New Hampshire's Annual Urban & Community Trees E-letter

Issue 2

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Inside this issue:

Lebanon Celebrates Arbor Day Urban Forest Health Urban Wood Utilization	3
	3

Community Highlight Nashua Parks and Recreation

Nashua Parks and Recreation Superintendent, Nick Caggiano, Nashua city Administrators and residents have been on a real green streak in the past couple of years.

I recently visited Nashua, a long standing <u>Tree City</u> <u>USA</u> Award recipient who has some amazing new parks worth highlighting.

Starting on Main Street in the downtown area, we visited the "Rotary Common" that contains a labyrinth as its focal point on the north side of Salmon Brook. Walking into the park is like entering an outdoor living area with

trees, benches, stone sculptures and beautiful landscape. It definitely is one



Nick Caggiano, Director of Parks and Recreation at Rotary Common in Nashua.

of those places that makes you want to spend some quality time outside, and of course walk the labyrinth.

South of Salmon Brook within the park is the <u>New</u> <u>Hampshire Holocaust Me-</u> morial an incredible tribute to the victims of the Holocaust.

As you enter the memorial you are walking a re-created rail road track to the center monuments, just like the victims themselves experienced corralled in trains on the way to one of six concentration camps. This is a very powerful and moving experience.

Lastly we visited the "Park Social at Labine" which was completed in 2012 in a former historic flat iron building. *Continued on pg. 2*

The use of a Tree Gator Bag can mean life or death for a newly planted tree

What To Do With Drought Stressed Trees

Hot and dry has been the theme that carried over into this summer. As of September, central and southern NH are experiencing severe to extreme drought, according to the US Drought Monitor.
Since April 1 central and southeastern NH has seen

deficits of 8 – 12" of rain. Northern NH has received more periodic rain keeping it out of the drought status, however some of those areas still did not receive enough rain and are classified as abnormally dry.

The drought condition

does stress trees in many ways.

For example urban trees began showing signs like scorched leaves as early as July.

Continued pg. 2.....



Park Social is located at 43 Pine Street in Nashua, NH

Nashua Continued from pg. 1......

The Park Social area offers a respite despite the adjacent busy streets.

Trees, perennials, picnic tables, benches, and sculptures invite people to enjoy the revitalized early 1900's industrial building site.

Many historic pieces of the building can be found around the park. Salvaged granite-etched



stones are utilized as a planter, old triangular manhole covers are imbedded in the walkway and star shaped industrial washers are used as decoration. This is a very unique place to take your lunch break, stop with the kids or just sit back and read a book. It was evident by the neat appearance and vigorous greenscapes that Nashua Parks and Recreation Department staff work hard at maintaining their parks.



Drought and trees continued from pg. 1

However, it's not to late to give trees some care before winter. Severe drought causes trees to shut down. Photosynthesis comes to a standstill because the tree is in survival mode- no transpiration means no carbohydrate production. Some trees started showing leaf

scorch midsummer, indicating they are severely stressed and many may drop their leaves altogether. This is the trees' survival mechanism and includes many other physiological changes. Severe droughts can cause tree mortality, especially recently planted trees or trees already stressed by

insects or pathogens.

Watering trees now will help them increase their chance of survival. A slow trickle is best around the root zone of the tree. This is accomplished with a hose moved around the base of the tree every 20 minutes or so. A soaker hose or a Tree Gator Bag or similar product also works well. Gator bags are essential for establishing new trees. One of the things we witness most often with new plantings is lack of watering for the first few years. Watering for this period of time allows for good root establishment, minimizes stress and reduces tree mortality.

How much water does a tree need? A good rule of thumb for small trees is 5 to 10 gallons of water for every inch in diameter at breast height weekly. The amount of water can vary depending on soil type. For large mature trees one inch of rain over the trees critical root zone (out to the drip line) is recommended.

There are other things to consider such as removing mulch that is too deep—not more than 3". Deep mulch can act as a water barrier impeding penetration and causes other problems.

During a drought DO NOT....

Fertilize— fertilizer salts can cause root damage and spur foliar growth that the trees damaged root system may not be able to maintain.

Prune— Pruning will further stress the tree as it is unable to send the needed resources to compartmentalize the wounds.



