



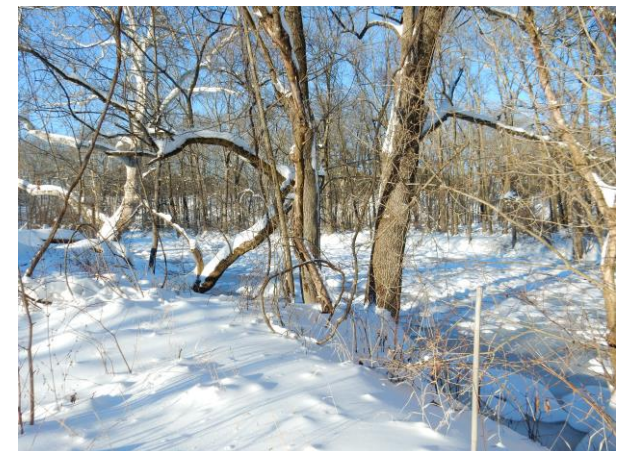
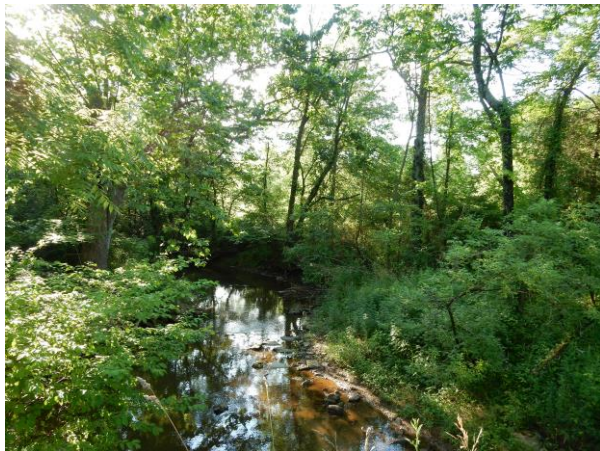
Forest and Woods Habitats



The wooded areas of Windy Acres are characterized predominately by broad leaf trees that lose their leaves in the winter. This type of forest or woodland is considered a “temperate deciduous forest”.

The temperate deciduous forest is a biome that is always changing. It has four distinct seasons: winter, spring, summer and fall. Winters are cold and summers are warm. Temperate deciduous forests get between 30 and 60 inches of precipitation a year. Precipitation in this biome happens year round. Because the soil is very fertile and hardwood trees are good for building, this biome has some of the world's largest population centers in it.

The leaves of deciduous trees change color and fall off in the autumn and grow back in the spring. The broad, flat leaves of deciduous trees lose water quickly. In the winter when the ground is frozen, it is difficult for them to absorb water, so they drop their leaves! Deciduous trees stay dormant in the winter and bloom again in the spring. (Nature Works PBS)



Windy Acres does not have a “big forest” area, but rather woody areas with some big ,older trees, and younger trees of various sizes and ages. There are many types of trees at Windy Acres; oaks, tulip poplars, maples, walnut, hickory, sycamore,(see complete list in the Trees section). Many of these trees produce nuts and /or berries which in turn provide food for the wildlife that live there. Shrubs, plants and wildflowers make up the lower story of the forest habitat.



The forested areas at Windy Acres can be easily seen in this aerial map.

There are some old field areas where invasive tree species have taken hold. The most obvious is the Autumn Olive tree. This tree, however, with its dense branches and berries, provides habitat for many species of birds.



All the native trees that have been found to date are second or third growth trees. This mix of flora provides a great habitat for a wide variety of animals. Large animals such as bear and deer live in the woods, as well as smaller species like racoons, squirrels ,voles, and bats. Owls , hawks and eagles live in and use the tall trees for hunting and nesting.



Many reptiles and amphibians also live in the woods areas. Salamanders, slugs, and toads are commonly found in the forest floors. Woods and forests are also home to a wide variety of insects and spiders.

