2.6-2.7 Practice

1. Geologists in Antarctica find an average of 7 meteorite fragments every 500 tons of gravel they sift through. How much gravel must they sift through in order to get 100 fragments?

7 frag.
$$2 \times 100 \text{ frag.}$$
500 tons $2 \times 100 \text{ tons}$
 $3 \times 100 \text{ frag.}$
 3×100

- A girl scout troop uses 14 flashlight batteries on a three-night camping trip. If they are planning a

14 batt.

3 nights

7 nights

3.
$$\times$$
 = 14. 7
 $\frac{3 \times}{3}$ = $\frac{98}{3}$
 \times = 32. 6

14 batt.

7 nights

7 nights

3 batteries

- 3. A cookie recipe calls for 3 eggs and makes 4 dozen cookies.
 - a) How many dozen cookies could you make with a dozen eggs?

$$3 \text{ eggs} = 712 \text{ eggs}$$

$$4 \text{ dozen} \times \text{ dozen}$$

$$3 \cdot x = 4 \cdot 12$$

$$3x = 48$$

b) How many eggs would you need to make 200 Cookies

$$\frac{3 \text{ eggs}}{48 \text{ cookies}}$$
 $\frac{1}{48} \times \frac{200}{48} = \frac{3.200}{48}$ $\frac{48 \times 2 = 3.200}{48} \times \frac{1}{48} = \frac{600}{48}$ $\frac{1}{48} \times \frac{1}{48} = \frac{600}{48}$

- 4. A map of Connecticut is drawn to a scale where 2 inches on the map represents 35 miles.
 - a) If Greenwich and Stonington are 105 miles from each other, how far apart do they appear on the map?

2 inches
$$\frac{2}{35}$$
 inches $\frac{2}{35}$ inches $\frac{2}{35}$

b) On this same map, the road from Mystic to Hartford is 1.5 inches long. How far apart are Mystic and Hartford?

2 Inches
$$2 \cdot x = 35 \cdot 1.5$$
35 miles $2 \cdot x = 52.5$
 $2 \cdot x = 52.5$
 $2 \cdot x = 52.5$
 $2 \cdot x = 2$
 $2 \cdot x = 2$

- 5. A bag of 8 apples costs \$1.50 at Sam's Orchard.
 - a) At this same rate, how much would 18 apples cost?

Bapples =
$$\frac{18 \text{ apples}}{$1.50} = \frac{18 \text{ apples}}{\times}$$

 $8 \cdot \times = 1.50 \cdot 18$
 $8 \cdot \times = 27$
 $8 \cdot \times = 27$
 $8 \cdot \times = 27$

b) How many apples could you buy for \$5.00?

B apples
$$=$$
 \times apples $\times = 26.6$

\$1.50

1.50 \times = 5.00 \cdot 8

1.50 \times 1.50

2.50 \times 2

2.50 \cdot 8

2.50 \times 8

2.50 \cdot 8

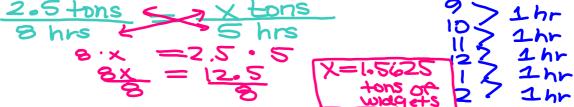
8. \times = 1.50

8 \times = 1.50

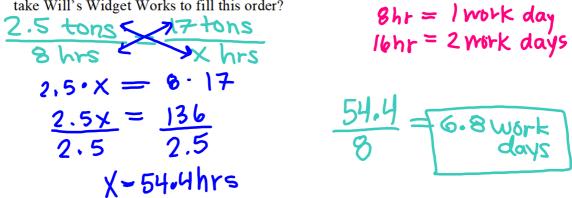
8 \times = 0.1875

8 0.19 apple

- 6. Will's Widget Works can produce two and a half tons of widgets in an 8 hour work day.
 - a) How many widgets can Will's Widget Works produce between 9 am and 2 pm?



b) McGee Manufacturing, Inc. needs to order 17 tons of widgets. How many work days will it take Will's Widget Works to fill this order?



- 7. The ratio of boys to total students in Mrs. Smith's classes is 5:12.
 - a) What is the ratio of girls to boys?
 - b) If there are 60 students in all of her classes, how many are boys?

^{8.} a)
$$\frac{7}{b} = \frac{4}{5}$$

$$\frac{4-f}{5}=\frac{f+1}{3}$$