

What is a Tree?

Objective:

- To identify the characteristics of a tree.
- To understand the roles that trees have in an ecosystem.
- To learn about various trees.

Materials:

- Container of galls
- Container of acorns
- Rose pine cone
- Galls attached to stick
- Pine cone seeds in a bag
- 4 – grain cuts of wood
- 4 – wood pie shaped cuts
- Manzanita cuts of branch
- Ponderosa pine cone
- Open pine cone
- 3 - Leave ID on a ring
- What's a tree? Poster
- Deciduous Tree Sheet
- Evergreen Tree Sheet
- Mini posters: flowers & trees
- Mini poster: leaves
- Mini poster: mushrooms
- Mini poster: edible vegetation

Engagement:

1. Introduce yourself and the volunteers.
2. Introduce today's program.
3. Ask, "What does the word 'tree' mean to you?"

A tree has the following characteristics:

- 1) A woody plant
- 2) Main trunk
- 3) Branches
- 4) Leaves
- 5) Roots

Part of the Tree and their function:

1. Roots
 - Anchor tree
 - Water intake
 - Storage area
 - Roots move water and nutrients from the soil to the trunk, branches and leaves.

2. Trunk

- Supports branches and leaves.
- Moves water and nutrients to branches and leaves.
- Moves sugars and "food" to other branches and roots.
- Storage area for energy reserves.
- Outer bark protects inner lining bark and sapwood from damage, diseases, decay, and insects.

3. Branches

- Support leaves
- Water intake
- Storage area for energy reserves
- Move water and nutrients to leaves
- Moves sugars and "food" to other branches, stems, and roots.

4. Leaves

- Go through the process of photosynthesis
- Veins move water and nutrients.
- Leaves move sugar and "food" to branches, stems, and roots.

Types of trees:

- 1) Deciduous Trees – trees that lose all their leaves in the winter, becoming completely bare.
 - Example: Pine, Eucalyptus, Fir, Juniper, Spruce, and Hemlock
- 2) Evergreen Trees – trees that have leaves throughout the year.
 - Example: Maple, Birch, Aspen, Oak, Poplar and Beech

Life Cycle of a Tree: Seed → Sprout → Sapling → Mature tree

Types of products made from Trees:

- 1) Wood products
 - Fuel – wood & charcoal
 - Lumber
 - Furniture
 - Plywood
- 2) Paper products
 - Books
 - Magazines
 - Toilet paper
 - Newspaper

3) Food products

- Fruits: apples, bananas, oranges
- Nuts: pine, walnuts, pecans
- Spices: bay leaves, nutmeg
- Cider
- Sugar/syrup

4) Other products

- Carpeting
- Soap
- Rubber products
- Waxes
- Crayons
- Chewing gum

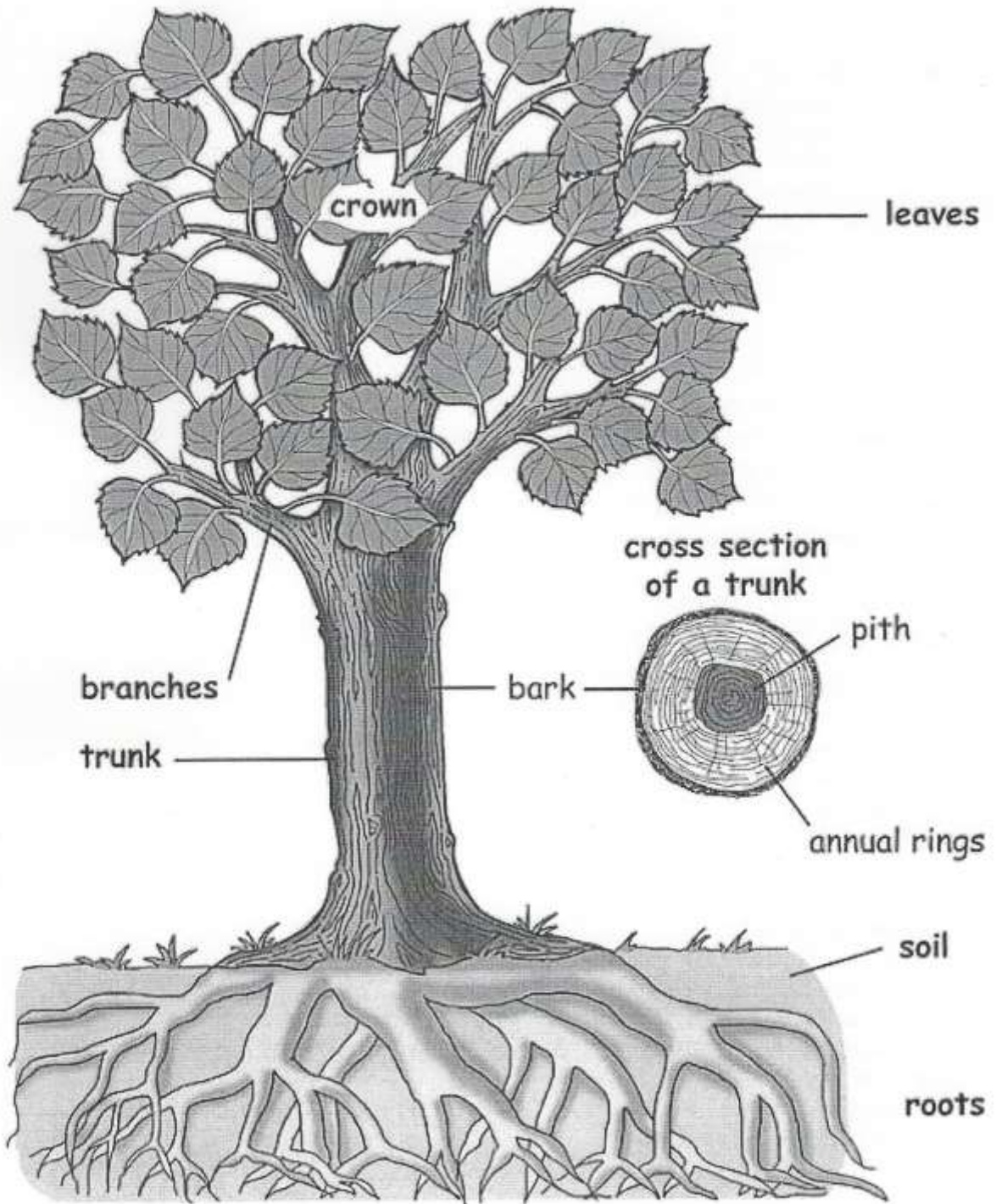
Tree Functions:

