

Prealgebra Release Notes 2017

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Page Count Difference:

In the latest edition of *Prealgebra*, there are 1144 pages compared to the 1152 pages in the last edition. This page count variation is due to errata revisions and code releases to conserve space

Errata:

Issue	Resolution	Severity
Chapter 1.4: Whole Numbers Section: Multiply Whole Numbers Exercise Jane is tiling her floor, she needs 16 rows with 2 tiles per row. Answer: 320 tiles. Correction: $16 * 2 = 32$ tiles (same mistake both online and in PDF) In PDF it's page 73 (67 the actual page).	Revise Try It 1.107 as follows: Jane is tiling her living room floor. She will need 16 rows of tile, with 20 tiles in each row. How many tiles does she need for the living room floor?	Typo
Chapter 1.4: Whole Numbers, Section: Multiply Whole Numbers, Example 1.46 The very first example on how to multiply numbers with two digits starts the process in the tens place instead of the ones as it should. If you can make out what the uselessly tiny numbers to the right read, they contradict by showing the correct order of operations. The book then instructs you to multiply in the tens place again, which it just said to do.	Revise the Solution to Example 1.46 as follows: Multiply: $62(87)$. Solution ... Start by multiplying 7 by 62. Multiply 7 by the digit in the ones place of 67. $7 * 2 = 14$. Write the 4 in the ones place of the product and carry the 1 to the tens place. (Previous: Start by multiplying 7 by 62. Multiply 7 by the digit in the tens place of 62. $7 * 6 = 42$. Write the 4 in the ones place of the product and carry the 1 to the tens place.)	Minor
Chapter 1.4: Whole Numbers, Section: Multiply Whole Numbers, Try It #1.87 I am including a screenshot showing the Prealgebra book claiming that 64 multiplied by 8 equals 518, when the actual product is 512. This is a confusing error considering multiplication has just been introduced to the student.	Revise the answer to Try It #1.87 as follows: Try It 1.87 Multiply: $64 * 8$. Answer: 512	Major
Chapter 1.5: Whole Numbers Section: Divide Whole Numbers An exercise that begins "Divide $1,439 \div 4$. Check by	In Example 1.64 (Divide $1,439/4$), revise the "Check by Multiplying" to show a 3 carried to the tens	Minor

<p>multiplying." ends by showing the multiplication of 359 and 4. The multiplication shows a 2 carried to the tens place, but it should be a 3 carried to the tens place. See attached image.</p>	<p>place.</p>	
<p>Chapter 1.5: Whole Numbers Section: Divide Whole Numbers This is just a typographical error. The word "remainder" should be "remainder." The typo can be found in Section 1.5 (Divide Whole Numbers) in the Example Exercise that begins "Divide 1,439÷4. Check by multiplying."</p>	<p>Fixed</p>	<p>Typo</p>
<p>Chapter 1.5: Whole Numbers Section: Divide Whole Numbers There is an exercise that asks the student to "Model: 35÷7." When the student clicks the button to "Show Solution" the solution shows 42÷7 instead of 35÷7. You can either change the problem or the solution to achieve consistency between the two.</p>	<p>Fixed</p>	<p>Minor</p>
<p>Chapter 1.5: Whole Numbers, Section: Divide Whole Numbers, Key Concepts covers division. The last part of section 1.5 is called "Key Concepts" and it contains the concepts from the multiplication lesson (section 1.4) as well as the concepts from the division section (section 1.5). The multiplication concepts should be deleted so that only the division concepts are shown.</p>	<p>Remove the multiplication concepts from the Key Concepts for the Divide Whole Numbers section.</p>	<p>Typo</p>
<p>Chapter 2.2: The Language of Algebra, Section: Evaluate, Simplify, and Translate Expressions, Subsection: Evaluate Algebraic Expressions, Example 2.13 The images demonstrating the solution to Example 2.13 are incorrect. The problems shown are unrelated to the questions at hand.</p>	<p>Revise the solution to Example 2.13 "Evaluate $x + 7$ when (a) $x = 3$ and (b) $x = 12$" as follows: Solution (a) To evaluate, substitute 3 for x in the expression, and then simplify. Given $x + 7$ Substitute $3+7$ Add 10 When $x=3$, the expression $x+7$ has a value of 10 (b) To evaluate, substitute 12 for x in the expression, and then simplify. Given $x + 7$ Substitute $12+7$ Add 19 When $x=12$, the expression $x+7$ has a value of 19</p>	<p>Minor</p>
<p>Chapter 2.3: The Language of Algebra</p>	<p>Fixed</p>	<p>Typo</p>

