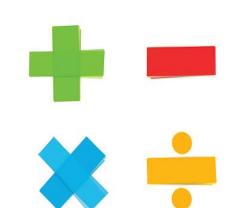
Operations 4 Algebraic Thinking

5th Grade—"I Can Do Math"
I can understand and write number sentences with
one or more numbers and operations.

5.0A. | a | can write and figure out number sentences that have parentheses, brackets, and/or braces.
5.0A.2 | can correctly write number sentences using mathematic symbols and the order of operations correctly.
5.0A.2 | can write simple algebraic expressions that record calculations with numbers.



5.0A.2 .b - I can understand number sentences and estimate their answers without actually calculating them.

I can study number patterns and figure out their relationships.

- 5.0A.3 \square I can create two number patterns using two given rules.
- $5.0A.3 \square I$ can identify relationships between two number patterns.
- 5.0A.3 I can form ordered pairs using the relationship between two number patterns and graph them on a coordinate plane.

Numbers 4

Operations in Base 10

5th Grade—"I Can Do Math"

officially I out to traff
I can understand the place value system.
5.NBT. I 🗆 I can understand and explain the value of digits in a
larger number.
5.NBT.2 🗆 I can explain patterns of zeroes in an answer when
multiplying a number by powers of 10.
5.NBT.2 🗆 I can explain patterns of decimal placement when a
decimal is multiplied or divided by a power of 10.
5.NBT.2 \square I can use whole-number exponents to show powers o
10.
5.NBT.3 🗆 I can read, write, and compare decimals to
thousandths.

- 5.NBT.3.a I can read and write decimals to thousandths using base-ten numbers, number names, and expanded form.
- 5.NBT.3.b \square I can compare two decimals to thousandths using the >, =, and < symbols correctly.
- 5.NBT.4 I can use place value understanding to help me round decimals to any place.

I can solve math equations with larger whole numbers and decimals to the hundredths.

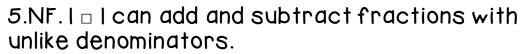
- 5.NBT.5 I can easily multiply larger whole numbers.
 5.NBT.6 I can divide four-digit numbers (dividends) by two-digit numbers (divisors).
- 5.NBT.6 \square I can illustrate and explain a division problem using equations, arrays, and/or models.
- $5.\text{NBT.7} \square \text{ I can add, subtract, multiply, and divide decimals to hundredths using what I have learned about place value.}$
- 5.NBT.7. | can relate the strategies I use to add, subtract, multiply, and divide decimals to hundredths to a written problem and explain why I chose the strategies to help me solve the problem.

Numbers 4

Operations (Fractions)

5th Grade—"I Can Do Math"

I can use equivalent (equal) fractions as a strategy to add and subtract fractions.



5.NF. | \square | can solve word problems that involve addition and subtraction of fractions.

5.NF.2 - I can use number sense and fractions that I know to help me estimate the reasonableness of answers to fraction problems.

I can use and increase my understanding of multiplication and division.

- $5.NF.3 \,\square\, I$ can understand that fractions are really division problems.
- 5.NF.3 □ I can solve word problems where I need to divide whole numbers leading to answers that are fractions or mixed numbers.
- 5.NF.4 I can use what I know about multiplication to multiply fractions or whole numbers by a fraction.
- 5.NF.4.a \Box I can understand and show with models that multiplying a fraction by a whole number is the same as finding the product of the numerator and whole number and then dividing it by the denominator.
- 5.NF.4.b \Box I can use unit squares to find the area of a rectangle with fractional side lengths and prove that it is the same as multiplying the side lengths (A = I x w).

Numbers 4 Operations (Fractions) (cont.)

5th Grade—"I Can Do Math"

I can build fractions from unit fractions.