- Provide wood for building and pulp for making paper.
- Provide habitats (homes) for all sorts of insects, birds and other animals.
- Provide many types of fruits and nuts as a source of food.
- Provides sap which is useful as food for insect and people.
- Keep our air clean and our ecosystem healthy.
- We breathe in oxygen and breathe out carbon dioxide. Trees breathe in carbon dioxide and breathe out oxygen.
- Trees provide shade and protection from the elements.

Types of Trees in the area:

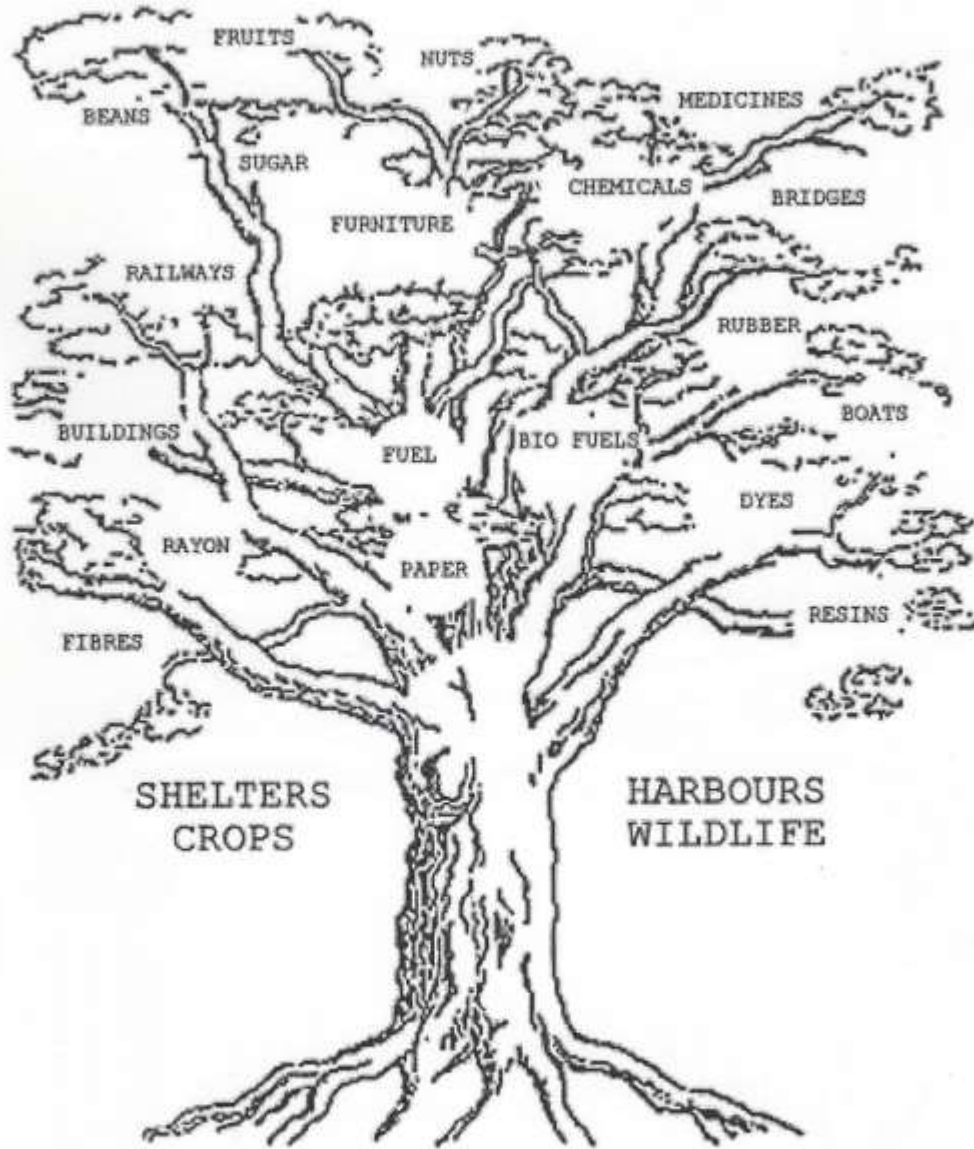
- Interior Live Oak
- Blue Oak
- Black Oak
- Valley Oak
- Canyon Live Oak
- Hemlock
- California Buckeye
- Madrone
- Fremont Cottonwood
- White Alder
- Chokecherry
- Grey Pine
- Incense Cedar
- Creek Dogwood

Parts of the Tree



A TREE

TAKES IN CO₂ TRANSPIRES GIVES OUT FOREST HEIGHT
WATER TO CLOUDS OXYGEN PROMOTES RAIN



FERTILISES
SOIL

CHECKS
EROSION

DRAINS
SWAMPS

SUCKS UP
MINERALS

