

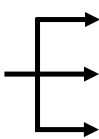
EDITABLE

*Common
Core Aligned*



MATH ASSESSMENTS

all Standards
BUNDLE

**3 ASSESSMENTS
PER STANDARD**  **PRE-ASSESSMENT
MEETS THE STANDARD
EXCEEDS THE STANDARD**

BY: Teaching and Tapes

**you
choose:**

PDF

This product comes with a PDF file and an editable file for every Common Core strand. For most of the assessments you will just print and go with the PDF version included in this pack. It is my **best seller** and has successfully been used in thousands of classrooms by oodles of happy teachers!

or **editable**

How do I edit the assessments?

Simple! If you have PowerPoint 2004 or newer (.ppt or .pptx) just open the editable version of the file and click inside the text boxes and change the text however you like.

Two reasons this is an awesome feature:

1. **Data tracking and multiple assessments:** You can easily change a question slightly so that you can retest with your students as many times as you need!
2. If you use different terminology than me (i.e. "number sentence" vs. "equation") you can **easily change** it to your liking.

What you cannot do:

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4TH GRADE COMMON CORE MATH ASSESSMENTS

*Operations &
Algebraic Thinking*

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Scoring rubric
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There are five "strands" included: Numbers and Operations in Base Ten, Operations and Algebraic Thinking, Measurement and Data, Fractions, and Geometry

INTRODUCTION TO THIS ASSESSMENT TOOL

This packet includes materials that match the Common Core standards. Each standard is written at the top of the page. There are three assessments for each standard.

"Pre-Assessment" = Meets the Common Core standard at a basic or medium level of rigor. Can also be used as a mid unit formative assessment.

"Meets the Standard" = Meets the Common Core standard at a medium or high level of rigor or D.O.K. (Depth of Knowledge)

"Exceeds the Standard" – Exceeds the grade level Common Core standard and completes higher level of rigor problems from one full grade level beyond the standard.

[illegible]

Numbers and Operations in Base Ten

Multiply a whole number of up to four digits by a one-digit whole number, and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.

CCSS 4.NBT.5 (Critical Area)
Pre-Assessment

Evidence of standard
mastery on this
assessment?

Write and solve the multiplication equation that matches the array below.

	30
20	600
4	120

_____ equation

answer

Write and solve the multiplication equation that matches the array below.

360
360
360

_____ equation

answer

$$\begin{array}{r} 82 \\ \times 36 \\ \hline \end{array}$$

Name: _____

Numbers and Operations in Base Ten

Multiply a whole number of up to four digits by a one-digit whole number, and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.

Note: This is a 4th Grade Critical Area

**CCSS 4.NBT.5 (Critical Area)
Meets the Standard**

Evidence of standard
mastery on this
assessment?

The Common Core standard is
clearly marked on each
assessment.

Multiply:

$$\begin{array}{r} 3,546 \\ \times \quad 6 \\ \hline \end{array}$$

Show the

array or area model.

Write a matching addition sentence:

Answer

Shasta solved 42×13 using the area model below. Her answer was marked incorrect.

	40	2
10	400	20
3	520	6

$$\begin{array}{r} 400 \\ 20 \\ 520 \\ + \quad 6 \\ \hline \end{array}$$

So, $42 \times 13 = 946$

Where did she make a mistake and explain how she should correct it.

Name:

Numbers and Operations in Base Ten

Multiply a whole number of up to four digits by a one-digit whole number, and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.

Exceeds the Standard: 5th Grade Common Core Standard 5.NBT.5 - Fluently multiply multi-digit whole numbers using the standard algorithm.

CCSS 4.NBT.5 (Critical Area)
Exceeds the Standard

Evidence of standard
mastery on this
assessment?

Solve. Show your work.

$$\begin{array}{r} 427 \\ \times 92 \\ \hline \end{array}$$

$$\begin{array}{r} 2 \\ \times 1 \\ \hline \end{array}$$

$$\begin{array}{r} 123 \\ \times 557 \\ \hline \end{array}$$

To be "exceeding", the student must meet the related 5th grade standard when applicable. If there is not a matching 5th grade standard, they must complete a challenge problem. There is an exceeding assessment for every 4th grade standard!

Circle one of the problems above.

Illustrate this calculation by using a rectangular array or area model.

Name:

Numbers and Operations - Fractions

Use decimal notation for fractions with denominators 10 or 100. For example, rewrite $\frac{62}{100}$ as 0.62; describe a length as 0.62 meters; locate 0.62 on a number line diagram.

