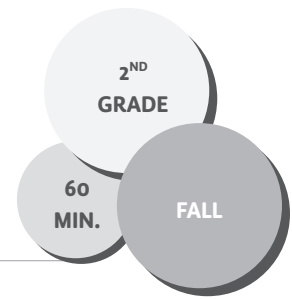


Plant a Rainbow

THEME: GROWING AND ACCESSING HEALTHY FOOD



ESSENTIAL QUESTION

Why are the foods we eat and the diversity in our garden important?

LEARNING OBJECTIVE

✓ Students will be able to sow and transplant crops.

LESSON DESCRIPTION

In this lesson, students hunt for the full spectrum of colors in the garden, create a fruit and veggie rainbow collage, and plant (in color groups) a rainbow garden bed to overwinter.

MATERIALS

- Colored chalk
- Dot stickers of each rainbow color (optional)
- Paint sample color strips (such as those found in a hardware store that sells paint), one for each student, with an equal distribution of red, orange, yellow, green, blue, purple
- Basket or bucket to hold paint chips (for random selection)
- Butcher paper
- Black permanent marker
- Magazines/seed catalogs
- Glue
- Scissors
- Plant markers
- Seeds or transplants to represent each color
- 5 garden trowels
- 5 watering cans
- Hose (to refill watering cans)

RAINBOW CROP SAMPLES

- **Red:** ruby red chard, red beets
- **Orange:** carrots, orange calendula flowers
- **Yellow:** golden beets, yellow calendula flowers
- **Green:** lettuce, cabbage, broccoli, kale, peas
- **Blue/Purple:** purple kohlrabi, borage flowers

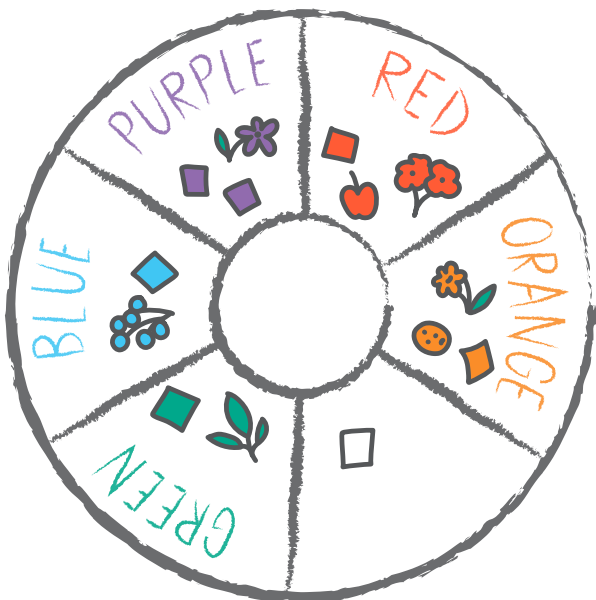
PREPARATION

- › Acquire paint samples from the hardware store.
- › Consult a local planting guide for your region, and determine what you'll be planting. In the fall, they'll either need a quick germination and maturity rate or be overwintering. Also, be sure your plants have similar growing requirements because they'll be planted close together.
- › Scout out a location in your garden to make your rainbow bed. You might want to pre-divide a raised bed into six sections, so it's a spectrum, or you might choose to make a rainbow arc. Either way, use labeled plant markers to make it clear to students where certain colors are meant to go.
- › Set up a station within sight of the garden bed in which students will work on a collage. If you have a shade structure, you might consider having students make their collage there.
- › Prepare a large piece of butcher paper with the outline of a rainbow in which students will create their collage during the lesson. Write the name of the color in each arc, so students will know which color images should go where.

- › Using chalk, draw a rainbow spectrum in a circle outside on the pavement where you will gather your class. If you don't have any paved space, make a sign for each color to set out on the ground. This is how you'll ultimately divide students into groups.

ACTION STEPS

1. Rainbow Hunt: Gather students in a circle and explain, *Today we'll be planting a rainbow in the garden, but first we're going to see how many different colors of the rainbow we can find already in our garden.* Show students your array of paint samples, and explain that each student will pick one at random and then try to find an exact match of that color from a plant in the garden. Demonstrate how to use two hands to pick the leaf, flower, or fruit that they find, and remind them to either ask before picking, or set a rule that they can only pick if there are least ten others growing. Share the callback strategy you'll use, and remind students to stay where you can see them. Have each student pick one paint sample at random, and let them know they'll have five minutes to hunt for a color match and bring it back to the circle. **(10 min.)**



2. Sharing: Call students back together, and have them place their plant on top of their paint sample in the space with their color on the ground. Once they're standing with their color group, explain, *This will be your group for the rest of the activity.* You might want to pass out dot stickers with their colors so students remember throughout the lesson, and you can easily keep track of who's in each group. Have students rotate clockwise around the circle to observe and admire each of the plant and paint sample matches their fellow classmates found. Ask, *What does this tell us about our garden?* **(10 min.)**

3. Explain the Activity: Say, *When we eat all different kinds and colors of fruits and vegetables, it's really good for us. It's a way to make sure we're getting all the different vitamins we need. It's also really good for our garden if we plant a variety of vegetables.* Show students the spectrum of seeds or transplants you've brought for them to plant, and review tool safety. **(5 min.)**

4. Making a Rainbow Collage: Explain that each group will take a turn to come up and plant, but while they're waiting for their turn, they'll be creating a rainbow collage of fruits and veggies. Show students the butcher paper you've prepared for their collage. Have students work on the collage according to their color group. **(25 min.)**

5. Planting by Color: Call up students by color. Demonstrate how to transplant the starts or sow the seeds that the group will be planting. Remind students to stay in the designated spot for their color and to be mindful of newly planted seeds and starts. Have students water their seed or plant and then send them back to work on the collage. **(5 min. for each group)**

REFLECTION

Have students discuss the following questions in small groups, then share with the class: (5 min.)

- What vegetables did we plant in our garden today?
- Why is it important to have a rainbow of colors in our garden? How about in our diets?
- Which vegetables or flowers are you most excited to harvest?
- Ask yourself: How did I stay safe when using tools and planting in the garden?



ADAPTATIONS

Literacy Extension: Read *Planting a Rainbow* by Lois Ehlert, and have students create their own book about the plants they planted in the activity.

ACADEMIC CONNECTIONS

Next Generation Science Standards, Life Science Disciplinary Core Idea

NGSS.LS4.D

Biodiversity and Humans

There are many different kinds of living things in any area, and they exist in different places on land and in water.

