



## Kindergarten Mathematics Readiness What should families know?

### Number Sense

Learning the meaning of numbers involves the ability to think and work with numbers to understand their relationships and different uses for them.

- Knows numbers represent quantities
- Uses quantities to compare more or less (1-10)
- Counts numbers (1-20)
- Counts backwards (10-0)
- Recognizes numbers (1-10)
- Writes numbers (1-10)

### Sorting and Classifying Objects

Learning to model, explain, and use addition and subtraction concepts in problem solving begins with the opportunity for young children to count, sort, compare objects, and describe their thinking and observations in everyday situations.

- Explores attributes like shape, size, and color
- Matches attributes and their opposites
- Sorts and creates patterns in multiple ways
- Begin to create and extend a simple pattern

### Geometry, Measurement, and Time

By exploring objects through touching/comparing them, children begin to understand the difference in attributes and application. To construct the meaning of time, children learn by applying concepts of time to real life situations.

- Identifies and differentiates between two and three-dimensional shapes
- Uses the attributes of shapes to distinguish between shapes
- Anticipates routines by using vocabulary to identify and sequence events in that routine
- Distinguishes between big and little, sizes, and weights

### Computation

Adults help children compare quantities and understand math words such as more, less, smaller than, bigger than, and different than. These words help children describe the size and shape of objects and the relationships of objects to one another.

- Manipulates objects to match or create sets
- Makes a set of objects smaller or larger
- Follows models of addition or subtraction with objects

### Practices at Home

- Estimation: "How many crackers do you think I gave you?" "15." "Okay, let's count and see how close you were." As you count together, point to each cracker.
- Give your child 3 of any object/snack and yourself 2, then ask, "How many more do you have than me?" then practice with a different number.
- Notice and point out patterns spotted in everyday activities.
- After measuring your child, have them guess how tall you are. Compare the heights by asking "Who is taller? Who is smaller?" Track measurements over time, ask your child what they notice.
- Count items in or on a car. "How many tires do you see?" "Four." "How many other things are there four of on a car?"
- Sort cereal by shape, size, or color. Make simple patterns with cereal or other items.
- Create an obstacle course using chairs, tables, pillows and anything else you have. Use words such as "over," "under," "through", and "around" to explain the route.
- Use bath time as time to explore volume by filling and emptying cups with water.