



## REVIEW KEY VOCABULARY

- point-slope form, p. 302
- converse, p. 319
- perpendicular, p. 320
- scatter plot, p. 325
- positive correlation, negative correlation, relatively no correlation, p. 325
- line of fit, p. 326
- best-fitting line, p. 335
- linear regression, p. 335
- interpolation, p. 335
- extrapolation, p. 336
- zero of a function, p. 337

### VOCABULARY EXERCISES

1. Copy and complete: If a best-fitting line falls from left to right, then the data have a(n)   ?   correlation.
2. Copy and complete: Using a linear function to approximate a value beyond a range of known values is called   ?  .
3. **WRITING** What is the zero of a function, and how does it relate to the function's graph? *Explain.*

## REVIEW EXAMPLES AND EXERCISES

Use the review examples and exercises below to check your understanding of the concepts you have learned in each lesson of Chapter 5.

### 5.1

### Write Linear Equations in Slope-Intercept Form

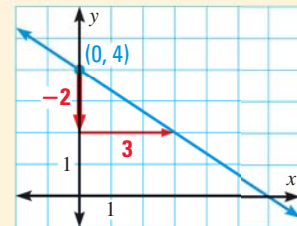
pp. 283–289

#### EXAMPLE

Write an equation of the line shown.

$$y = mx + b \quad \text{Write slope-intercept form.}$$

$$y = -\frac{2}{3}x + 4 \quad \text{Substitute } -\frac{2}{3} \text{ for } m \text{ and } 4 \text{ for } b.$$



#### EXERCISES

Write an equation in slope-intercept form of the line with the given slope and y-intercept.

4. slope: 3

y-intercept:  $-10$

5. slope:  $\frac{4}{9}$

y-intercept: 5

6. slope:  $-\frac{2}{11}$

y-intercept: 7

7. **GIFT CARD** You have a \$25 gift card for a bagel shop. A bagel costs \$1.25. Write an equation that gives the amount (in dollars) that remains on the card as a function of the total number of bagels you have purchased so far. How much money is on the card after you buy 2 bagels?

#### EXAMPLES 1 and 5

on pp. 283, 285  
for Exs. 4–7