Algebra 1 © 2014 Kuta Software LLC. All rights reserved. Extra Practice - Parallel and Perpendicular Lines

Write the slope-intercept form of the equation of the line described.

- 1) through: (1, 0), parallel to y = -3x + 5
- 2) through: (-5, 2), parallel to $y = -\frac{7}{5}x 1$

Write the standard form of the equation of the line described.

- 3) through: (1, 3), perp. to $y = \frac{1}{2}x + 1$
- 4) through: (-5, 4), perp. to $y = \frac{5}{7}x 5$

Write the slope-intercept form of the equation of the line described.

- 5) through: (1, -5), parallel to y = -10x 3 6) through: (-1, -4), parallel to y = 5x + 3

Write the standard form of the equation of the line described.

7) through: (-5, 3), perp. to $y = \frac{5}{8}x$

8) through: (1, 4), perp. to $y = -\frac{1}{2}x + 1$

Write the slope-intercept form of the equation of the line described.

9) through:
$$(4, -1)$$
, parallel to $y = x$

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

Write the standard form of the equation of the line described.

11) through:
$$(-4, 1)$$
, perp. to $y = -2x - 5$

12) through:
$$(3, 5)$$
, perp. to $y = -3x - 4$

Write the slope-intercept form of the equation of the line described.

13) through:
$$(3, -3)$$
, parallel to $y = -\frac{8}{3}x + 3$

13) through:
$$(3, -3)$$
, parallel to $y = -\frac{8}{3}x + 3$ 14) through: $(-5, 4)$, parallel to $y = -\frac{9}{5}x + 1$

Write the standard form of the equation of the line described.

15) through:
$$(-1, 4)$$
, perp. to $y = \frac{1}{9}x - 3$

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

Answers to Extra Practice - Parallel and Perpendicular Lines (ID: 1)

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

2)
$$y = -\frac{7}{5}x - 5$$

3)
$$2x + y = 5$$

4)
$$7x + 5y = -15$$

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

6)
$$y = 5x + 1$$

7)
$$8x + 5y = -25$$

8)
$$2x - y = -2$$

9)
$$y = x - 5$$

10)
$$y = -\frac{1}{2}x + 3$$

11)
$$x - 2y = -6$$

12)
$$x - 3y = -12$$

13)
$$y = -\frac{8}{3}x + 5$$

14)
$$y = -\frac{9}{5}x - 5$$

15)
$$9x + y = -5$$

16)
$$4x - 5y = -15$$