SCOPE & SEQUENCE
GRADE 4
EUREKA MATH MODULES

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The following information outlines where students and teachers should spend the majority of their time in order to meet the expectation of the standards.

Students should spend the large majority[1] of their time on the major work of the grade (■). Supporting work (□) and, where appropriate, additional work (○) can engage students in the major work of the grade.[2, 3]

MAJOR, SUPPORTING, AND ADDITIONAL CLUSTERS FOR GRADE 4

Emphases are given at the cluster level. Refer to the Common Core State Standards for Mathematics for the specific standards that fall within each cluster.

Key: ■ Major Clusters □ Supporting Clusters ○ Additional Clusters

4.OA.A	■	Use the four operations with whole numbers to solve problems.
4.OA.B	□	Gain familiarity with factors and multiples.
4.OA.C	○	Generate and analyze patterns.
4.NBT.A	■	Generalize place value understanding for multi-digit whole numbers.
4.NBT.B	■	Use place value understanding and properties of operations to perform multi-digit arithmetic.
4.NF.A	■	Extend understanding of fraction equivalence and ordering.
4.NF.B	■	Build fractions from unit fractions by applying and extending previous understandings of operations on whole numbers.
4.NF.C	■	Understand decimal notation for fractions, and compare decimal fractions.
4.MD.A	□	Solve problems involving measurement and conversion of measurements from a larger unit to a smaller unit.
4.MD.B	□	Represent and interpret data.
4.MD.C	○	Geometric measurement: understand concepts of angle and measure angles.
4.G.A	○	Draw and identify lines and angles, and classify shapes by properties of their lines and angles.

HIGHLIGHTS OF MAJOR WORK IN GRADES K–8

K–2	Addition and subtraction – concepts, skills, and problem solving; place value
3–5	Multiplication and division of whole numbers and fractions – concepts, skills, and problem solving
6	Ratios and proportional relationships; early expressions and equations
7	Ratios and proportional relationships; arithmetic of rational numbers
8	Linear algebra and linear functions

REQUIRED FLUENCIES FOR GRADE 4

4.NBT.B.4	Add/subtract within 1,000,000

Sequence of 4th Grade Eureka Math Modules

Summary of the Year:
Fourth grade mathematics is about (1) developing understanding and fluency with multi-digit multiplication, and developing understanding of dividing to find quotients involving multi-digit dividends; (2) developing an understanding of fraction equivalence, addition and subtraction of fractions with like denominators, and multiplication of fractions by whole numbers; and (3) understanding that geometric figures can be analyzed and classified based on their properties, such as having parallel sides, perpendicular sides, particular angle measures, and symmetry.
Key Areas of Focus for 3-5:
Multiplication and division of whole numbers and fractions—concepts, skills, and problem solving
Required Fluency:
4.NBT.4 Add and subtract within 1,000,000

Module Title	Module Duration	Module Description	CCSS/NJSLSM Overview & Standard
Module 1: Place Value, Rounding, and Algorithms for Addition and Subtraction	25 days Sept - Oct	Students extend their work with whole numbers. They begin with large numbers using familiar units (hundreds and thousands) and develop their understanding of millions by building knowledge of the pattern of *times ten* in the base ten system on the place value chart (4.NBT.1). They recognize that each sequence of three digits is read as hundreds, tens, and ones followed by the naming of the corresponding base thousand unit (thousand, million, billion).[1]	*Use the four operations with whole numbers to solve problems. (4.OA.3) **Interim 2- 4.OA.A.3** **Interim 3- 4.OA.A.3** *Generalize place value understanding for multi-digit whole numbers. (Grade 4 expectations in this domain are limited to whole numbers less than or equal to 1,000,000.) (4.NBT.1, 4.NBT.2, 4NBT.3) **Interim1- 4.NBT.A*; 4.NBT.A.1; 4.NBT.A.2; 4.NBT.A.3** **Interim2- 4.NBT.A; 4.NBT.A.1; 4.NBT.A.2; 4.NBT.A.3** *Use place value understanding and properties of operations to perform multi-digit arithmetic. (4.NBT.4) **Interim 1- 4.NBT.B.4** **Interim 2- 4.NBT.B.4**
Module 2 Unit Conversions	7 days (Oct.)	Module 2 uses length, mass and capacity in the metric system to convert between units using place value knowledge. Students recognize patterns of converting units on the place value chart, just as 1000 grams is equal 1 kilogram, 1000 ones is equal to 1 thousand. Conversions are recorded in two- column tables and number lines, and are applied in single- and multi-step word problems solved by the addition and subtraction algorithm or a	*Solve problems involving measurement and conversion of measurements from a larger unit to a smaller unit. (4.MD.1, 4.MD.2) **Interim 1- 4.MD.A.1***