Additional information on Forest habitats can be found by clicking on the following links:

<https://www.thoughtco.com/land-biomes-temperate-forests-373499>

<http://www.nhptv.org/natureworks/nwep8c.htm/redfox.htm>

<https://www.exploringnature.org/db/view/New-Jersey-Habitats-Mammals-Birds-Amphibians-Reptiles>

Challenges to preserving and protecting woods and forests habitats

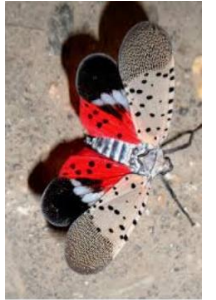
There are many challenges to preserving the temporal forests across the United States. These include development, mining, climate change, vandalism and invasive species. Here, at Windy Acres, we are lucky to have the whole Windy Acres tract as part of the Clinton Township Open Space program. That means that it can never be commercially developed. It is protected now and will be for generations to come.

Invasive Species



There are, however, threats to the forest and woods habitat at Windy Acres and everywhere else, too. Trees are especially vulnerable to invasive species. A current example is the Emerald Ash Borer. This invasive species kills ash trees. Look around, most of the tall dead trees you see are ash trees killed by this invasive pest. Another example is the Spotted Lantern Fly, these pests kill maples, birch and walnut trees as well as grapes and hops plants. As the trees and plants die, the living organisms that depend on them for their habitat will be impacted.

There are invasive trees and plants that pose a threat, too. These plants are aggressive growers with no natural predators. They force out native species by effectively competing for sunlight and space.



Spotted Lantern Fly



Autumn Olive

Click on the links below for more information on invasive species:

NJDEP

<https://www.nj.gov/dep/njisc/Factsheets/>



<https://www.nature.org/en-us/about-us/where-we-work/united-states/indiana/stories-in-indiana/autumn-olive/>

Native Plant society Of NJ

http://www.npsnj.org/articles/invasive_plant_species.html

Climate Change

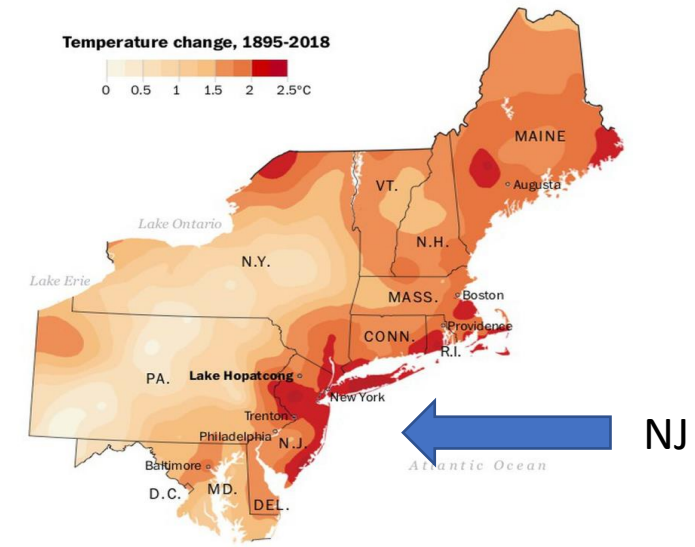
Climate change will also impact the forest habitat at Windy Acres. Scientific data shows that the climate is generally warming world-wide. New Jersey has emerged as a top state in the nation experiencing climate change, according to a new analysis of climate data by The Washington Post (2019). New Jersey heated by nearly 2 degrees Celsius, or 3.6 degrees Fahrenheit, since about the turn of the last century. That's double the average for the continental United States.

Warming temperatures, periods of drought and periods of heavy rain will impact the habitats of all living creatures. The continued increase in the use of fossil fuels is one of the primary reasons. No one knows exactly what the impact to the flora and fauna in New Jersey will be. It is expected that some native tree species will lose their habitat due to rising temperatures and other impacts of climate change. Some southern species may move in to replace those needing colder temperatures.



Humans

The biggest threats to the habitats at Windy Acres are caused by humans. Humans are the primary cause of climate change. Humans bring in invasive species, vandalize and cause damage to habitats and humans often don't uphold their end of bargain to protect wildlife. Right now Windy Acres is under the NJ Open Space program. Plans have been made for passive recreation. But that could change if future generations don't honor the protections extended by the NJ Open Space covenants.



Temperature changes along the Northeast between 1895 and 2018.

Extreme climate change has arrived in N.J. Why we're at center of national trend. By [The Washington Post](#), By Steven Mufson, Chris Mooney, Juliet Eilperin and John Muyskens