

TWMM Unit Test Review 2

Name _____

1. Use the table below to answer questions a and b.

x	3	4	6	8
y	16	12	8	6

- a. Are x and y linearly or inversely related? How do you know?
- b. Write an equation to describe the relationship between x and y .

2. Use the table below to answer questions a and b.

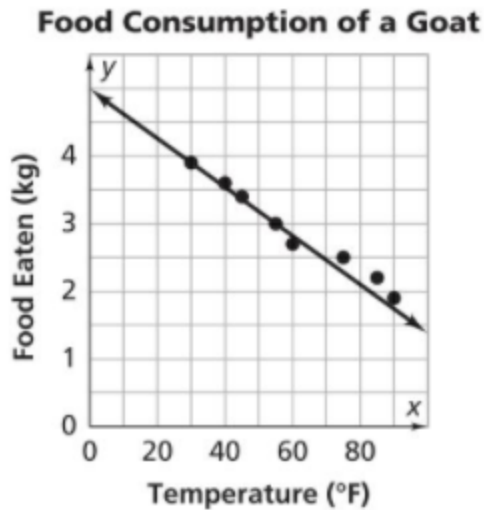
x	2	4	6	8
y	14	20	26	32

- a. Are x and y linearly or inversely related? How do you know?
- b. Write an equation to describe the relationship between x and y .

3. Write equations for the following situations:

- a. A line that passes through the point $(1, 5)$ with a slope of -2
- b. A line that passes through the points $(3, 7)$ and $(4, 5)$
- c. The time t it takes a car to travel 250 miles at a speed of r miles per hour.

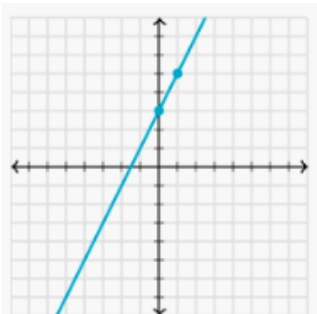
A farmer tracked how much food was eaten by his goat along with the temperature outside for the day. The data is represented below on the scatter plot.



4. Use the linear model to estimate answers for the next questions. **Explain** how each estimate can be found from the graph.

- a. How much food would the farmer expect the goat to eat on a 40 degree day?
- b. At what temperature would the goat eat 3 kg of food?
- c. Write an equation to represent the linear model for f food eaten for t temperature.

5a. Write an equation in slope-intercept for the graph below.



b. Based on your equation what is the value of y when $x = 10$?