



Name \_\_\_\_\_ Date \_\_\_\_\_

# Writing Decimals as Fractions

(pages 214–216)

A **terminating decimal** is a decimal whose digits end. For example, 21.4 is a terminating decimal, because the digits end. Every terminating decimal can be written as a fraction with a denominator of 10, 100, 1,000, and so on.

## EXAMPLES

**A** Express 0.5 as a fraction in simplest form.

0.5      *The decimal 0.5 is read as, “five tenths.”*

$0.5 = \frac{5}{10}$       *Write the decimal as the fraction “five tenths.”*

$= \frac{1}{2}$       *Simplify. Divide the numerator and the denominator each by the GCF, 5.*

**B** Express 2.25 as a mixed number in simplest form.

2.25      *The decimal is read as “two and twenty-five hundredths.”*

$2.25 = 2\frac{25}{100}$       *Write the decimal as the mixed number “two and twenty-five hundredths.”*

$= 2\frac{1}{4}$       *Simplify. Divide the numerator and the denominator each by the GCF, 25.*

## Try These Together

**Express each decimal as a fraction or mixed number in simplest form.**

1. 0.62

*HINT: Say the decimal aloud, and then write it as a fraction. Simplify the fraction.*

2. 12.84

*HINT: Say the decimal aloud and then write it as a mixed number. Simplify the mixed number.*

## PRACTICE

**Express each decimal as a fraction or mixed number in simplest form.**

3. 3.3

4. 2.15

5. 4.007

6. 1.78

7. 7.66

8. 4.1

9. 7.91

10. 8.02

11. 3.8

12. 0.08

13. 9.76

14. 4.03

15. 5.25

16. 0.034

17. 9.28

18. 3.48

**19. Fashion** A bottle of hairspray holds 8.45 fluid ounces. Express this as a mixed number in simplest form.



**20. Standardized Test Practice** Write two and forty-four hundredths as a mixed number in simplest form.

**A**  $2\frac{11}{25}$

**B**  $2\frac{44}{100}$

**C**  $2\frac{11}{250}$

**D**  $2\frac{22}{50}$

Answers: 1. $\frac{50}{31}$	2. $12\frac{25}{21}$	3. $3\frac{3}{3}$	4. $2\frac{20}{3}$	5. $4\frac{1,000}{7}$	6. $1\frac{39}{50}$	7. $7\frac{38}{50}$	8. $4\frac{10}{1}$	9. $7\frac{100}{91}$	10. $8\frac{50}{1}$	11. $3\frac{5}{4}$	12. $\frac{2}{25}$	13. $9\frac{19}{25}$	14. $4\frac{100}{3}$	15. $5\frac{7}{1}$	16. $\frac{500}{17}$	17. $9\frac{25}{7}$	18. $3\frac{25}{12}$	19. $8\frac{20}{9}$	20. A
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