5.NF.5 - I can think of multiplication as the scaling of a number (similar to a scale on a map).
5.NF 5.a 🗆 I can mentally compare the size of a product to the
size of one of the factors by thinking about the other factor in
the problem.
5.NF.5.b 🗆 I can explain why multiplying a number by a fraction
greater than I will result in a bigger number than the number I
started with.
5.NF.5.b 🗆 I can explain why multiplying a number by a fraction
less than I will result in a smaller number than the number I
started with.
5.NF 5.b \Box I can relate the notion of equivalent fractions to
the effect of multiplying a fraction by I.
5.NF.6 - I can solve real world problems that involve
multiplication of fractions and mixed numbers.
5.NF.7 🗆 I can use what I know about division to divide fractions
by whole numbers or whole numbers by fractions.
5.NF.7.a 🗆 I can divide a fraction by a whole number (not 0)
correctly.
5.NF.7.b I can divide a whole number by a fraction correctly.
5.NF.7.c - I can use what I know about division problems
involving fractions to solve real world problems.

Measurement 4

Data

1 2 3 4 5 6 7 8 9

5th Grade—"I Can Do Math"

I can convert like measurement units within a given measurement system.

- 5.MD. I = I can convert different-sized measurements within the same measurement system.
- 5.MD. I. \square I can use measurement conversions to solve realworld problems.

I can represent and interpret data.

- 5.MD.2 $\ \square$ I can make a line plot to show a data set of measurements involving fractions.
- 5.MD.2 I can use addition, subtraction, multiplication, and division of fractions to solve problems involving information presented on a line plot.

I can understand the concept of measurement in geometry with regards to volume.

- 5.MD. 3 \square I can recognize volume as a characteristic of solid figures and understand how it can be measured.
- 5. MD. 3. a 🗆 I can understand a "unit cube" as a cube with side lengths of I unit and can use it to measure volume.
- 5. Mp. 3. b $_{\Box}$ I can understand that a solid figure filled with a number of unit cubes is said to have a volume of that many cubes.
- 5. MD. 4 I can measure volume by counting unit cubes.

Measurement 4 Data (cont.)

5th Grade—"I Can Do Math"

I can understand the concept of measurement in geometry with regard to angles (cont.)

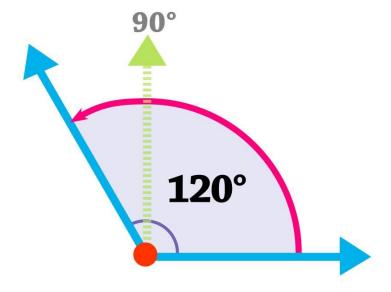
5. MD. 5 \square I can solve real—world problems involving volume by thinking about multiplication or addition.

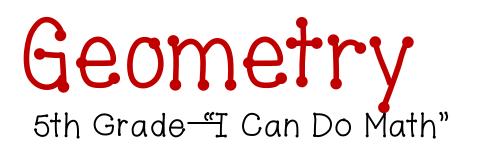
5.MD. 5.a \Box I can use unit cubes to find the volume of a right rectangular prism with whole number side lengths and prove that it is the same as multiplying the edge lengths ($v = l \times w \times h$). 5.MD. 5.b \Box I can solve real—world and mathematical problems

involving volume of an object using the formulas $v = l \times w \times h$ and $v = b \times h$.

5.MD. 5.c. \Box I can find the volumes of solid figures made up of two right rectangular prisms by adding the volumes of both.

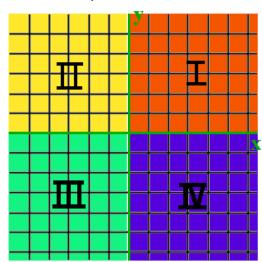
5.MD. 5.c - I can solve real—world problems using what I know about adding volumes of two right rectangular prisms.





I can graph points on the coordinate plane to solve real-world and mathematical problems.

- 5.G. I \Box I can understand a coordinate plane and ordered pairs of number coordinates on that plane.
- 5.6.1.a \Box I can graph ordered pairs of numbers on a coordinate plane using what I have learned about the x-axis and coordinate and the y-axis and coordinate.
- 5.G. I. b \square I can represent real—world and mathematical problems by graphing points in the first quadrant of a coordinate plane.
- $5.6.2 \,\square$ I can understand coordinate values in the context of a real-world or mathematical problem.



I can classify 2-dimensional shapes into categories based on their properties.

- 5.6. 3 \square I can understand how attributes of 2-dimensional shapes in a category also belong to all subcategories of those shapes.
- 5.6.4 $_{\square}$ I can classify 2-dimensional shapes based on their properties.