NAME:_____

1. Write the standard form of the equation of the line passing through the point (1, 5) and perpendicular to the line $4x - 7y = -28$.

   [A] $7x + 4y = 27$ [B] $-7x - 4y = 27$

   [C] $4x + 7y = 39$ [D] $4x - 7y = -39$

2. Write the standard form of the equation of the line passing through the point (–2, 2) and perpendicular to the line $5x - y = -4$.

   [A] $5x - y = 8$ [B] $x + 5y = 8$

   [C] $5x + y = -8$ [D] $-x - 5y = 8$

3. Write the standard form of the equation of the line passing through the point (1, –1) and perpendicular to the line $3x - 4y = 20$.

   [A] $-4x - 3y = 1$ [B] $3x + 4y = -1$

   [C] $3x - 4y = 1$ [D] $4x + 3y = 1$

4. Write the standard form of the equation of the line passing through the point (–5, 3) and perpendicular to the line $-2x - 3y = -6$.

   [A] $-2x - 3y = -19$

   [B] $3x - 2y = -21$ [C] $-2x + 3y = 19$

   [D] $-3x + 2y = -21$

5. Write the standard form of the equation of the line passing through the point (2, –2) and perpendicular to the line $-4x - 7y = -28$.

   [A] $7x - 4y = 22$ [B] $-4x - 7y = 22$

   [C] $-7x + 4y = 22$

   [D] $-4x + 7y = -22$

6. Give the slope-intercept form of the equation of the line that is perpendicular to $8x + 5y = -7$ and contains $(5, 3)$.

7. Give the slope-intercept form of the equation of the line that is perpendicular to $3x + 8y = -8$ and contains $(9, 7)$.

8. Give the slope-intercept form of the equation of the line that is perpendicular to $5x + 6y = 2$ and contains $(-9, -3)$.

9. Give the slope-intercept form of the equation of the line that is perpendicular to $8x + 5y = 6$ and contains $(6, 0)$.

10. Give the equation of a line perpendicular to $y = -3x + 2$.

[1] A

[2] B

[3] D

[4] B

[5] A

[6] $y = \frac{5}{8}x - \frac{1}{8}$

[7] $y = \frac{8}{3}x - 17$

[8] $y = \frac{6}{5}x + \frac{39}{5}$

[9] $y = \frac{5}{8}x - \frac{15}{4}$

[10] Answers may vary. Sample: $y = \frac{x}{3} - 1$