AMAZING EARTH - 1ST GRADE - TREE ACTIVITIES

FIRST: Rainbow Roots

- **When**: Activity occurs during the presentation.
- **Where:** Inside the classroom, with students staying on the carpet
- **Who**: Adult helpers with students observing.
- **Prep**: Adult helpers find a spot in the classroom where the project can be done and stay for the duration of the class. (If in the second art room, the teacher desk at the front works.) Reaction will not happen immediately, but you should start to see results by the end of class.

Materials

- 2 paper towels
- 3 cups
- 2 different colors of food dye (blue and yellow)
- water (from the classroom sink)
- 2 spoons to stir

Directions

1. Diagonally roll 2 paper towels (2 sheets each) so that each becomes a long tight tube.
2. Fill 2 of the 3 glasses with water - approx ¾ of the way full. Leave the 3rd cup empty.
3. Twist the 2 paper towels together on one end leaving the other ends loose. It will look like the letter Y.
4. Place the 3 glasses side by side with empty glass in the middle in a spot where they can stay.
5. Add equal amounts (4 drops) of food coloring to each glass of water and stir.
6. When ready to show the class, the presenter will explain that the paper towels are like connected roots.
7. Place the twisted part of the paper towel into the middle empty glass.
8. Place one paper towel loose end into one of the colors.
9. Place the other paper towel loose end into the other color.





SECOND: Leaf Rubbings

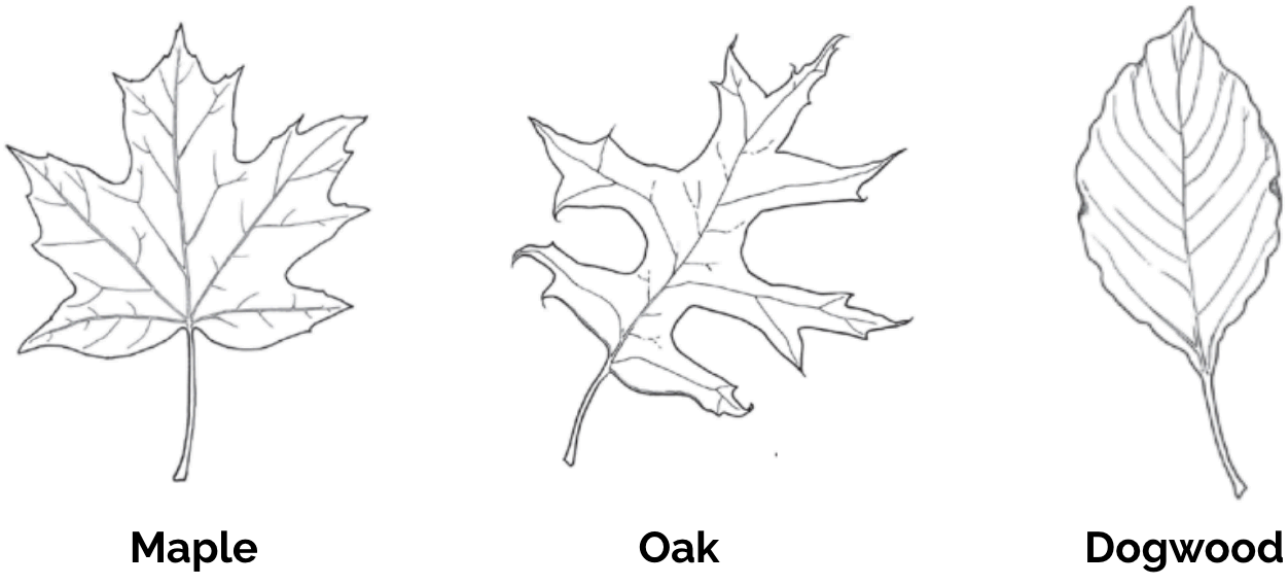
- **When**: After the roots experiment is done and the measuring experiment directions are read.
- **Where:** Inside the classroom, with students at their table spots.
- **Who**: Students
- **Prep**: Adult helpers place 1 Maple, 1 Oak, and 1 Dogwood leaf, as well as a copy of the "Identify by Leaves" worksheet, and an unwrapped crayon at each student's table spot during the presentation, while the students are seated on the carpet. You can do this as soon as they move to the carpet / when the presentation begins.

