Name _____ Date _____ Block _____

Comparing and Scaling More Review

1. Target is having a 20% off sale on games. Ellen wants to buy *Catchphrase* which originally costs $25.00.
   a. How much money does Ellen save?

   b. What is the new price of the game?

   c. What is the 10% sales tax on the new price of the game?

   d. What is the final cost of *Catchphrase*?

2. Luke drives 58 miles on 4 gallons of gas.
   a. What is Luke's <u>unit rate</u>? *(How many miles can Luke go on one gallon of gas?)*

   b. Write a rule using symbols to predict how far Luke drives for any amount of gas. Remember to tell what your symbols represent.

3. Lucy went to the store to buy pencils for math class. There were two types of packages: 10 pencils for $0.80 and 25 pencils for $1.75. Which is the better buy and why?

4. Ms. Thomas' brother Patrick used to live in China. Sometimes, he traveled from Hangzhou to Shanghai on the magnetic train. How far does Patrick travel in <u>20 minutes</u> at a rate of <u>420 kilometers per hour</u>? *(Be careful with the units!)*

5. Ms. Hawes is interested in buying a new globe at the map store. It costs $21.00 and she thinks this is a little expensive. Luckily, there is a 25% off sale at the store. If sales tax is 10%, what will be the final price?

6. Find the unit rate and write and equation relating the two variables: $10 for 8 mugs

   a. Unit rate:

   b. Equation:

7. Traffic moves through a construction zone at a speed of 6 miles per hour.
   a. At this speed, how long would it take to drive 15 miles?

   b. At this speed, how far would a car go in 45 minutes?

8. Mrs. Obrecht's car went 530 miles on 18 gallons of gas. Ms. Woods' car went 615 miles on 22 gallons of gas. Which car gets better gas mileage? Show work!