Prekindergarten | Indiana Academic Standards for Mathematics Correlation to *Eureka Math*®

About *Eureka Math*

Created by Great Minds®, a mission-driven Public Benefit Corporation, *Eureka Math*® helps teachers deliver unparalleled math instruction that provides students with a deep understanding and fluency in math. Crafted by teachers and math scholars, the curriculum carefully sequences the mathematical progressions to maximize coherence from Prekindergarten through Precalculus—a principle tested and proven to be essential in students' mastery of math.

Teachers and students using *Eureka Math* find the trademark "Aha!" moments in *Eureka Math* to be a source of joy and inspiration, lesson after lesson, year after year.

Aligned

Great Minds offers detailed analyses that demonstrate how each grade of *Eureka Math* aligns with specific state standards. Access these free alignment studies at greatminds.org/state-studies.

Data

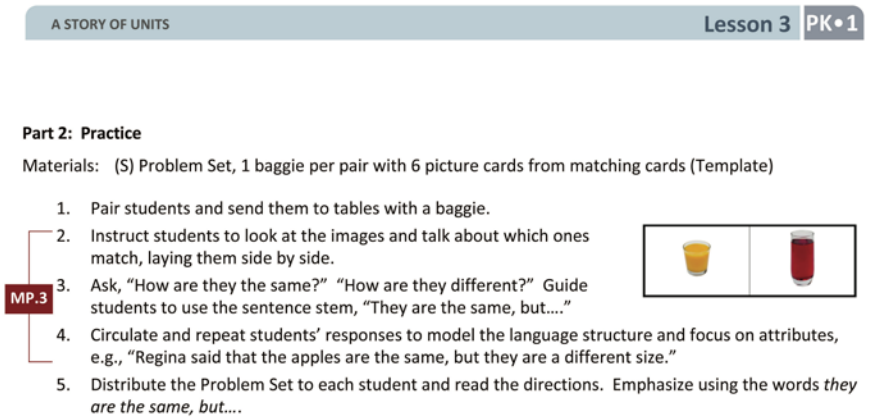
Schools and districts nationwide are experiencing student growth and impressive test scores after using *Eureka Math*. See their stories and data at greatminds.org/data.

Full Suite of Resources

Great Minds offers the *Eureka Math* curriculum as PDF downloads for free, noncommercial use. Access the free PDFs at greatminds.org/math/curriculum.

The teacher–writers who created the curriculum have also developed essential resources, available only from Great Minds, including the following:

- Printed material in English and Spanish
- Digital resources
- Professional development
- Classroom tools and manipulatives
- Teacher support materials
- Parent resources

Mathematics Process Standards	Aligned Components of *Eureka Math*
PS.1 Make sense of problems and persevere in solving them.	Lessons in every module engage students in mathematical processes. These are designated in the Module Overview and labeled in lessons. For example: 
PS.2 Reason abstractly and quantitatively.	
PS.3 Construct viable arguments and critique the reasoning of others.	
PS.4 Model with mathematics.	
PS.5 Use appropriate tools strategically.	
PS.6 Attend to precision.	
PS.7 Look for and make use of structure.	
PS.8 Look for and express regularity in repeated reasoning.	

Numeracy

Early learners develop foundational skills in learning and understanding counting, cardinality, written numerals, quantity, and comparison.

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M1.1 Demonstrate strong sense of counting	*This standard is addressed by the lessons aligned to its subsections.*
M1.1.1 Count the number sequence 1–20	PK M1 Lesson 8: Count up to 3 objects. PK M1 Lesson 15: Arrange and count up to 5 objects in scattered and linear configurations. PK M1 Lesson 37: Culminating task. PK M3 Lesson 1: Introduce 6 and 7, and relate 6 to 5 and 1 more and 7 to 6 and 1 more. PK M3 Lesson 12: Introduce 8, and relate 8 to 7 and 1 more. PK M3 Lesson 13: Use linear configurations to count 8 in relation to 5. PK M3 Lesson 21: Introduce zero. PK M3 Lesson 22: Introduce 9, and relate 9 to 8 and 1 more. PK M3 Lesson 31: Introduce 10, and relate 10 to 9 and 1 more. PK M5 Lesson 24: Identify patterns using objects. PK M5 Lesson 25: Identify and duplicate patterns using sounds and movement. Represent those patterns with objects. PK M5 Lesson 27: Identify a growth pattern using objects.
M1.1.2 Recognize the last number name said tells the number of objects counted	PK M1 Topic C: How Many Questions with 1, 2, or 3 Objects PK M1 Lesson 13: Make a group of up to 3 objects and match the numeral (concrete to abstract). PK M1 Lesson 14: Look at a numeral and count out a group of objects to match (abstract to concrete). PK M1 Topic E: How Many Questions with 4 or 5 Objects PK M1 Topic F: Match 1 Numeral with up to 5 Objects

