Name _____ Date _____

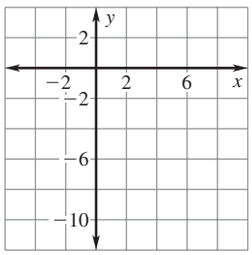
LESSON 4.4

LESSON 4.4 Practice B

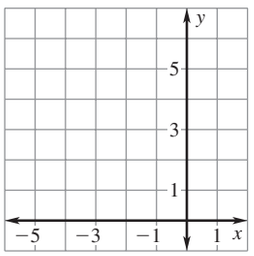
For use with pages 234–242

Plot the points and draw a line through them. Without calculating, tell whether the slope of the line is *positive*, *negative*, *zero*, or *undefined*.

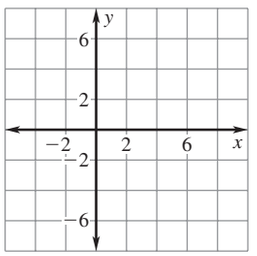
1. (1, −4) and (5, −8)



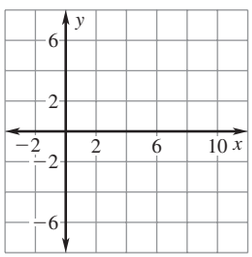
2. (−3, 6) and (−3, 0)



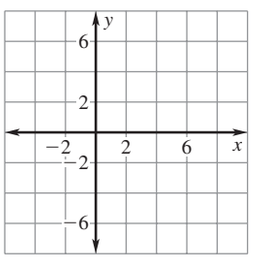
3. (−3, 3) and (7, −1)



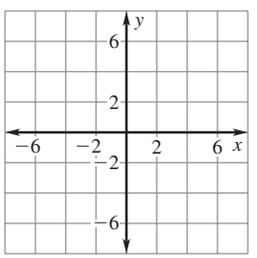
4. (0, −2) and (9, −5)



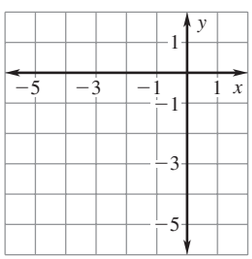
5. (7, 1) and (−2, 1)



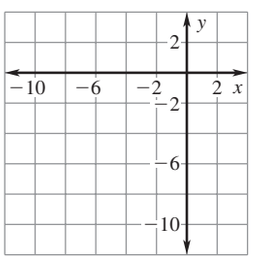
6. (−3, −1) and (6, −2)



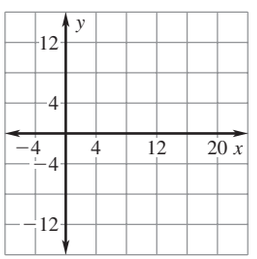
7. (−4, −5) and (−3, −2)



8. (−7, 1) and (−7, −8)

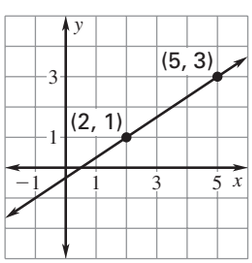


9. (2, −10) and (12, 10)

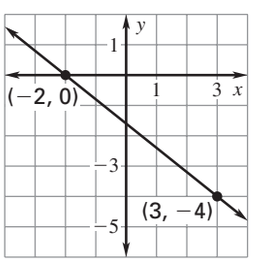


Find the slope of the line that passes through the points.

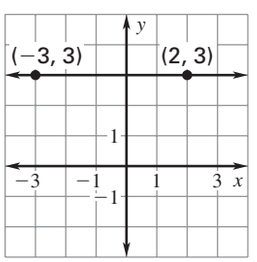
10.



11.



12.



Name _____ Date _____

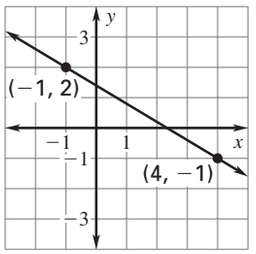
LESSON 4.4

LESSON 4.4

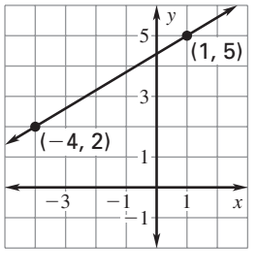
Practice B *continued*

For use with pages 234–242

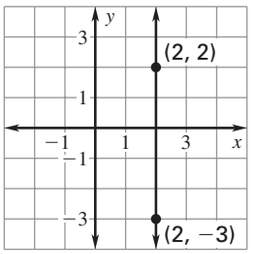
13.



14.



15.



Find the slope of the line that passes through the points.

16. (1, 2) and (7, 7)

17. (3, 4) and (−5, 0)

18. (5, −2) and (5, 8)

19. (3, 1) and (−5, 3)

20. (−7, 1) and (1, 5)

21. (2, −5) and (5, −2)

22. (3, 0) and (8, 0)

23. (−6, −6) and (−2, −2)

24. (−5, −4) and (1, −2)

Find the value of *x* or *y* so that the line passing through the two points has the given slope.

25. $(-3, y), (-9, -2); m = 1$

26. $(-1, 4), (x, 3); m = \frac{1}{5}$

27. $(8, 1), (1, y); m = -1$

28. $(x, -7), (1, 2); m = 3$

29. $(9, y), (3, 2); m = \frac{2}{3}$

30. $(7, 5), (x, 2); m = \frac{3}{4}$

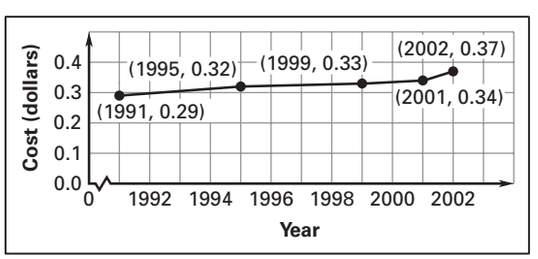
31. Trolley Bus The table shows the number of trolley buses in operation in the United States during certain years.

Year	1980	1985	1990	1995	2000
Number of buses	823	676	832	885	951

a. *Describe* the rates of change in the number of buses during the time period.

b. Determine the time intervals during which the number of trolley buses showed the greatest and least rates of change.

32. Postage Rate The graph shows the cost (in dollars) to mail a letter that weighs one ounce during certain years.



a. Determine the time interval during which the cost to mail a one-ounce letter showed the greatest rate of change.

b. Determine the time interval during which the cost to mail a one-ounce letter showed the least rate of change.

33. Heart Rate The graph shows the heart rate of a person during 30 minutes of exercise. Give a verbal description of the workout.