

LESSON: TREE LIFE CYCLE



Grade Level: 2nd through 3rd grade

2-LS2-1. Plan and conduct an investigation to determine if plants need sunlight and water to grow.

3-LS4-4 Biological Evolution: Unity and Diversity; Make a claim about the merit of a solution to a problem caused when the environment changes and the types of plants and animals that live there may change.

INTRODUCTION

The Inland Empire Resource Conservation District's Growing Native classroom presentation was developed to instill in students that trees are necessary for our survival and how native plants are critical to our environment. This activity is being provided to increase student awareness of the area around us, teach a sense of responsibility for the environment and encourages development of this knowledge in a free-form, group exercise. The suite of concepts and vocabulary covered will depend on the length of activity facilitated by the participating teacher, but at any length should increase student preparation for IERCD program participation. It would also be suitable for post-program facilitation, to reinforce concepts and vocabulary covered during the program for maximum content retention.

OBJECTIVE

The students will understand the life cycle of trees and the impact they have on our environment.

SUMMARY

In this activity, students will discover that trees have a life cycle that is similar to that of other living things, including humans.

MATERIALS

- Photos from below.

BACKGROUND

As with all living things, trees have a life cycle that includes birth, growth, injury, disease, aging, and death. Because trees are renewable, the cycle begins again either artificially through planting or naturally with regeneration of new seeds. For the life cycle to run full circle, external and internal conditions must be favorable for the tree. This includes adequate space, water, nutrients, and sunlight for the individual species. The tree's chances of growth and survival through a complete cycle greatly improve with these conditions.

SKILLS

- Critical thinking
 - Collaboration
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DIRECTIONS

Below you will find a series of pictures identifying the different stages of a tree's life.

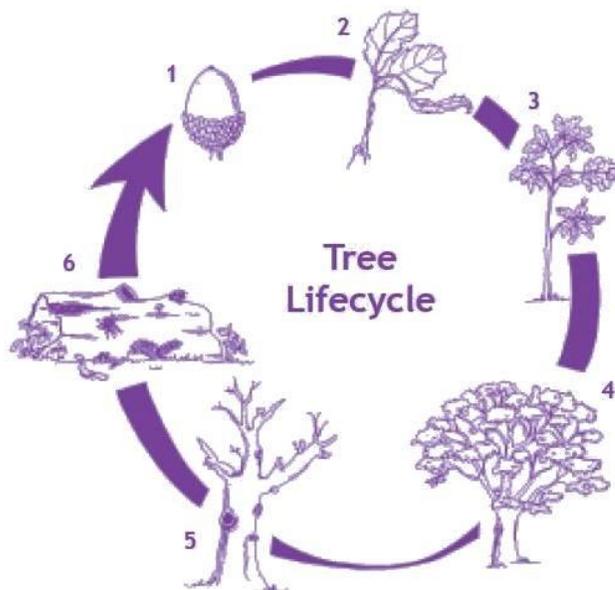
1. Print out the photos and cut them out.
2. Ask students questions about trees.
 - Are trees alive? How do you know?
 - How are trees born? Can a tree get sick?
 - Do they die? How does a tree's life compare to the life of a person?
 - Do trees need water and food? Can we help trees?

3. Ask students to identify the various stages of a tree's life from the pictures below.

Can you find:

- A sprout?
- A young tree?
- An adult tree?
- An elderly tree?
- A dead tree?

4. Have students match up the tree lifecycle images with their correct name using the numbers provided in the image.



____ Mature Tree

____ Seed

____ Snag (Dead Tree)

____ Sprout

____ Rotting Log

____ Sapling

The next time you are in the presence of trees observe the different stages that are present on the individual tree.



Seed



Sprout-germination



Sapling



Young tree



Mature tree



Snag-Dead tree

EXTENSION

- A. Have students bring in a seed, leaf, or twig from a tree in their neighborhood to share with the class. Ask them to explain why they choose from that tree. (Ex: A good climbing tree, was from my own yard, I liked the color of the seed-leaf.)
- B. Have students act out the lifecycle of a tree. They can curl up like a seed, kneel to sprout, stick arms out like branches, wiggle fingers for leaves, stand up to grow tall, spread feet to show roots, and fall over to represent a log.

www.forestfoundation.org/family-activities-in-nature

Project Learning Tree www.plt.org/connecting-kids-to-nature-family-activities