count · play · explore

DISCOVER THE POWER OF MATH

Early math activities for you and your child to enjoy together.

Babies Count - Point out quantities of one. "one stuffed animal, one circle..."

Toddlers Count - Talk about math when climbing stairs — "There are three steps. One, two three."

Preschoolers Count - Practice counting collections of objects. Make sure your child says one number for each object. When they are done counting, ask them how many objects there are. Do they know that the last number said is the number of objects?

Kindergarteners Count - Sort a set of dominos. Make three piles: dominos that are greater than 6, less than 6, and equal to 6. Then count each pile to see which has the most dominos. Domino pieces template: https://bit.ly/37Fc1p1.

Grade School Kids Count - Challenge your child to skip count by 2s, 5s, or 10s to 100. Make up a song to go with the skip counting sequence.

Babies Play - Blow bubbles for your baby. As baby reaches out to touch them, count the bubbles, talk about their shape, talk about how high or low the bubbles are flying.

Toddlers Play - Roll a soft ball to your child and encourage them to roll it back. See who rolls the ball the fastest, the slowest, the longest, and the shortest distance.

Preschoolers Play - Create an obstacle course by placing objects on the ground. Use position words like up, over, around, and beside to describe how to move around the obstacles without touching them.

Kindergarteners Play - Hide a toy. Make a map that leads to the hidden toy. Can somebody find the hidden toy using your map?

Grade School Kids Play - Make a map of your home or neighborhood. See if somebody else is able to find their way to a place you included on the map.

Babies Explore - Give your baby bowls and containers of different shapes and sizes. Let them explore which containers will fit inside of each other.

Toddlers Explore - Explore spatial relationships by using words like "above," "under," and "on." Use objects to demonstrate the meaning of these words. "The cup is on the table."

Preschoolers Explore - Explore what's outside a window. Look carefully at everything you see outside of the window. Look up, look down, look to the right, look to the left. Draw a picture of what you see.

Kindergarteners Explore - Ask your child to identify a triangle from among a group of shapes. Ask how they know it's a triangle. Does it matter how the triangle is turned? Does it matter if the triangle is wide or narrow? What makes a triangle a triangle?

Grade School Kids Explore - Explore what it means to make a drawing to scale. Then make a scale drawing of a room. What scale will you use?



STEM FAMILY ACTIVITIES

for independent learning



MOON GAZING



Activity:

1. Have you ever seen the moon during the day? Go outside during the day and see if you can find it. What did you notice? What do you wonder?

2. It's time to make moon observations. On a blank piece of paper, make a chart to keep track of the shape of the moon. (The shape of the moon is really just the part of the moon that is illuminated by the sun.)

Make observations every night for 4 weeks and draw what you see in your data chart. If you don't see the moon at night, you might have to find the moon during the day!

3. What patterns did you notice as you observed the shape of the moon over the last 4 weeks? Why do you think the amount of moon that is illuminated changes over time? Hint: The moon travels around the Earth one time every 27 days.

4. The moon is almost 239,000 miles from the Earth! It takes a spacecraft about 3 days to reach the moon.

What do you think it would be like to travel to the moon? What would you see on the moon? What do you think the Earth would look like from the moon? What questions do you have about the moon?

Optional Technology Connections:

Watch the story based on the book "Papa, Please Get the Moon for Me" tinyurl.com/getthemoon

Print out a moon journal to keep track of your nightly observations. tinyurl.com/moonjournal2



Why does the moon look like it's changing shape? Find out more by watching this video: tinyurl.com/whyphases



Using paper and string, engineer a rocket ship to travel to the moon. For directions, go to tinuurl.com/engineer rocket



Optional: Go to this link to print a "STEM journal" to record your observations and questions.

tinyurl.com/STEMjournal10



fresno county
superintendent of schools

For more resources or support, contact

Jon Dueck, FCSS STEM Direction - jdueck@fcoe.org

or visit our website: stem.fcoe.org