		special strategy. Mixed unit practice prepares students for multi-digit operations and manipulating fractional units in future modules.	
Module 3 Multi-Digit Multiplication and Division	43 days (Oct.- Dec.)	In this 43-day module, students use place value understanding and visual representations to solve multiplication and division problems with multi-digit numbers. As a key area of focus for Grade 4, this module moves slowly but comprehensively to develop students' ability to reason about the methods and models chosen to solve problems with multi-digit factors and dividends.	*Use the four operations with whole numbers to solve problems. (4.OA.1, 4.OA.2, 4.OA.3) **Interim 2- 4.OA.A.1; 4.OA.A.2; 4.OA.A.3** **Interim3- 4.OA.A.3** *Gain familiarity with factors and multiplies. (4.OA.4) **Interim 2- 4.OA.B.4** Use place value understanding and properties of operations to perform multi-digit arithmetic. (Grade 4 expectations in this domain are limited to whole numbers less than or equal to 1,000,000.) (4.NBT.5, 4.NBT.6) **Interim 1- 4.NBT.B.5*** **Interim 2- 4.NBT.B.5*; 5.NBT.B.6** **Interim 3- 4.NBT.B.5*; 5.NBT.B.6** *Solve problems involving measurement and conversion of measurements from a larger unit to a smaller unit. (4.MD.3) **Interim 2- 4.MD.A.3**
Module 5 Fractions Equivalence, Ordering, and Operations	45 days (Jan.-March)	In this 40-day module, students build on their Grade 3 work with unit fractions as they explore fraction equivalence and extend this understanding to mixed numbers. This leads to the comparison of fractions and mixed numbers and the representation of both in a variety of models. Benchmark fractions play an important part in students' ability to generalize and reason about relative fraction and mixed number sizes. Students then have the opportunity to apply what they know to be true for whole number operations to the new concepts of fraction and mixed number operations.	*Generate and analyze patterns. (4.OA.5)** *Extend understanding of fraction equivalence and ordering. (Grade 4 expectations in this domain are limited to fractions with denominators 2, 3, 4, 5, 6, 8, 10, 12, and 100.) (4.NF.1, 4.NF.3) **Interim 3- 4.NF.A.1; 4.NF.B.3a-d** *Build fractions from unit fractions by applying and extending previous understanding of operations on whole numbers. (4.NF.3, 4.NF.4) **Interim 3- 4.NF.B.3a-d; 4.NF.B.4a-c**

			*Represent and Interpret data (4.MD.4) **Interim 3- 4.MD.B.4**
Module 6 Decimals and Fractions	20 days (March-April)	This 20-day module gives students their first opportunity to explore decimal numbers via their relationship to decimal fractions, expressing a given quantity in both fraction and decimal forms. Utilizing the understanding of fractions developed throughout Module 5, students apply the same reasoning to decimal numbers, building a solid foundation for Grade 5 work with decimal operations.	* Understand decimal notation for fractions, and compare decimal fractions. (Grade 4 expectations in this domain are limited to fractions with denominators 2, 3, 4, 5, 6, 8, 10, 12, and 100.) (4.NF.5, 4.NF.6, 4.NF.7)** * Solve problems involving measurement and conversion of measurements from a larger unit to a smaller unit. (4.MD.2)**
Module 4 Angle Measure and Plane Figures	20 days (April-May)	This 20-day module introduces points, lines, line segments, rays, and angles, as well as the relationships between them. Students construct, recognize, and define these geometric objects before using their new knowledge and understanding to classify figures and solve problems. With angle measure playing a key role in their work throughout the module, students learn how to create and measure angles, as well as create and solve equations to find unknown angle measures. In these problems, where the unknown angle is represented by a letter, students explore both measuring the unknown angle with a protractor and reasoning through the solving of an equation. Through decomposition and composition activities as well as an exploration of symmetry, students recognize specific attributes present in two-dimensional figures. They further develop their understanding of these attributes as they classify two-dimensional figures based on them	*Geometric measurement: understand concepts of angle and measure angles. (4.MD.5, 4.MD.6, 4.MD.7)** * Draw and identify lines and angles, and classify shapes by properties of their lines and angles. (4.G.1, 4.G.2, 4.G.3)**
Module 7 Exploring Measurement with Multiplication	20 days (May-June)	In this 20-day module, students build their competencies in measurement as they relate multiplication to the conversion of measurement units. Throughout the module, students will explore multiple strategies for solving measurement problems involving unit conversion.	*Use the four operations with whole numbers to solve problems. (4.OA.1, 4.OA.2, 4.OA.3) **Interim 2- 4.OA.A.1; 4.OA.A.2; 4.OA.A.3** **Interim 3- 4.OA.A.3** *Solve problems involving measurement and conversion of measurements from a larger unit to a smaller unit. (4.MD.1, 4.MD.2) **Interim 1- 4.MD.A.1***

Standard Restrictions

Interim 1

*4.MD.A.1 in IA 1 is restricted to unit conversions and comparisons using the metric system. Unit conversions and comparisons using the customary system will not be assessed in this interim.

*Cluster 4.NBT.A in IA 1 will be assessed through a constructed-response item.

*4.NBT.B.5 in IA 1 is restricted to multiplying a single-digit factor by up to a four-digit factor. Multiplying two two-digit factors will not be assessed in this interim.

Interim 2

*4NBT.B.5 in IA 2 will assess the full breadth of the standard and may include multiplying two two-digit factors.

****STANDARDS NOT IDENTIFIED AS BEING COVERED ON INTERIM 1, 2 OR 3 STILL NEED TO BE TAUGHT AND WILL APPEAR ON PARCC.**