**MATH 422 Math for Business Applications Fall 2023**

Weekly Quiz #2 9/14/23 **Name\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Directions:** Please answer the following questions to the best of your ability. Provide reasoning when asked. Each numbered question is worth 3 points. Quizzes will all be 15 points each. Equation of a line is , where , and , and or

1. (3 pts)

Find the equation (in terms of ) of the line through the points (4, 1) and (0, 5)

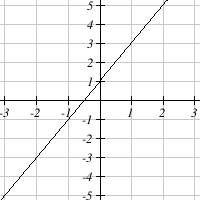
2. (3 pts)

Last year, Pinwheel Industries introduced a new toy. It cost $ to develop the toy and $ to manufacture each toy. Fill in the blanks below as appropriate.  
  
Give a linear equation in the form that gives the total cost, , to produce of these toys:

3. (3 pts)

Sketch a graph of

4. (3 pts)

Write an equation for the graph below in terms of   


(-1,-1)

(0,1)

(1,3)

5. (3 pts)

For the line identify the slope and the y-intercept:  
  
slope = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ y-intercept = \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_