Name: $\qquad$ Period: $\qquad$

## Math 9: Linear Relations Quiz \#2

Full credit will only be awarded for all work shown in a neat and organized manner.

1. For both equations below, identify the slope and the $y$-intercept, then graph both (include labels!)


A: $y=3 x-5$
Slope $=$ $\qquad$ $y$-intercept $=$ $\qquad$

B: $4 y+x-4=0$
Convert to $y=m x+b$ form:

Slope $=$ $\qquad$ $y$-intercept $=$ $\qquad$
2. The cost to order highlighters is $\$ 2$ for each highlighter and $\$ 5$ to ship them (regardless of how many you order).

a) Write an equation for the cost of ordering highlighters
(Make sure you indicate what your variables mean)
b) Graph the equation (Label each axis with a variable!)
c) Using the graph, find the cost for 3 highlighters (Label the point you used)
d) Using the graph, find how many highlighters would be in an order costing $\$ 15$ (Label the point you used)
3. For the equations below, identify the slope and the $y$-intercept, then graph it (include labels!)


A: $y=2$
$\qquad$ $\mathbf{y}$-intercept $=$ $\qquad$

B: $x=-3$

Slope $=$ $\qquad$

$$
\mathbf{y} \text {-intercept }=
$$

4. Determine the equation for each line and check that each equation is correct.

5. Write the equation of the line that is parallel to line $C$, and goes through the point $(0,3)$.
