3.3 Exercises

Check It Out
Help with Homework
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Vocabulary and Concept Check

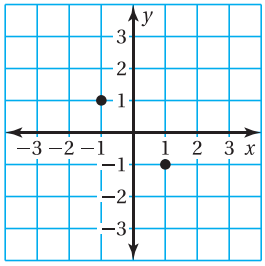
1. **WRITING** Describe how to write an equation of a line using two points on the line.

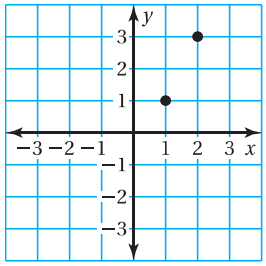
2. **WHICH ONE DOESN'T BELONG?** Which pair of points does *not* belong with the other three? Explain your reasoning.

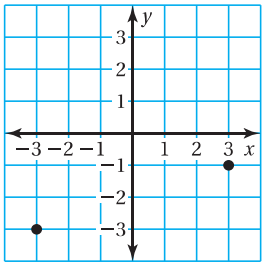
(0, 1), (2, 3) | (1, 2), (4, 5) | (2, 3), (5, 6) | (1, 2), (4, 6)

Practice and Problem Solving

Find the slope and *y*-intercept of the line that passes through the points. Then write an equation of the line.

3. 

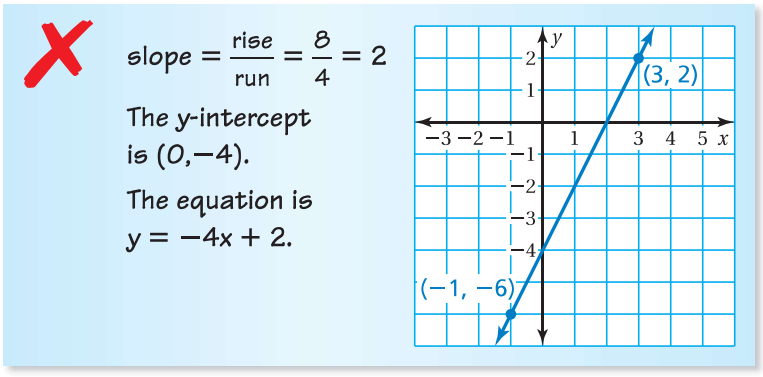
4. 

5. 

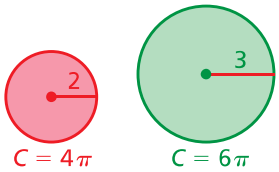
Write an equation of the line that passes through the points.

6. (−1, −1), (1, 5)
7. (2, 4), (3, 6)
8. (−2, 3), (2, 7)
9. (4, 1), (8, 2)
10. (−9, 5), (−3, 3)
11. (1, 2), (−2, −1)
12. (−5, 2), (5, −2)
13. (2, −7), (8, 2)
14. (1, −2), (3, −8)

15. **ERROR ANALYSIS** Describe and correct the error in finding the equation of the line that passes through (−1, −6) and (3, 2).



16. **JET SKI** It costs $175 to rent a jet ski for 2 hours. It costs $300 to rent a jet ski for 4 hours. Write an equation that represents the cost y (in dollars) of renting a jet ski for x hours.



17. **CIRCUMFERENCE** Consider the circles shown.
   a. Plot the points $(2, 4\pi)$ and $(3, 6\pi)$.
   b. Write an equation of the line that passes through the two points.