Materials

- Maple leaves
- Oak leaves
- Dogwood leaves
- Unwrapped crayons
- "Identify by Leaves" worksheet

Directions

1. During the presentation, adult helpers should place one Maple, Oak, and Dogwood leaf at each student's table spot. Also, place an unwrapped crayon and "Identify by Leaves" worksheet at each table spot.
2. During the leaf experiment slide, students will be asked to go back to their table spots.
3. Students will observe the leaves and compare and contrast the physical characteristics of the leaves.
4. Help the students do a leaf rubbing of each leaf. The students will:
    - ○ Have the blank boxes side of the sheet facing up.
    - ○ Place the leaves under the sheet - all three can be done at once or one at a time.
    - ○ Hold the crayon on its side and rub on the paper, over the leaves.
    - ○ Make sure they rub over the entire leaf.



THIRD: Measuring a Tree

- **When**: First outside activity
- **Where:** The front of the school
- **Who**: Three student volunteers
- **Prep**: Adult should bring the tape measure outside

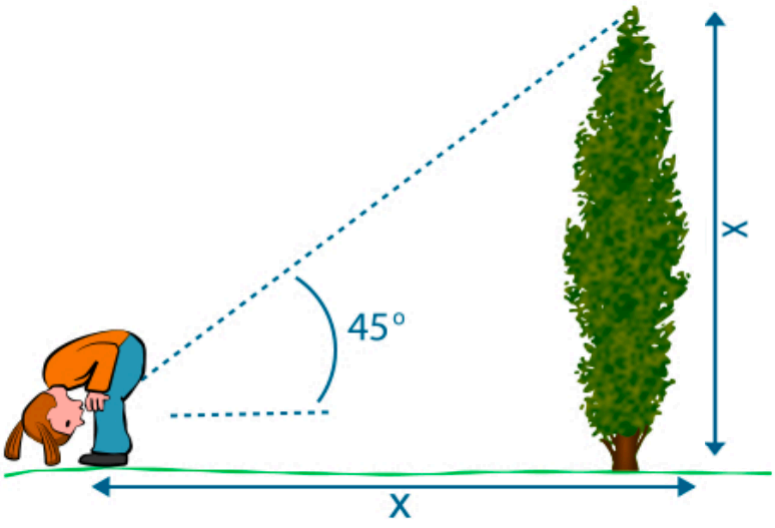
Materials

- Tape Measure

Directions

1. ASK: the students to guess how tall the tree is.
   [Let the students answer]
2. ASK: for three volunteers and explain that they are going to measure the tree height by using their whole body!
3. Have the **first volunteer** student stand far enough away from the tree that when they bend over and look between their legs, they can see the top of the tree. (*approximately where the pumpkin is in the photo*)
4. Have the **second volunteer** hold the tape measure at the base of the tree.
5. Have the **third volunteer** walk to the upside down student to measure the distance from the student's heels to the base of the tree.
6. NOTE: Tell the students this is the approximate tree height, and not exact.
7. Let the students take turns doing the experiment.
8. ASK: Ask the students if this tree is tall?
   [Let the students answer]





FOURTH: A Tree for Me

- **When**: Second outside activity
- **Where:** The front of the school
- **Who**: All students
- **Prep**: Make sure students bring clipboards, worksheets, and pencils when you go outside.

Materials

- A Tree for Me and Identify by Leaves worksheets
- Pencils
- Clipboards (if classroom has them)
- Plastic bag of Maple leaves (in case the maple tree's leaves have all dropped)

Directions

1. Walk the students as a group to three different trees (Maple, Oak, Dogwood - *see below*)
2. ASK the students if the tree is deciduous or evergreen
   [Let the students answer and ask what they observe that tells them this]
3. ASK the students to ID the tree based on the leaves on the ground and on the tree branches
   - NOTE: If the Maple tree's leaves have fully dropped, use the plastic bag of leaves and explain they came from the tree last week.
4. ASK the students to share what else they notice about the tree.
   - ASK "Touch and feel the bark. Remember, bark protects the tree, we should be gentle.
5. After three trees have been ID'ed, ASK students to each pick their favorite and fill out the worksheet for their tree.
   - READ each part of the worksheet.
6. Before going back in, ask the students if they can find an evergreen.



Oak by the Rock Garden



Maple by the front door



Dogwood near Kiss & Ride