<p>Section: Solving Equations Using the Subtraction and Addition Properties of Equality The word "sign" is misspelled "sin" in an example in Section 2.3. See attached screenshot.</p>		
<p>Chapter 2.3: The Language of Algebra, Section: Solving Equations Using the Subtraction and Addition Properties of Equality, Example 2.35 In an example in Section 2.3, the problem statement uses the phrase "is equal to" but the solution just uses the word "is." This is not a big issue except that the section is specifically focused on translating words to algebra. See attached screenshot.</p>	<p>Revise Example 2.35 as follows: Translate the sentence into an algebraic equation: The sum of 6 and 9 is 15.</p>	<p>Minor</p>
<p>Chapter 2.3: The Language of Algebra, Section: Solving Equations Using the Subtraction and Addition Properties of Equality, Example 2.38 In an example problem in Section 2.3, the variable in the problem is "x" but one line of the solution uses the variable "y" instead. See the screenshot.</p>	<p>Revise the solution to Example 2.38 as follows: Example 2.38 Translate and solve: Three more than x is equal to 47. Solution ... We can check. Let $x = 44$.</p>	<p>Typo</p>
<p>Chapter 2.3: The Language of Algebra, Section: Solving Equations Using the Subtraction and Addition Properties of Equality, Subsection: Solve Equations Using the Addition Property of Equality In the Key Concepts portion of Section 2.3, the expressions for the addition property of equality and the subtraction property of equality are wrong. See the attached screenshot.</p>	<p>Revise the box "Addition Property of Equality" to delete the extraneous parentheses in front of the equations, and center the equations.</p>	<p>Major</p>
<p>Chapter 2.4: The Language of Algebra Section: Find Multiples and Factors In an example in Section 2.4, the check for divisibility by 3 is shown as "$5625 \div 5 = 1875$" and it should be "$5625 \div 3 = 1875$" See screenshot.</p>	<p>Fixed</p>	<p>Typo</p>
<p>Chapter 2.4: The Language of Algebra Section: Find Multiples and Factors An example in Section 2.4 has the statement "Is last digit is 5 or 0?" Obviously, the second "is" should be removed. See attached screenshot.</p>	<p>Fixed</p>	<p>Typo</p>

<p>Chapter 2.4: The Language of Algebra, Section: Find Multiples and Factors, Example 2.47 One of the examples in Section 2.4 has an ungrammatical sentence. The ungrammatical sentence is "Test each prime, in order, to see if it is a factor of 83 by each of the prime numbers, starting with 2, as shown." See screenshot.</p>	<p>Revise the solution to part A of Example 2.47 as follows: Example 2.47 Identify each number as prime or composite: A 83 B 77 Solution A. Test each prime, in order, to see if it is a factor of 83, starting with 2, as shown.</p>	<p>Minor</p>
<p>Chapter 2.4: The Language of Algebra, Section: Find Multiples and Factors, Try It #2.89 An exercise in Section 2.4 asks if a number is divisible by 2,3,5, & 10. The answer identifies that the number is divisible by 2,3, & 6 even though the question didn't ask if it was divisible by 6. Either the answer should omit divisibility by 6 or the question should ask about divisibility by 6. See attached screenshot.</p>	<p>Revise the answer to Try It #2.89 as follows: Try It 2.89 Determine whether the given number is divisible by 2, 3, 5, and 10. 4962 Answer: Divisible by 2 and 3, not 5 or 10.</p>	<p>Typo</p>
<p>Chapter 2.5: The Language of Algebra Section: Prime Factorization and the Least Common Multiple In Section 2.5, one of the examples has two figures that are reversed. See the attached screenshot.</p>	<p>Revised</p>	<p>Minor</p>
<p>Chapter 3.1: Integers Section: Introduction to Integers In Section 3.1, the example titled "Modeling Addition of Positive and Negative Integers" there are four parts (a,b,c,d). In Part c, the problem begins with "Start with 4 negatives" and it should say "Start with 4 positives." See the attached screenshot.</p>	<p>Revised</p>	<p>Typo</p>
<p>Chapter 3.1: Integers Section: Introduction to Integers In Section 3.1, the exercise that begins "Translate each phrase into an expression with integers:" has an incomplete problem that says "the opposite of" and it should say "the opposite of negative nineteen." See the attached screenshot.</p>	<p>Revised</p>	<p>Minor</p>
<p>Chapter 3.2: Integers Section: Add Integers In Section 3.2 there is an</p>	<p>Revised</p>	<p>Minor</p>