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M1.1.2 ***continued***	PK M3 Lesson 3: Count to 6 and 7 left to right with fingers. PK M3 Lesson 4: Count to 6 and 7 left to right with fingers. PK M3 Lesson 5: Count 6 objects in array configurations. PK M3 Topic B: Matching One Numeral with up to 7 Objects PK M3 Lesson 14: Count to 8 from left to right with fingers. PK M3 Lesson 15: Count 8 objects in array configurations. PK M3 Topic D: Matching One Numeral with up to 8 Objects PK M3 Lesson 21: Introduce zero. PK M3 Lesson 24: Count from 0 to 9 from left to right with fingers. PK M3 Lesson 25: Count 9 objects in array configurations. PK M3 Topic F: Matching One Numeral with 0 up to 9 Objects PK M3 Lesson 33: Count from 0 to 10 from left to right with fingers. PK M3 Lesson 34: Count 10 objects in array configurations. PK M3 Topic H: Matching One Numeral with up to 10 Objects
M1.1.3 Apply one-to-one correspondence with increasing number of objects and/or people (5–10 objects)	PK M1 Topic E: How Many Questions with 4 or 5 Objects PK M1 Topic F: Match 1 Numeral with up to 5 Objects PK M1 Topic G: One More with Numbers 1 to 5 PK M1 Lesson 37: Culminating task. PK M3 Topic A: How Many Questions with up to 7 Objects PK M3 Topic B: Matching One Numeral with up to 7 Objects PK M3 Topic C: How Many Questions with up to 8 Objects PK M3 Topic D: Matching One Numeral with up to 8 Objects PK M3 Topic E: How Many Questions with 0 up to 9 Objects

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M1.1.3 ***continued***	PK M3 Topic F: Matching One Numeral with 0 up to 9 Objects PK M3 Topic G: How Many Questions with up to 10 Objects PK M3 Topic H: Matching One Numeral with up to 10 Objects
M1.1.4 Draw pictures, symbols, or use manipulatives to represent spoken number 0–10	PK M1 Lesson 13: Make a group of up to 3 objects and match the numeral (concrete to abstract). PK M1 Lesson 14: Look at a numeral and count out a group of objects to match (abstract to concrete). PK M1 Lesson 15: Arrange and count up to 5 objects in scattered and linear configurations. PK M1 Lesson 18: Arrange and count 4 objects in an array configuration. PK M1 Lesson 19: Find embedded numbers within 4 and 5 objects. PK M1 Lesson 20: Arrange and count 5 objects in a circular configuration. PK M1 Topic F: Match 1 Numeral with up to 5 Objects PK M1 Lesson 37: Culminating task. PK M3 Topic B: Matching One Numeral with up to 7 Objects PK M3 Topic D: Matching One Numeral with up to 8 Objects PK M3 Topic F: Matching One Numeral with 0 up to 9 Objects PK M3 Topic H: Matching One Numeral with up to 10 Objects
M1.1.5 Identify, without counting, small quantities of items (1–4) presented in an irregular or unfamiliar pattern (subitize)	*Supplemental material is necessary to address this standard.*
M1.2 Demonstrate understanding of written numerals	*This standard is addressed by the lessons aligned to its subsections.*

