Beginning Algebra, Third Edition

Errata

These corrections apply only to copies of the Third Edition purchased prior to August 18, 2016.

Page 12 Example 1.13.
Item (3) should read $B \cap C = \{5\}$.

Page 25 Example 2.4.
Solution item (2) should begin "Think of -8 as $-3-5$."

Page 38
The answer to Part 1 number 4 should be $2y+10$.

Page 43 Exercise 2.9
The answer to number 15 should be $-9-12b$.

Page 49 Exercise 2.11
The answer to number 7 should be $-5x+10y+10z-8$.

Page 60 Exercise 2.17
The answer to number 32 should be $6r-18$.

Page 66 Exercise 3.1
The answer to number 4 should be 4.

Page 76
In the proof of theorem 3.5, the line "$\frac{1}{bd}(ad+bc)$" should be inserted between the last and next to last lines.

Page 82 Exercise 3.4
The answer to number 13 should be $\frac{28a+4}{15}$.

Page 83 Exercise 3.4
The answer to number 12 should be $\frac{-7x-11}{12}$.

Page 84 Exercise 3.6
The answer to number 22 should be $\frac{43x-15}{6}$.
The answer to number 34 should be $\frac{31r+2}{12}$.

Page 85 Exercise 3.7

The answer to number 4 should be $\frac{13x+12}{9}$.

Page 107 Exercise 4.9

The answer to number 21 should be $\frac{-37}{3}$.

Page 129 Example 5.16.

"$50\frac{m}{h}$" should read "$50\frac{mi}{h}$".

Page 136 Exercise 5.6.

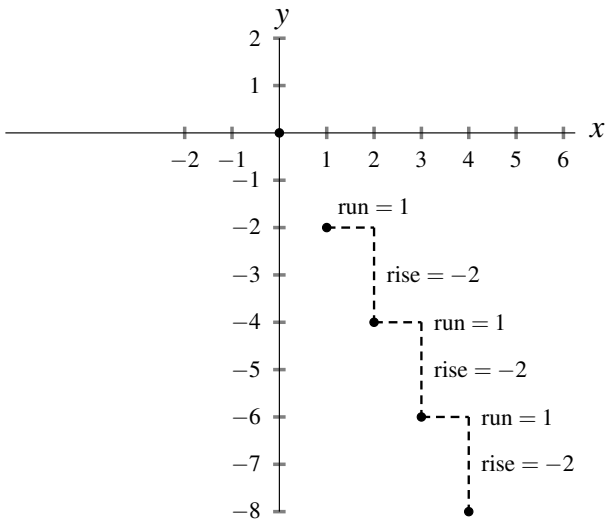
The answer to number 7 should be $6:55$ p.m. .

Page 139 Definition 6.2

Definition should mention that a, b, and x represent any numbers as long as $a \neq 0$.

Page 156.

The graph in Figure 6.9 is completely crazy. It should be replaced by the following graph.



Page 159 Exercise 6.6.

The answer to number 8 should be $\frac{4}{-3} = \frac{-4}{3}$.

Page 163 Example 6.23. Solution.

Should refer to Figure 6.17.

Page 163 Example 6.24. Solution.

Should refer to Figure 6.18.

Page 164 Example 6.25. Solution.
Should refer to Figure 6.19.

Page 164 Example 6.26. Solution.
Should refer to Figure 6.20.

Page 165 Example 6.27. Solution.
Should refer to Figure 6.21.

Page 174 Exercise 6.10.
Question 5 should begin "Tank A".

Page 180 Example 6.37.
The question should read "Determine the slope and y intercept of $3x+5y-7=9$."

Page 188 Exercise 6.15.
The answer to number 1 should be $y=-\frac{1}{2}x-1$

The answer to number 4 should be $y=\frac{1}{3}x$

The answer to number 6 should be $y=\frac{2}{5}x-4$

The answer to number 7 should be $4x-3y=-15$

The answer to number 8 should be $2x+3y=-6$

Page 204.
The entire page should be replaced by the following.

This result means that every pair of numbers that makes the first equation true will make the second equation true. And every pair that makes the second equation true will make the first equation true. The solution set consists of infinitely many ordered pairs. We say the equations are "equivalent". A glance at $2x+y=1$ and $4x+2y=2$ is enough to know that they are equivalent equations, because one is the multiple of the other.

You have just seen the words "inconsistent" and "dependent" used to describe pairs of equations. You might as well have one more word. A pair of equations that has exactly one solution is called a pair of "independent" equations. It is a fact that a pair of independent equations in two unknowns always has a unique solution. All but the last two examples of this chapter have been a pair of independent equations in two unknowns.