Flannel Board STEM

Idaho Commission for Libraries

Institute of Museum and Library Services

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Hello!

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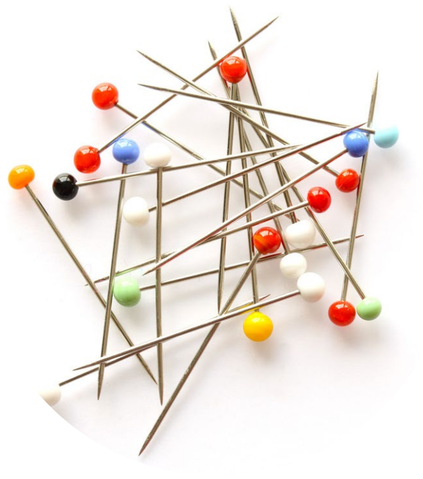
Idaho Commission for Libraries

Goals

What is Early STEM

You will develop an understanding of what STEM looks like in early childhood



Why Early Math

You will learn important early math concepts

STEM + Flannel Boards

You will develop strategies to integrate early STEM into flannel board activities

What is STEM?

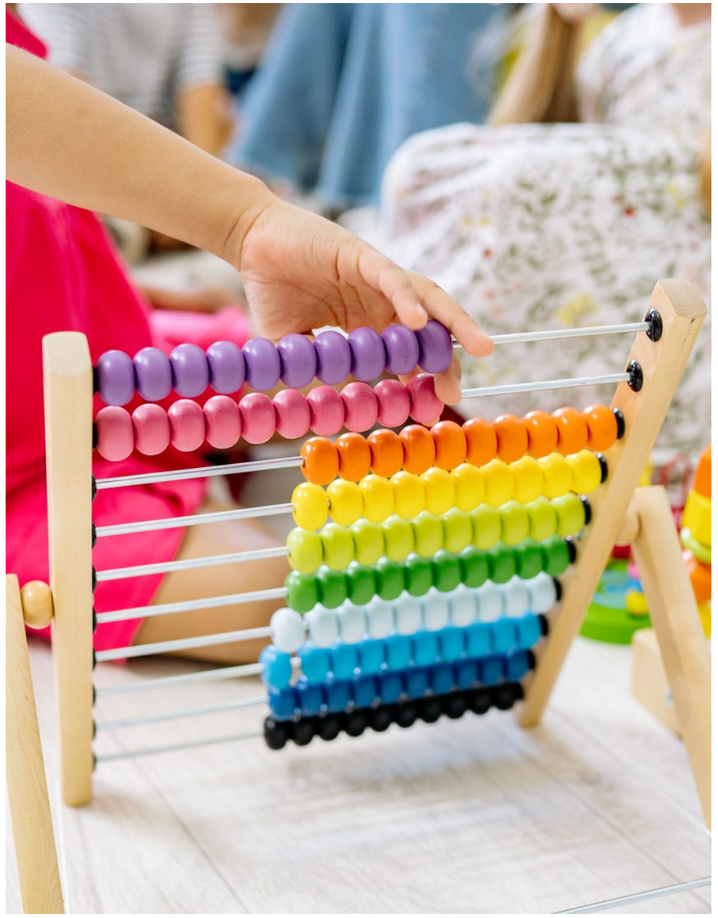
STEM in Early Childhood

Why STEM?

“Brain and skills -building experiences early in life are critical for child development, and high-quality early STEM experiences can support children’s growth across areas as diverse as executive function and literacy development.” STEM Starts Early - report from the Joan Ganz Cooney Center

Early Math

Math and logic learning are imperative to later success in school and life. A review of longitudinal studies on school readiness has found that early math skills, particularly an understanding of numbers, is a greater predictor of success than early reading skills.



STEM + Early Childhood

Basic Concepts

Shapes

Identifying shapes helps children understand properties of different objects.

Colors

Being able to recognize different colors is an important STEM skill and forms a foundation for mixing and blending colors and helps build background knowledge that is important for later literacy learning.

Identifying Objects

Understanding the name for different objects, like chairs, books, or tables, helps children build vocabulary and understand that objects can be defined, classified, and organized.

Comparisons

Understanding things that are alike and different, exploring opposites, and making comparisons.

Patterns

Infants begin to understand patterns and routines very early and toddlers build on this understanding to create and recognize patterns.