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M1.2.1 Match number symbols with amounts 1–10	PK M1 Lesson 12: Match the numerals 1, 2, and 3 to quantities. PK M1 Lesson 13: Make a group of up to 3 objects and match the numeral (concrete to abstract). PK M1 Topic F: Match 1 Numeral with up to 5 Objects PK M1 Lesson 37: Culminating task. PK M3 Lesson 6: Compose 6, and then decompose into two parts. Match to the numeral 6. PK M3 Lesson 7: Compose 7, and then decompose into two parts. Match to the numeral 7. PK M3 Lesson 16: Compose 8, and then decompose into two parts. Match to the numeral 8. PK M3 Lesson 26: Compose 9, and decompose into two parts. Match numerals 0 and 9 to no objects and 9 objects. PK M3 Lesson 35: Compose 10, and decompose into two parts. Match to the numeral 10. PK M5 Topic A: Writing Numerals 0 to 5
M1.2.2 Name written numerals from 0–10	PK M1 Lesson 12: Match the numerals 1, 2, and 3 to quantities. PK M1 Lesson 13: Make a group of up to 3 objects and match the numeral (concrete to abstract). PK M1 Topic F: Match 1 Numeral with up to 5 Objects PK M1 Lesson 37: Culminating task. PK M3 Lesson 6: Compose 6, and then decompose into two parts. Match to the numeral 6. PK M3 Lesson 7: Compose 7, and then decompose into two parts. Match to the numeral 7. PK M3 Lesson 16: Compose 8, and then decompose into two parts. Match to the numeral 8. PK M3 Lesson 26: Compose 9, and decompose into two parts. Match numerals 0 and 9 to no objects and 9 objects. PK M3 Lesson 35: Compose 10, and decompose into two parts. Match to the numeral 10. PK M5 Topic A: Writing Numerals 0 to 5

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M1.2.3 Begin to write numerals 1–10	PK M3 Lesson 6: Compose 6, and then decompose into two parts. Match to the numeral 6. PK M3 Lesson 7: Compose 7, and then decompose into two parts. Match to the numeral 7. PK M3 Lesson 16: Compose 8, and then decompose into two parts. Match to the numeral 8. PK M3 Lesson 26: Compose 9, and decompose into two parts. Match numerals 0 and 9 to no objects and 9 objects. PK M3 Lesson 35: Compose 10, and decompose into two parts. Match to the numeral 10. PK M5 Topic A: Writing Numerals 0 to 5
M1.3 Recognition of number relations	*This standard is addressed by the lessons aligned to its subsections.*
M1.3.1 Identify when 2 sets are equal using matching and counting strategies	PK M4 Topic E: Are There Enough? PK M4 Topic F: Comparison of Sets Up to 5 PK M4 Topic G: Comparison of Sets Including Numerals Up to 5
M1.3.2 Correctly use the words for position	PK M4 Topic D: First and Last
M1.3.3 Compare the values of two numbers from 1 to 10 presented as written numerals	PK M4 Topic G: Comparison of Sets Including Numerals Up to 5 *Supplemental material is necessary to address comparing the values of two numbers from 6 to 10.*
M1.3.4 Demonstrate the understanding of the concept of before	*Supplemental material is necessary to address this standard.*

Computation and Algebraic Thinking

Early learners develop foundational skills in learning to understand mathematical structure and patterning.

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M2.1 Exhibit understanding of mathematical structure	*This standard is fully addressed by the lessons aligned to its subsections.*
M2.1.1 Use understanding that numbers can be composed and decomposed to create new numbers in solving problems with quantities under five	PK M1 Lesson 19: Find embedded numbers within 4 and 5 objects. PK M5 Topic B: Contextualizing Addition Stories to Solve PK M5 Topic C: Contextualizing Subtraction Stories to Solve PK M5 Topic D: Decontextualizing Addition Stories to Solve Using Fingers, Objects, and Drawings PK M5 Topic E: Decontextualizing Subtraction Stories to Solve Using Fingers, Objects, and Drawings
M2.2 Demonstrate awareness of patterning	*This standard is addressed by the lessons aligned to its subsections.*
M2.2.1 Begin to create and extend a new simple pattern	PK M1 Lesson 29: Find 1 more. PK M1 Lesson 30: Build a tower by putting 1 more cube or block at a time. PK M1 Lesson 31: Build number stairs showing 1 more with cubes. PK M1 Lesson 32: Count up—What comes after? PK M1 Lesson 33: Build descending number stairs at the concrete and pictorial levels. PK M1 Lesson 34: Build descending number stairs at the concrete and pictorial levels. PK M1 Lesson 35: Count 5, 4, 3, 2, 1 using a story and the fingers of the left hand. PK M1 Lesson 36: Count 5, 4, 3, 2, 1 using a story and the fingers of the left hand. PK M5 Topic F: Duplicating and Extending Patterns

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M2.2.2 Understand sequence of events when clearly explained	*Supplemental material is necessary to address this standard.*

Data Analysis

Early learners develop foundational skills in learning to understand concepts of classification, data collection, organization, and description.

