

## PROBLEM SOLVING

### Lesson 6.9

Name \_\_\_\_\_

### Problem Solving • Practice Addition and Subtraction

COMMON CORE STANDARD CC.5.NF.2

Use equivalent fractions as a strategy to add and subtract fractions.

Read each problem and solve.

1. From a board 8 feet in length, Emmet cut two  $2\frac{1}{3}$ -foot bookshelves. How much of the board remained?

Write an equation:  $8 = 2\frac{1}{3} + 2\frac{1}{3} + x$

Rewrite the equation to work backward:

$$8 - 2\frac{1}{3} - 2\frac{1}{3} = x$$

Subtract twice to find the length remaining:  $3\frac{1}{3}$  feet

2. Lynne bought a bag of grapefruit,  $1\frac{5}{8}$  pounds of apples, and  $2\frac{3}{16}$  pounds of bananas. The total weight of her purchases was  $7\frac{1}{2}$  pounds. How much did the bag of grapefruit weigh? \_\_\_\_\_

3. Mattie's house consists of two stories and an attic. The first floor is  $8\frac{5}{6}$  feet tall, the second floor is  $8\frac{1}{2}$  feet tall, and the entire house is  $24\frac{1}{3}$  feet tall. How tall is the attic? \_\_\_\_\_

4. It is  $10\frac{3}{5}$  miles from Alston to Barton and  $12\frac{1}{2}$  miles from Barton to Chester. The distance from Alston to Durbin, via Barton and Chester, is 35 miles. How far is it from Chester to Durbin? \_\_\_\_\_

5. Marcie bought a 50-foot roll of packing tape. She used two  $8\frac{5}{6}$ -foot lengths. How much tape is left on the roll? \_\_\_\_\_

6. Meg started her trip with  $11\frac{1}{2}$  gallons of gas in her car's gas tank. She bought an additional  $6\frac{4}{5}$  gallons on her trip and arrived back home with  $3\frac{3}{10}$  gallons left. How much gas did she use on the trip? \_\_\_\_\_

### Lesson Check (CC.5.NF.2)

- Paula spent  $\frac{3}{8}$  of her allowance on clothes and  $\frac{1}{6}$  on entertainment. What fraction of her allowance did she spend on other items?
  - $\frac{3}{8}$
  - $\frac{11}{24}$
  - $\frac{13}{24}$
  - $\frac{5}{8}$
- Della bought a tree seedling that was  $2\frac{1}{4}$  feet tall. During the first year, it grew  $1\frac{1}{6}$  feet. After two years, it was 5 feet tall. How much did the seedling grow during the second year?
  - $1\frac{1}{4}$  feet
  - $1\frac{1}{3}$  feet
  - $1\frac{5}{12}$  feet
  - $1\frac{7}{12}$  feet

### Spiral Review (CC.5.OA.1, CC.5.NBT.2, CC.5.NBT.6, CC.5.NBT.7)

- Which is another way to write 100,000? (Lesson 1.4)
  - $10^6$
  - $10^5$
  - $10 \times 10^5$
  - $10 \times 10^6$
- Which expression is the best choice for estimating  $868 \div 28$ ? (Lesson 2.5)
  - $868 \div 28$
  - $900 \div 30$
  - $1,000 \div 20$
  - $1,000 \div 30$
- Justin gave the clerk \$20 to pay a bill of \$6.57. How much change should Justin get? (Lesson 3.11)
  - \$12.43
  - \$12.53
  - \$13.43
  - \$14.43
- What is the value of the following expression?  
 $7 + 18 \div (6 - 3)$  (Lesson 1.12)
  - 9
  - 13
  - 21
  - 27