

Monday Tuesday

NAME

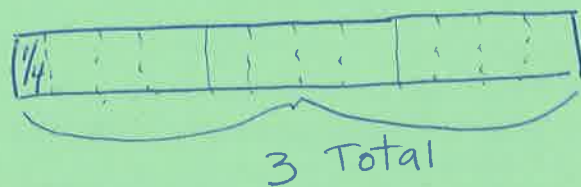
DATE

PERIOD

1/22

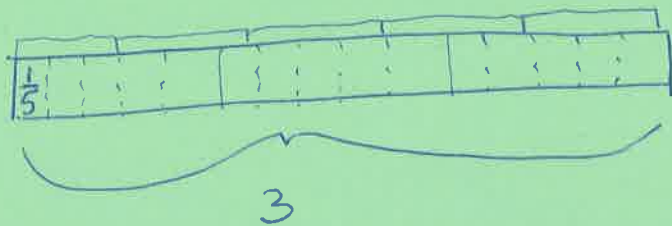
# Unit 4, Lesson 6: Using Diagrams to Find the Number of Groups

1. We can think of  $3 \div \frac{1}{4}$  as the answer to the question "How many groups of  $\frac{1}{4}$  are in 3?" Draw a tape diagram to represent the question. Then answer the question.



$3 \div \frac{1}{4} = 12$  groups  
total each

2. Describe how to draw a tape diagram to represent and answer  $3 \div \frac{3}{5} = ?$  for a friend who was absent.



- Draw tape 3 units  
- Divide into  $\frac{3}{5}$   
- count off by  $\frac{3}{5}$   
- get 5 groups of  $\frac{3}{5}$

3. How many groups of  $\frac{1}{2}$  days are in 1 week?

a. Write a multiplication equation or a division equation to represent the question.

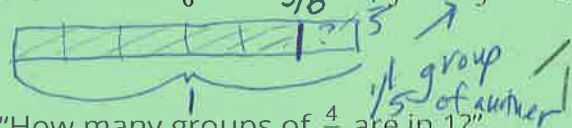
b. Draw a tape diagram to show the relationship between the quantities and to answer the question. Use graph paper, if needed.

$7 \text{ days} \div \frac{1}{2} = ?$

14 1/2 days in 7 days



4. Diego said that the answer to the question "How many groups of  $\frac{5}{6}$  are in 1?" is  $\frac{6}{5}$  or  $1\frac{1}{5}$ . Do you agree with his statement? Explain or show your reasoning.



5. Select **all** equations that can represent the question: "How many groups of  $\frac{4}{5}$  are in 1?"

more on next page

A.  $? \cdot 1 = \frac{4}{5}$     Y or **(N)**

B.  $1 \cdot \frac{4}{5} = ?$     Y or **(N)**

think  
 $1 \div \frac{4}{5} = ?$   
or  
 $\frac{4}{5} \cdot ? = 1$

Monday Tuesday

NAME

DATE

PERIOD

1/22  
continues

C.  $\frac{4}{5} \div 1 = ?$  Y or **N**

D.  $? \cdot \frac{4}{5} = 1$  **Y** or N

E.  $1 \div \frac{4}{5} = ?$  **Y** or N

1

(from Unit 4, Lesson 5)

6. Calculate each percentage mentally.

a. What is 10% of 70? = 7

b. What is  $\frac{1}{10}$  of 110? = 11

c. What is  $\frac{1}{4}$  of 160? = 40

d. What is  $\frac{1}{4}$  of 48? = 12

(from Unit 3, Lesson 14)

e. What is 50% of 90? = 45

f. What is  $\frac{1}{2}$  of 350? = 175

g. What is  $\frac{3}{4}$  of 300?  $75 \cdot 3 = 225$   
or  $10\% = 30 \times 7 = 210$   
 $5\% = 15 \times 1 = 15$

h. What is  $\frac{3}{4}$  of 48?  $\frac{1}{4} = 12$   
 $12 \cdot 3 = 36$  **18** **225**

14