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M3.1 Demonstrate understanding of classifying	*This standard is fully addressed by the lessons aligned to its subsections.*
M3.1.1 Explain simple sorting or classifying strategies	PK M1 Topic A: Matching Objects PK M1 Topic B: Sorting PK M1 Lesson 37: Culminating task. PK M2 Lesson 2: Identify, analyze, sort, compare, and position triangles. PK M2 Lesson 3: Identify, analyze, sort, compare, and position rectangles and squares. PK M2 Lesson 4: Identify, analyze, sort, compare, and position circles. PK M2 Lesson 5: Identify, analyze, sort, compare, and position circles, rectangles, squares, and triangles. PK M2 Lesson 10: Identify, analyze, sort, compare, and match solid shapes to their two-dimensional faces. PK M2 Lesson 11: Identify, analyze, sort, compare, and build with solid shapes.

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M3.1.2 Sort a group of objects in multiple ways	PK M1 Lesson 7: Sort the same group of objects in two different ways. PK M1 Lesson 37: Culminating task.

Geometry

Early learners develop foundational skills in learning to understand spatial relationships and shape analysis.

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M4.1 Understanding of spatial relationships	*This standard is addressed by the lessons aligned to its subsections.*
M4.1.1 Complete lined tangram or pattern block puzzles using basic shapes to construct other shapes	*Supplemental material is necessary to address this standard.*
M4.1.2 Use position terms such as above, below, beside, and between	PK M2 Lesson 2: Identify, analyze, sort, compare, and position triangles. PK M2 Lesson 3: Identify, analyze, sort, compare, and position rectangles and squares. PK M2 Lesson 4: Identify, analyze, sort, compare, and position circles. PK M2 Lesson 5: Identify, analyze, sort, compare, and position circles, rectangles, squares, and triangles. PK M2 Lesson 11: Identify, analyze, sort, compare, and build with solid shapes. PK M2 Lesson 12: Position solid shapes to create a model of a familiar place.
M4.2 Exhibit ability to identify, describe, analyze, compare, and create shapes	*This standard is addressed by the lessons aligned to its subsections.*

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M4.2.1 Use the attributes of shapes, such as number or length of sides, to distinguish between shapes	PK M2 Topic A: Two-Dimensional Shapes PK M2 Topic B: Constructing Two-Dimensional Shapes PK M2 Lesson 10: Identify, analyze, sort, compare, and match solid shapes to their two-dimensional faces.
M4.2.2 Differentiate two- and three-dimensional shapes (e.g., squares from cubes)	PK M2 Topic C: Three Dimensional Shapes *Supplemental material is necessary to fully address this standard.*

Measurement

Early learners develop foundational skills in learning to understand concepts of time and measurement comparisons.

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M5.1 Understand the concept of time	*Supplemental material is necessary to address this standard.*
M5.1.1 Know daily concepts of earlier and later, morning and afternoon	*Supplemental material is necessary to address this standard.*
M5.2 Understand measurement through description and comparison	*This standard is addressed by the lessons aligned to its subsections.*

Indiana Academic Standards for Mathematics	Aligned Components of *Eureka Math*
M5.2.1 Directly compare and describe two or more objects with a measurable attribute	PK M4 Topic A: Comparison of Length PK M4 Topic B: Comparison of Weight PK M4 Topic C: Comparison of Volume
M5.2.2 Engage in measuring type play/behaviors using standard tools like rulers or measuring tapes, liquid measuring cups, or cylinders	PK M4 Lesson 8: Compare weight using heavier than, lighter than, and the same as with balance scales. PK M4 Lesson 11: Compare volume using the same as with sand and explore conservation. *Supplemental material is necessary to fully address this standard.*