## Lesson 2.4 ~ Rate Problem Solving

Name_____ Period_____ Date_____

**Complete each equivalent rate.**

**1.** $\frac{20 \text{ miles}}{1 \text{ gallon}} = \frac{180 \text{ miles}}{\text{gallons}}$

**2.** $\frac{3 \text{ miles}}{1 \text{ hour}} = \frac{\text{miles}}{7 \text{ hours}}$

**3.** $\frac{5 \text{ kilometers}}{1 \text{ hour}} = \frac{\text{kilometers}}{3 \text{ hours}}$

**4.** $\frac{60 \text{ words}}{3 \text{ minutes}} = \frac{\text{words}}{9 \text{ minutes}}$

**5.** $\frac{\$3.50}{1 \text{ gallon}} = \frac{\$}{10 \text{ gallons}}$

**6.** $\frac{10 \text{ jobs}}{4 \text{ days}} = \frac{40 \text{ jobs}}{\text{days}}$

**7.** Which rate is *NOT* equivalent to $\frac{500 \text{ miles}}{10 \text{ hours}}$? Explain your choice.

**A.** $\frac{50 \text{ miles}}{1 \text{ hour}}$ **B.** $\frac{200 \text{ miles}}{40 \text{ hour}}$ **C.** $\frac{5 \text{ miles}}{1 \text{ hour}}$ **D.** $\frac{250 \text{ miles}}{5 \text{ hours}}$

**Use equivalent fractions or unit rates to solve each problem.**

**8.** Keisha drove 100 miles in 2 hours. At this rate, how far will she drive in 6 hours?

**9.** Jimmy paid $75 for 3 people to attend a play downtown. If it costs the same per ticket, how much will Alan pay for 9 people to attend the play next week?

**10.** Jermaine's new car went 360 miles and used 12 gallons of gas. At this rate, how many miles can he travel using 4 gallons of gas?

**11.** Martin paid $6.00 for 12 oranges. At this price, how much would he have paid for 16 oranges?

## Lesson 2.4C ~ Rate Problem Solving

Name_____ Period_____ Date_____

**Complete each equivalent rate.**

**1.** $\frac{20 \text{ miles}}{1 \text{ gallon}} = \frac{170 \text{ miles}}{\text{gallons}}$

**2.** $\frac{\$4.65}{15 \text{ mints}} = \frac{\$}{42 \text{ mints}}$

**3.** Write three rates equivalent to $\frac{600 \text{ miles}}{10 \text{ hours}}$.

**Use equivalent fractions or unit rates to solve each problem.**

**4.** Monica rode her bike 17 miles in 2 hours. How long will it take her to bike 51 miles at the same rate?

**5.** Julie paid $49.00 for four tickets to a musical production. Her friend is buying three tickets for the same musical production. How much money will her friend pay for the three tickets?

**6.** Kim's new car travels 378 miles using 9 gallons of gas. At this rate, how many miles can the car travel using 5 gallons of gas?

**7.** Phillip drove at a speed of 45 miles per hour. At this rate,

**a.** how far will he drive in 20 minutes?

**b.** how long will it take him to drive 60 miles?

**8.** Sometimes rates are approximations. The table below shows the number of words Shelby typed and the number of minutes it took Shelby to type the words. She told her boss she can type 100 words per minute. Is this an accurate statement? Explain why or why not using the information in the table.

| Number of Words | 50 | 135 | 144 | 190 |
|---|---|---|---|---|
| Minutes of Typing | 0.5 | 1.5 | 1.2 | 2 |