<p>exercise that begins "Model the expression, and then simplify: $2+(?4)$." The answer is given as "2" but it should be "-2." See attached screenshot.</p>		
<p>Chapter 3.3: Integers Section: Subtract Integers In Section 3.3, the example problem that says "$?17?9$and$?17+(?9)$" should say "$??17?9$and$?17+(?9)$." See attached screenshot.</p>	Revised	Minor
<p>Chapter 3.3: Integers Section: Subtract Integers In Section 3.3, the solution does not match the problem for the example that begins: "Simplify: $?74?(?58)$." See attached screenshot.</p>	<p>Revise the solution to Example 3.38 as follows: Example 3.38 Simplify: $-74 - (-58)$. Solution We are taking 58 negatives away from 74 negatives. $-74 - (-58)$ Subtract. -16</p>	Minor
<p>Chapter 3.3: Integers Section: Subtract Integers In Section 3.3, there is a practice problem that says: Model each subtraction. $? 7 - (-8) ? -2 - (-2) ? 4 - 1 ? -6 - 8$ The solutions that are provided do not match the problems. I have provided my versions of the solutions. (Sometimes I modified the problem to match the solution, and other times I modified the solution to match the problem.)</p>	<p>Revise the figures for the solutions to Try It #3.67 and #3.68 to correctly model the problem answers.</p>	Minor
<p>Chapter 3.3: Integers, Section: Subtract Integers, Subsection: Simplify Expressions with Integers, Example 3.38 The last step of Example 3.38 is incorrect. It shows $`14 - 9`$, where as it should show $`-7 - 40`$. As such, the final answer should be $`-47`$.</p>	<p>Revise the solution to Example 3.38 "Simplify: $3 \times 7 - 4 \times 7 - 5 \times 8$" as follows: Solution: Multiply first. $3 \times 7 - 4 \times 7 - 5 \times 8$ Subtract from left to right. $21 - 28 - 40$ Subtract. $-7 - 40$ 47</p>	Minor
<p>Chapter 3.4: Integers Section: Multiply and Divide Integers In Section 3.5, one of the example problems begins with "Solve: $a?6=?8$." In the solution, the first two lines are reversed. See attached screenshot.</p>	Revised	Minor
<p>Chapter 3.4: Integers Section: Multiply and Divide Integers In Section 3.4, the subsection that is titled "Key Concepts" shows the rules for multiplication only and it should show the rules for both</p>	<p>Revise the Key Concepts of Section Multiply and Divide Integers as follows: Multiplication of Signed Numbers -To determine the sign of the product of two signed</p>	Minor

