

Lesson 5.1.1

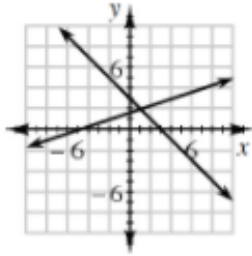
5-6. See below:

a. 108, 324

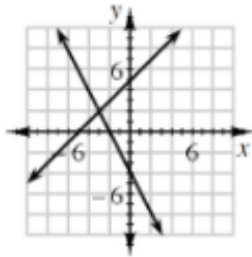
b. 12, 48

5-7. See graphs below:

a. (1, 2)



b. (-3, 2)



## Lesson 5.1.1

**5-8. See below:**

- a.  $-6$
- b.  $-2$
- c.  $-\frac{2}{3}$
- d. undefined
- e.  $x = 2.25$

**5-9.**  $\frac{27b^3}{a^6}$

**5-10. See below:**

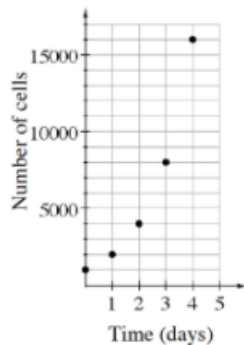
- a.  $x$
- b.  $y^7$
- c.  $\frac{1}{4}$
- d.  $64x^6$

**5-11. See below:**

- a. Sample answers:  $(3, 0)$  and  $(3, 1)$ ; All points on this line have 3 as an  $x$ -coordinate.  $x = 3$
- b.  $y = -1$
- c.  $x = 0$

**5-12. See below:**

- a. curved
- b. See table and graph below.



Time (days)	Number of cells
0	1000
1	2000
2	4000
3	8000
4	16,000

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**5-13. See below:**

a.  $5^2 = 25$

b.  $3^{51}$

c. 1

d.  $1.6 \times 10^{11}$

**5-14.** Jackie squared the binomials incorrectly. It should be:  $x^2 + 8x + 16 - 2x - 5 = x^2 - 2x + 1$ ,  $6x + 11 = -2x + 1$ ,  $8x = -10$ , and  $x = -1.25$ .

**5-15. See below:**

a.  $m = 5$

b.  $a = \frac{4\pi}{7} \approx 1.80$

**5-16. See below:**

a.  $y = -2x + 7$

b.  $y = -\frac{3}{2}x + 6$

**5-17. See below:**

a.  $\frac{1}{4}$

b.  $\frac{3}{4}$