

Name: School: Grade: Class:

3-6 Multiplying Decimals by Whole Numbers - Practice and Problem Solving

Multiply.

11. 1.2×7

$$8.4$$

13. 0.7×9

$$6.3$$

15. 2×1.3

$$2.6$$

17. 0.8×9

$$7.2$$

19. 3×0.02

$$0.06$$

21. 0.0036×19

$$0.0684$$

23. ALGEBRA Evaluate $3.05n$ if $n = 27$.

$$3.05n = 3.05 \times 27$$

$$3.05$$

$$\times 27$$

$$\hline 82.35$$

$$n = 82.35$$

Multiply.

25. 5.2×10

$$52$$

Name: School: Grade: Class:

27. $1.5 \times 1,000$

1,500

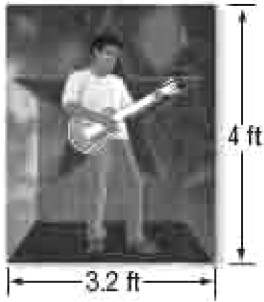
29. 2.5×10

25.0

31. $3.45 \times 1,000$

3,450

33. **MEASUREMENT** Asher recently bought the poster shown at the right. What is its area?



Multiply.

$$\begin{array}{r} 3.2 \\ \times 4 \\ \hline 12.8 \\ 12.8 \text{ ft}^2 \end{array}$$

35. **MEASUREMENT** The height of Mount Everest, in meters, can be found by multiplying 8.85 by 1,000. Find the height of Mount Everest.

Use mental math.

$$8.85 \times 1,000 = 8,850 \text{ m}$$

Use the order of operations to find the value of each expression.

37. $2 \times 3.8 + 1.5$

$$2 \times 3.8 + 1.5 = (2 \times 3.8) + 1.5 = 9.1$$

39. $3 \times 2.14 \times 10$

$$3 \times 2.14 \times 10 = (3 \times 2.14) \times 10 = 64.2$$

41. $11 \times 7.85 + 33$

$$11 \times 7.85 + 33 = (11 \times 7.85) + 33 = 119.35$$

Name: School: Grade: Class:

43. **MEASUREMENT** The thickness of each type of coin is shown in the table. How much thicker is a stack of a dollar's worth of nickels than a dollar's worth of quarters?

Coin	Thickness (mm)
penny	1.55
nickel	1.95
dime	1.35
quarter	1.75

$$20 \text{ nickels} = \$1.00; 20 \times 1.95 = 39$$

$$4 \text{ quarters} = \$1.00; 4 \times 1.75 = 7$$

$$39 - 7 = 32$$

The dollar worth of nickels are 32 mm thicker than the dollar worth of quarters.

45. **CHALLENGE** Discuss two different ways to find the value of the expression $5.4 \times 1.17 \times 100$ that do not require you to first multiply 5.4×1.17 .

Sample answer: First evaluate 1.17×100 to be 117. Then multiply 117 by 5.4 to get the answer of 631.8. Or first evaluate 5.4×100 to be 540. Then multiply 540 by 1.17 to get the answer of 631.8. Or first evaluate 5.4×10 to be 54 and 1.17×10 to be 11.7. Then multiply 54 by 11.7 to get the answer of 631.8.

47. A recipe for a batch of cookies calls for one 5.75-ounce package of coconut. How many ounces of coconut are needed for 5 batches of cookies?

A 20.50 oz

B 25.25 oz

C 28.75 oz

D 29.75 oz

$$5.75 \times 5 = 28.75$$

The answer is C; 28.75 oz.

For Exercises 49 and 50, refer to the table that shows the music sales in the United States in a recent year that were devoted to different types of music.

49. What were the total sales for rock and country?

Total Music Sales	
Type of Music	Sales (millions of \$)
rock	3,864.89
rap/hip-hop	1,631.84
R&B/urban	1,251.49
country	1,533.69
pop	993.83
other	2,785.18
Source: Recording Industry of America	

$$3,864.89 + 1,533.69 = 5,398.58 \text{ million}$$

Name: School: Grade: Class:

- 51. FUNDRAISING** During a fundraiser at her school, Careta sold \$78.35 worth of candy. Diego sold \$59.94 worth of candy. Use front-end estimation to find about how much more Careta sold.

$$\begin{array}{r} 78.35 \quad 70.00 \\ -59.94 \rightarrow -50.00 \\ \hline 20.00 \end{array}$$

$\$70 - \$50 = \$20$ Careta sold \$20 more than Diego.

Use $>$, $<$, or $=$ to compare each pair of decimals.

- 53.** $61.32 \bullet 61.23$

$>$

Find the value of each expression.

- 55.** 43×25

1,075

- 57.** 18×165

2,970