Math - Grade K4

Course Description:

The Indian Community School cultivates an enduring cultural identity and critical thinking by weaving indigenous teachings with a distinguished learning environment. The curriculum for this course is developed from the Wisconsin Model Early Learning Standards, the Common Core State Standards for Mathematics, and the framework of the ICS Our Ways Cultural Calendar. In K4, students will develop and use early mathematical skills and concepts to enhance their learning. Students will understand how to think logically about numbers, shapes, colors, and other early math concepts that can be applied to their everyday life. This course gives life to data collection and application.

Enduring Understandings:

- Using multi-sensory abilities allows for the processing of new information and the ability to problem solve.
- Counting and number recognition creates an awareness of number sense.
- Learning basic number operations and relationships will build a foundation for more complex mathematical reasoning.
- Recognizing two and three dimensional shapes and being able to describe them builds the cornerstone for early geometry.
- Different objects can be sorted, compared, and patterned according to their attributes in order to connect mathematics concepts to the real world.
- A variety of measurement tools are needed to determine the size, weight, length, volume, and value using a variety of different objects.
- In mathematics different tools such as graphs, charts, drawings and pictures are used to gather and record information.
- Scientific thinking requires the use of observation and observational tools to help gather, compare and seek answers to questions through investigations.
- Using gathered information allows for the ability to make predictions and accurate hypotheses.

COUNTING AND CARDINALITY
• I can count to 10+. (PK.CCSS.CC) • I can read numerals to 10+. (PK.CCSS.CC) • I can trace numerals to 10. (PK.CCSS.CC) • I can subitize to 6. (PK.CCSS.CC) • I can number sequence to 10. (PK.CCSS.CC) • I can give next number in sequence to 5. (PK.CCSS.CC) • I can compare sets to 10 by counting and matching. (PK.CCSS.CC)

OPERATIONS AND ALGEBRAIC THINKING

- I can extend ABAB patterns. (PK.CCSS.OA)
- I can extend AABB patterns. (PK.CCSS.OA)
- I can extend AAB patterns. (PK.CCSS.OA)
- I can extend ABB patterns. (PK.CCSS.OA)
- I can extend ABC patterns. (PK.CCSS.OA)
- I can add 2 quantities, each within 5 by using objects, fingers, pictures or numbers. (PK.CCSS.OA)
- I can subtract 2 quantities, each within 5 by using objects, fingers, pictures or numbers. (PK.CCSS.OA)
- I can generate combinations for 4. (PK.CCSS.OA)
- I can generate combinations for 5. (PK.CCSS.OA)
- I can generate combinations within 6. (PK.CCSS.OA)

MEASUREMENT AND DATA

- I can sort objects by color. (PK.CCSS.MD)
- I can sort objects that sink or float. (PK.CCSS.MD)
- I can sort objects by different characteristics. (PK.CCSS.MD)
- I can compare objects by size. (PK.CCSS.MD)
- I can compare objects by weight. (PK.CCSS.MD)
- I can use ordinal numbers 1st through 6th. (PK.CCSS.MD)

GEOMETRY

- I can compose with shapes. (PK.CCSS.G)
- I can identify shapes. (PK.CCSS.G)
- I can name shapes. (PK.CCSS.G)
- I can describe shapes. (PK.CCSS.G)
- I can draw shapes. (PK.CCSS.G)
- I can understand positional words. (PK.CCSS.G)