

Erica Marlaine

Lesson Unit Title: Trees / Matching Leaves

Target Grade Level: Pre-K (Special Education)

Class/Content Areas: Science, Language Arts, Math, Visual Art, and Social-Emotional Development

Time Allotment: One hour

Standards: (All are from the California Preschool Learning Foundations)

- Science: Properties and Characteristics of Living Things Identify 1.1: Identify characteristics of a variety of animals and plants, including appearance (inside and outside) and behavior, and begin to categorize them.
- Science: Observation and Investigation: 1.0: Demonstrate curiosity and an increased ability to raise questions about objects and events in their environment.
- Language and Literacy – Listening and Speaking Foundation 2.2: (Vocabulary) Understand and use accepted words for categories of objects encountered and used frequently in everyday life.
- English Language Development – Reading Foundation 6.1: (Children Demonstrate Phonological Awareness) Listen attentively and begin to participate in simple songs, poems, and finger plays in the home language or in English.
- Develop Skills in Visual Art 2.6: Demonstrate increasing coordination and motor control when working with visual arts tools.

- Math: Algebra and Functions: 1.5: Understand, when counting, that the number name of the last object counted represents the total number of objects in the group.
- Math: Measurement: 1.0: Children expand their understanding of comparing, ordering, and measuring objects.
- Math: Algebra and Functions: 1.0: Children begin to sort and classify objects in their everyday environment.
- Social-Emotional Development 3.1: Participate positively and cooperatively as group members.
- Physical Development: Manipulative Skills 3.2: Begin to show fine motor manipulative skills using hands and arms such as in-hand manipulation, writing, cutting, and dressing.

Abstract: Students will compare and contrast the leaves of several different trees.

Objective: Students will be able to sort through leaves and based on a number of characteristics (size, color, and shape) find ones that match. Then they will count how many leaves are on their paper.

Background information: Students will collect leaves that have fallen off trees around the school. They will observe them under the microscope, and discuss how they are alike and different.

Materials:

- Leaves
- Prepared chart with 4 different types of leaves glued onto the left side of a chart.
- Glue

Instructional Procedure:

Introduction: Do a chart about tree parts with the class. Label and discuss the terms leaves, twigs, branches, trunk, bark and roots. Sing the song and act out “Leaves, Branches, Trunk and Roots” sung to the tune of Head, Shoulder, Knees and Toes.

Activities: Review matching, which is finding the “mate” or copy of an item. Give each student a chart with 4 leaves glued on, and the box of leaves for them to find the matching ones. For those who need more assistance, hand them two leaves and ask them to pick which is the matching leaf. Then allow them to glue each leaf on the chart, providing assistance as needed. Finally they will count, with assistance if necessary, the total number of leaves on their chart. I will use preferred items (glue!) songs, visuals, direct and open-ended questions, praise, small groups, language models and language expansion. To help them develop social interaction, I will have them share the large box of leaves with a small group member. This will also help with their development of language and communication as they navigate sharing the item. Key vocabulary words will be leaf, leaves, branch, twig, veins, shiny, smooth, rough, rounded, pointy, and skinny.

- **Closure:** Review chart they made of matching leaves. Have them discuss how the leaves differ and what they have in common. See what additional questions they have.

Check for Understanding/Assessment: Understanding will be assessed through the use of small groups and a review of their projects. I will keep data on who can differentiate and find the matching leaves, who can attach the leaves in the correct spot on the chart, and who can manipulate the leaves and the glue bottle. Using the guidelines of Universal Design for

Learning, I will differentiate for individual children by using a variety of methods to teach the same concepts and to engage them. For example, I will use my voice, ASL, real leaves, and laminated tree pictures when possible. I will also be using preferred items (leaves and glue) and will use music, movement, and art. In addition, I will provide a variety of ways for them to express themselves and participate. The varied expressive opportunities that they are provided will then provide me with multiple ways to check for understanding. I will provide verbal ways for them to participate (talking about the leaves and why they chose the one they did) as well as non-verbal ways for those who are pre-verbal, such as creating the chart (visual art) and music/movement during the introductory song.