Sequences

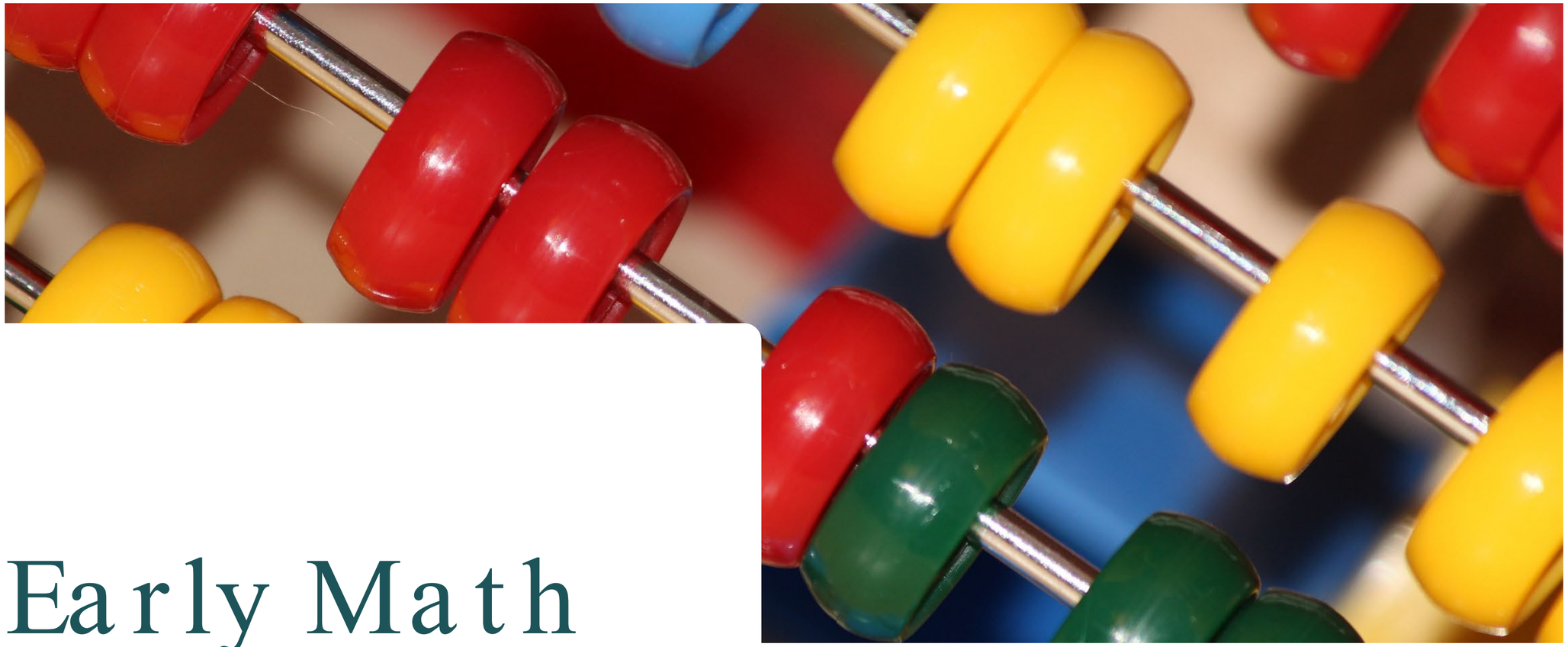
Preschoolers learn to follow rules, follow directions, and recognize sequences. All of these are basic STEM concepts that are foundational to processes like the Scientific Method.

Engineering

Understanding spatial relationships contributes to an understanding of engineering.

Logic & Problem Solving

Play games that use the process of elimination and deductive reasoning.



Early Math

Ordinality

Understanding that numbers represent a fixed amount. The number "1" means that there is one of something, the number "2" means that there are two of something, etc. Using fingers to count and having other tactile counting experiences helps children develop a deeper understanding of ordinality.

Subitization

Being able to recognize an amount within a grouping without counting. A good example of this is when you role a dice and get a "3", you understand that the amount on the dice is "3" without having to count all the dots.

Use STEM Language

- Let's count or How Many?
- Use spatial directions like above, under, or behind
- Ask about colors or patterns
- Use words like compare, equals, less than, more than

Resources

IDAHO STEM ACTION CENTER

Library ...tune in for storytime success

STEMIE INNOVATION FOR INCLUSION IN EARLY EDUCATION

DREME Development and Research in Early Mathematics Education

Erikson Institute Early Math Collaborative

flannel friday

BAD

Bay Area Discovery Museum

LEARN MORE

ICfL Niche Academy

- Storytime 101
- Early STEM
- Countdown to Coding

Thank you!

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