Caring For Evanston’s Urban Forest

On hot summer days, Evanstonians feel more appreciative than usual of the community’s rich urban forest. Trees shade Evanston homes from the summer sun, provide a leafy canopy over families out for a walk, shelter parked cars, and cool the air through evapotranspiration.

Less noticeable are some of the other benefits of trees. They capture and store carbon, helping to slow the build-up of global warming pollution in the atmosphere. They remove air pollutants and improve air quality. They reduce stormwater runoff, provide important habitat for birds and other wildlife, add beauty, improve health, and increase property values.

Use the National Tree Benefit Calculator to estimate the value of some of the economic and ecological benefits of one of the trees on your property. Find out how much stormwater runoff it intercepts each year, how many pounds of CO2 it sequesters, and the air quality benefits and energy savings it provides.

Maintaining This Valuable Resource

According to City forestry officials, there are some 33,000 trees on public land in Evanston — and twice that many on private property. But this valuable urban forest is under intense pressure. The changing climate is bringing hotter, drier summers and more frequent heavy storms with damaging high winds. Exotic invasive insects and diseases — such as Dutch elm disease and, more recently, the emerald ash borer — pose additional threats.

Evanston’s urban forest needs proper care if it is to survive and thrive under these challenging conditions. You can help by caring for the trees in your own yard and on your parkway. Here are three important tree-care best practices.

• Water, especially during hot, dry periods. Trees need 15-25 gallons of water every week in spring, summer, and fall. The actual amount required depends on local site conditions, but trees need to be watered if natural rainfall is less than one inch per week. One method is to let a hose run slowly for 30 minutes within the “dripline” of the tree, the area under the tree’s outermost branches. The aim is to water deeply rather than frequently so the water can reach the tree’s roots.

• Mulch, but avoid mulch “volcanoes.” Mulch holds moisture, discourages weeds, and keeps tree roots cool in summer. A 3-to-4-inch layer of wood chips or hardwood mulch in a 3-foot wide area around the base of the tree is ideal, but the mulch should be kept away from the trunk. Free wood chips are available at James Park. Note that turf grass is not a substitute for mulch as it will compete with the tree for moisture and nutrients.

• Protect the bark. Lawn mowers, weed whackers, car doors, and bicycle locks can all damage a tree’s bark. “Lawnmower blight” is a leading cause of tree death in urban settings. Mulching can help keep mowers away.
Expanding and Enhancing Evanston’s Urban Forest
Evanston has lost thousands of public and private trees in recent years due to invasive insects and disease as well as storm damage. You can help remedy this loss and even expand the City's important tree canopy.

**Plant new trees.** If you have lost a tree on your property or have some other suitable space in your yard, consider planting one or more new trees.

- **Choose trees that are longer-lived, native, and likely to thrive.** In view of the changing climate, trees suitable for this area will be those that are tolerant of warmer weather and drier conditions and resistant to invasive insect pests and diseases. A slow-growing tree will generally live longer than a fast-growing species and thus store carbon longer. A slow-growing tree also will often have deeper roots, making it more drought resistant. Oaks and elms are particularly important for foraging migrant birds.

  The Chicago Botanic Garden has a list of [Illinois Best Plants](https://www.chicagobotanic.org/PlantCollection/BestPlants), and the Morton Arboretum has detailed information about [Native Trees of the Midwest for the Home Landscape](https://www.mortonarb.org/plants/). Evanston's Forestry Division has an “approved species list” for parkway planting that is also helpful in selecting trees for private property. The City's list was developed with an eye to improving species diversity so that no single species will represent more than 10 percent of Evanston's street tree population. This will help to minimize the incidence of species-specific infestations.

- **Choose location with care.** Consider the tree’s needs (e.g., soil type, moisture, and sun requirements) and future size (so it won’t interfere with power lines or grow too close to a building). Be sure there is enough room for the tree’s roots to thrive. Place trees where they will protect your home from winter wind and summer sun.

- **Follow planting guidelines.** Help young trees get established by following good tree-planting practices, including digging a hole that is wide but not too deep. A good guide is the [Tree Owner's Manual](https://www.fs.fed.us/trees علمات) from the U.S. Forestry Service.

**Request a parkway tree.** If your parkway has space for a tree, contact the Forestry Division to see about putting your address on the list for a new tree.

**Contribute to Evanston’s Urban Reforestation Fund.** After severe storms destroyed many trees in 2011, the City established a reforestation fund to help maintain Evanston’s park and parkway trees. The fund is also helping to replace the many ash trees destroyed by the emerald ash borer. Donations may be made [online](http://www.cityofevanston.org/ForestryWebpage), and donors will be recognized on the main Forestry webpage.

**Remove invasive species.** Trees like buckthorn and shrubs like honeysuckle crowd out native species and make for a less resilient landscape. Removing them and replacing them with a variety of bird-friendly species not only improves your yard — it also keeps invasives from spreading aggressively into other areas. Find out more from the Chicago Botanic Garden.
Use salvage lumber. Keep carbon sequestered and save carbon emissions from long-distance shipping by helping to create a market for trees that are cut down in our region. One local supplier is Horigan Urban Forest Products. Find out more from Don’t Waste Wood.

Getting Involved
Sign up for an Openlands TreeKeepers class. Volunteer with Evanston TreeKeepers. For more information, contact treekeepers@greenerevanston.org. Make a donation to Evanston’s Urban Reforestation Fund.

Resources
Tree Care Resources
- The Climate-Friendly Gardener (Union of Concerned Scientists)
- Tree Care Tips (Openlands)
- Watering Trees and Shrubs (University of Illinois Extension)
- Mulching Trees and Shrubs (Morton Arboretum)
- Planting Pointers and Mulching Musts (Chicago Botanic Garden)
- Landscaping for Energy Efficiency (National Renewable Energy Laboratory)
- Migrant Bird Habitat Study (Chicago Wilderness Habitat Project, 2004)

Trees and Climate Change
- Forest and Grassland Carbon in North America (Climate Change Resource Center)
- Mitigation of Climate Change: Forestry (Intergovernmental Panel on Climate Change, 2007)
- A Tale of Four Cities: Exotic and Invasive Pest Analysis and Issue Characterization (Davey Resource Group, 2010)

Benefits of Trees
- Assessing urban forest effects and values, Chicago’s urban forest (U.S. Forest Service, 2010)
- Landscaping reduces heating and cooling costs (U.S. Department of Energy)
- Trees and vegetation reduces urban heat islands (U.S. EOA)
- The Effects of Urban Trees on Air Quality (U.S. Forest Service, 2002)