CCSS 4.NF.6

Meets the Standard

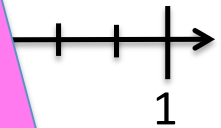
Evidence of standard mastery on this assessment?

Plot and label points to show the locations of $\frac{90}{100}$ and 0.39 on a number line.

Solve and write $\frac{3}{10} + 0.4$ as a decimal.

Now draw an **X** to show where it belongs on the number line.

plenty of space for your students to explain and show their thinking which is essential for meeting the Common Core standards.



Melissa wanted to run 2 miles. She got tired and ran only 1.78 miles. Draw and label a number line to show how close she was to her goal of 2 miles.

Name: _____

4.NBT.5 (Critical Area)

4.NBT.6 (Critical Area)

Complete Understanding	<p>For complete understanding in this 4th grade Critical Area, the student should be flexible in breaking numbers apart and have a good understanding of place value and the distributive property in multi-digit multiplication.</p> <p>The student is able to use base ten blocks, area models, partitioning, compensation strategies, etc. when multiplying whole numbers (the standard algorithm is not expected until the student has mastery at the concrete level and/or is in 5th grade)</p> <p>The student is able to use words and diagrams to explain their thinking.</p>	Complete Understanding	<p>For complete understanding in this 4th grade Critical Area, the expected level of understanding for this division standard is similar to level of understanding for the multiplication standard (4.NBT.5). Students should be flexible with their understanding of number relationships using a variety of methods to divide, i.e using multiplication, decomposing the dividend into like base-ten units, working with the distributive property</p> <p>The student should be comfortable working with remainders.</p> <p>The student is able to explain thinking with area models or rectangular arrays</p>
Developing Understanding	<p>The student can use some concrete methods but lacks flexibility in showing their understanding of multiplying multi digit numbers.</p> <p>Student struggles to explain their strategies in words or diagrams.</p>	Developing Understanding	<p>The student can use some concrete methods, but lacks flexibility in showing their understanding of dividing (with or without remainders).</p> <p>Student struggles to explain their strategies in words or diagrams.</p>
Does Not Meet	<p>Student cannot multiply using a variety of strategies and lacks understanding of the standard.</p>	Does Not Meet	<p>Student cannot divide using a variety of strategies and lacks understanding of the standard.</p>

An answer key is included, but the scoring rubric is also helpful for keeping yourself consistent with your definition of "meeting" the standard.



Answer keys

Numbers and Operations in Base Ten

Multiply a whole number of up to four digits by a one-digit whole number, and multiply two two-digit numbers, using strategies based on place value and the properties of operations. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.

Note: This is a 4th Grade Critical Area

**CCSS 4.NBT.5 (Critical Area)
Meets the Standard**

Evidence of standard
mastery on this
assessment?

Multiply:

$$\begin{array}{r} 3,546 \\ \times \quad 6 \\ \hline 21,276 \end{array}$$

Show the problem using a rectangular array or area model.

3,546
3,546
3,546
3,546
3,546

Write

Answer

276

Detailed answer keys for every assessment!

Shasta solved
incorrect.

her answer was marked

	400	20
3	520	6

400
20
520
+ 6

So, $42 \times 13 = 946$

Where did she make a mistake and explain how she should correct it.

Explanations will vary but the mistake is when she multiplied 3×40 , her answer should be 120 (not 520 which is 120 plus 400).

Name:

Operations and Algebraic Thinking

Find all factor pairs for a whole number in the range 1–100. Recognize that a whole number is a multiple of each of its factors. Determine whether a given whole number in the range 1–100 is a multiple of a given one-digit number. Determine whether a given whole number in the range 1–100 is prime or composite.

CCSS 4.OA.4

Meets the Standard

Evidence of standard
mastery on this
assessment?

The area of a rug in Mr. Steven's house is 24 square yards. List all possible whole-number dimensions the rug can have.

?

Area = 24 square yards

?

Possible dimensions:

1 × 24

2 × 12

3 × 8

4 × 6

The teachers are setting up 35 chairs for the 4th grade spelling bee. How many different ways can they arrange the seating? List all of the possibilities for the number of rows and the number of students in each row.

For example, ___ rows of ___ students

1 row of 35 students

5 rows of 7

The entire test was written with
RIGOROUS problems as required for the
Common Core standards.

What is a factor? _____ says that number 93 is a prime number. Is she correct?

A factor is a number that can be multiplied by another number to get the original number.

She is not correct.

Use what you know about factors to explain your answer.

What are all the factors of 12?

1, 2, 3, 4, 6, 12

93 is a composite number because it has the factors of 1, 3, 31, and 93. A prime number only has factors of 1 and itself.

Name: _____

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