

# October nature activity kit


## Autumn Leaves

Your kit contains:

Trees of Ohio Field Guide  
Instructions & Materials to create a fall leaves placemat  
Fact Sheet: Why do leaves change color (reverse side!) →  
Leaf Stamper  
Stickers



**PARK  
DISTRICT**  
OF OTTAWA COUNTY



# Why do leaves change color?

In regions where it's not extremely hot or cold (called temperate regions), the forests are full of trees with a variety of leaves. Most of the year, these leaves are green because of the chlorophyll they use to absorb energy from sunlight during photosynthesis. The leaves convert the energy into sugars to feed the tree.

As the season changes to autumn, temperatures drop, and days get shorter. Trees get less direct sunlight, and the chlorophyll in the leaves breaks down. The lack of chlorophyll reveals yellow and orange pigments that were already in the leaves but masked during the warmer months. Darker red leaves are the result of a chemical change: Sugars that can get trapped in the leaves produce new pigments (called anthocyanins) that weren't part of the leaf in the growing season. Some trees, like oaks and dogwoods, are likely to produce red leaves.

Trees start building a protective seal between leaves and their branches as the weather turns. They take in as many nutrients as possible from the leaves, but leaves wouldn't survive the winter and would make trees vulnerable to damage if they remained. When the leaves are cut off from the fluid in the branches, they separate and drop to the ground.

Trees that drop their leaves in autumn are called deciduous trees. Oaks, elms, ash, and beeches are a few of the deciduous trees that can grow in temperate forests found in Ohio.

*Source: Smithsonian*







# Autumn Leaves Placemat


Provided Materials: Brown cardstock, two pieces of wax paper, stamper, stickers

Needed Materials: Collection of colorful leaves, iron, permanent marker, tape or glue

## Directions:

Collect an assortment of vibrant leaves (Hint: Fresh, colorful leaves that are still on trees work best. Leaves on the ground tend to be too dry and crunchy for this craft.)

Arrange your leaves between the two sheets of provided wax paper. Gently place a cotton t-shirt on top. Using the "cotton" setting on an iron, slowly run the warm iron over the t-shirt to melt the wax and seal the two layers together, ensuring you cover every corner. This may take a few minutes!



Unplug iron and let placemat cool. Using your new Trees of Ohio Field Guide, identify your leaves, writing on the wax paper with a permanent marker. Tape or glue the provided brown cardstock to the cooled placemat. Decorate with stickers and stamper.

Enjoy your new autumn leaves placemat!