to  $y = -\frac{1}{4}x - 3$

8) through:  $(1, -3)$ , perp. to  $y = \frac{1}{7}x + 3$

Write the slope-intercept form of the equation of the line through the given points. Graph the line.

9) through:  $(3, 0)$  and  $(5, 5)$

10) through:  $(-4, 5)$  and  $(0, 5)$