<p>multiplication and division of integers. See attached screenshot.</p>	<p>numbers: -Same Signs Product Two positives Positive Two negatives Positive -Different Signs Product Positive x negative Negative Negative x positive Negative -Division of Signed Numbers -To determine the sign of the quotient of two signed numbers: -Same Signs Quotient Two positives Positive Two negatives Positive -Different Signs Quotient Positive & negative Negative Negative & positive Negative</p>	
<p>Chapter 3.4: Integers, Section: Multiply and Divide Integers, Subsection: Translate Word Phrases to Algebraic Expressions, Example 3.56 The listed answer to Example 3.56 is incorrect. $(-2)(14)$ should equal -28, not 28.</p>	<p>Revise the solution to Example 3.56 "Translate to an algebraic expression and simplify if possible: the product of -2 and 14" from "28" to "-28".</p>	<p>Minor</p>
<p>Chapter 4.1 Fractions Section: Visualize Fractions (Convert between improper fractions and Mixed Numbers.). The example is $11/6$ to be converted in mixed number. The answer in the textbook is $1 \frac{1}{6}$. It should be $6/6 + 5/6 = 11/6$ and so the answer should be $1 \frac{5}{6}$.</p>	<p>In Example 4.9, Revise "$1 \frac{1}{6}$" to "$1 \frac{5}{6}$" twice in the solution.</p>	<p>Minor</p>
<p>Chapter 4.2: Fractions Section: Multiply and Divide Fractions Errata: "Each number in the pair is called a reciprocal." Correction: "Each number in the pair is called a reciprocal."</p>	<p>Resolution: "Such pairs of numbers are called reciprocals."</p>	<p>Typo</p>
<p>Chapter 4.3: Fractions, Section: Multiply and Divide Mixed Numbers and Complex Fractions, Section Exercises On page 339, many of the exercises contain decimals. This cannot be correct as decimals are not covered until chapter 5 and this error is in chapter 4. The correction is that any problem with a decimal needs to be edited to a multiplication sign. See problem 228 for example. The number 5.8 should actually be the operation 5 times 8 (using a dot for the multiplication</p>	<p>In the Section Exercises, revise decimals to multiplication signs.</p>	<p>Typo</p>

symbol).		
<p>Chapter 6.3: Percents Section: Solve Sales Tax, Commission, and Discount Applications Example 6.25 does not answer part (b); i.e. "the total cost of a bicycle if the purchase price of the bicycle was \$392?"</p>	<p>Revise the solution to Example 6.25 to include the following for part (b): Identify what you are asked to find. _____ What is the total cost of the bicycle? Choose a variable to represent it. _____ Let c = total cost of bicycle. Write a sentence that gives information to find it. _The total cost is the purchase price _____ plus the sales tax. Translate into an equation. _____ $c = \\$392 + \\25.48 Simplify. _____ $c = \\$417.48$ Check: Is this answer reasonable? _____ Yes, because the total cost is a little _____ more than the purchase price. Write a complete sentence that answers the _____ The sales tax is \$25.48 and the total question. _____ cost is \$417.48.</p>	<p>Minor</p>
<p>Chapter 7.4: The Properties of Real Numbers, Section: Properties of Identity, Inverses, and Zero, Table 7.55 In Chapter 7 table summarizing the properties of real numbers, the associate property of addition cell shows: $(a + b) + c = (b + c)$ when it should show $(a + b) + c = a + (b + c)$.</p>	<p>In Table 7.55 "Properties of Real Numbers", revise the formula for the Associative Property of Addition as follows: $(a + b) + c = a + (b + c)$</p>	<p>Minor</p>
<p>Chapter 9.5: Math Models and Geometry, Section: Solve Geometry Applications: Circles and Irregular Figures, Try It #9.90 I have found an error in the Pre-Algebra text http://cnx.org/contents/yqV9q0HH@9.462:bKH6Ab4@15/Solve-Geometry-Applications-Ci I have attached a screenshot of the error---the correct response should be 70 sq. units, not 74.</p>	<p>Revise the answer to Try It #9.90 as follows: Try It 9.90 Find the area of each shaded region. Answer: 70 sq. units</p>	<p>Minor</p>

This also appears in the PDF version as
Try It::9.90 on page 809 (physical page
815)/ Rex Abert Associate Professor of
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College submitted via help desk -JD

