Math C

Unit 2 Quiz (practice test)

1. Determine the slope of a line that contains two ordered pairs.
$(-9, -10)$ $(12, 4)$

a) $y = -2x + 28$ b) $y = -2x - 8$

c) $y = \frac{1}{2}x - 2$ d) $y = \frac{2}{3}x - 4$

2. Rewrite the linear equation below into slope-intercept form.
$2x - 4y = 20$

a) $y = -\frac{1}{2}x - 5$ b) $y = -\frac{1}{2}x + 5$

c) $y = \frac{1}{2}x - 5$ d) $y = \frac{1}{2}x + 5$

3. Write the equation of the line that has the given slope and contains the given point.
$m = -6$ $(3, -3)$

a) $y = -6x - 15$ b) $y = -6x - 3$

c) $y = -6x + 15$ d) $y = -6x + 3$

4. Write the equation of the line that contains the two given points.
$(-8, -13)$ $(6, -6)$

a) $y = \frac{1}{2}x + 9$ b) $y = \frac{1}{2}x - 9$

c) $y = 2x + 3$ d) $y = 2x - 18$

5. Simplify the following expression.
$\sqrt{40}$

a) $2\sqrt{10}$ b) $10\sqrt{2}$ c) $5\sqrt{8}$ d) $8\sqrt{5}$

6. Simplify the following expression.
$\sqrt{80}$

a) $4\sqrt{5}$ b) $5\sqrt{4}$ c) $2\sqrt{5}$ d) $5\sqrt{2}$

7. Determine the graphical transformation of a function, $g(x)$, from its mother function, $f(x)$.
$g(x) = 2 \cdot f(x)$

a) vertical shift b) horizontal shift

c) horizontal stretch d) vertical stretch

8. Rewrite the given inequality in slope-intercept form.
$3x - y \leq 12$

a) $y \geq -3x + 12$ b) $y \geq 3x - 12$

c) $y \leq -3x - 12$ d) $y \leq 3x - 12$

9. Rewrite the given inequality in slope-intercept form.
$12x + 4y > 32$

a) $y < -3x + 8$ b) $y < 3x - 8$

c) $y > 3x - 8$ d) $y > -3x + 8$

10. Determine the range of the given function in the given domain.
$f(x) = 4x - 11$ Domain:$[-3, 8]$

a) $[-23, 21]$ b) $[-12, 32]$

c) $[-14, -3]$ d) $[33, 43]$