Leaf scorch on a red maple tree growing in limited soil volume

Issue 2 Page 3

Lebanon Celebrates Arbor Day



Photo credit: Lebanon Parks and Recreation

On April 29th the city of Lebanon celebrated Arbor Day at Colburn Park. The park sits in the center of the city with large majestic trees throughout. Lebanon's
Arbor Day
celebration
included a
12 year
recognition
in the Tree
City USA
Awards
program

Many of the trees in the park are 80-100 year old trees and some are in decline. The Parks and Recreation Department has been actively planning and planting young

trees as future replacements where needed in the park. This is an important aspect in maintaining a sustainable urban tree program.

It was a beautiful sunny day when Mayor Georgia A. Tuttle presented the Arbor Day Proclamation to the young attentive audience that had gathered.

The tree selected was a native Northern Red Oak tree. Red oak trees are fairly prevalent in New Hampshire and have large sprawling crowns at maturity. Oak has been selected as the US national tree by the Arbor Day Foundation. This tree will provide great shade once the crown has developed. Red oaks have great adaptability, making them suitable to many urban areas, but there is a need for sufficient root space.

Forest Health Issues of 2016

The biggest urban forest health issue for NH is drought.

Urban trees are most susceptible to drought conditions due to the harsh environment in which they grow. Drought can make trees susceptible to many insects and diseases. Even though dry conditions persist, fungi like <u>Armillaria</u> root rot sense the tree is stressed, initiating an aggres-

sive attack on the tree. Elms also become more susceptible to <u>Dutch</u> <u>Elm Disease</u> because stressed elm trees are more attractive to bark beetles (the vector for the fungus). Another fungus, <u>Verticillium wilt</u>, is able to invade the tree and because of the drought the tree is unable to protect itself.

Spider mites, bark beetles and borers become more attracted to drought stressed trees, attacking and further complicating the trees recovery. Often drought stress damage is not visible until years later.

Kyle Lombard, NH Division of Forests and Lands Forest Health Coordinator stated the most notable forest damage this year happened in the north country. Some sugar maple stands in the White Mountains were heavily impacted by the <u>forest tent caterpillar</u>. More forest health information can be found in the NH <u>forest health newsletter</u> published in December each year.

Urban Wood Utilization Pilot Program

Every NH community produces wood waste from tree removals due to storm damage, utility pruning, and tree mortality. According to <u>Utilizing Municipal Trees</u> in the United States over 200 million cubic yards of wood waste is generated each year. It is also estimated that over 3 billion board feet of lumber could have been utilized for a

higher value product. Urban trees are usually not accepted at local mills due to the high potential for metal or decayed wood. Countless higher value urban saw logs are processed into low value products such as mulch, or biomass fuel.

At the local level some urban wood could be utilized for



Ross Clair, Northeast Wood-Mizer dealer from Maine demonstrates how to properly saw a log with the LT 40 mill at the Urban Forestry Center.

Tree City USA Reminder and Application Information

Its nearing that time of year again for Tree City Awards Application submittal. The Arbor Day Foundation has an <u>online portal</u> that can be used for submitting applications.

Communities can elect to celebrate Arbor Day any day they wish, not just the state official date of the last Friday in April.

The Tree City USA program provides direction, assistance and national recognition for your community. It's the framework for a healthy, sustainable urban forestry program in your town. And the benefits are substantial.

Is your Community a Tree City USA Participant?

Not a Tree City USA? You can be, just click *here* and find out how. Universities and utility companies can also get involved with the <u>Tree Campus program</u> and <u>Tree Line program</u>.



Woodmizer urban wood utilization demonstrations Continued from Pg. 3

park benches, trail signs, bridges, sheds and small structures. The wide variety of urban tree species can limit the lumbers use. Some species such as black locust are decay resistant and can be utilized for outdoor projects. Lumber from softwood species can be used for garden beds but softer woods have limited outdoor lifespan.

The NH Urban and Community Forestry Program has partnered with <u>Wood-Mizer</u> facilitating the purchase of an LT 40 portable sawmill. Ross Clair, Wood

-Mizer dealer from Chesterville, Maine has worked with our program at past educational events demonstrating the utility of a portable saw mill. The fully hydraulic mill will be used at the Urban Forestry Center for demonstrations and training. Lumber produced will be used for benches along our trails and construction of a new storage shed.

As part of our urban wood utilization program, staff will assist NH communities to repurpose historically significant trees. Our initial project will be to mill the last large American Elm growing on Pierce Island in Portsmouth, NH. The tree died as a result of Dutch Elm Disease and was removed. The lumber will be utilized by the city. If you have a notable tree you plan to remove and want to repurpose please contact us. See our contact information below.



NH Urban Community Forestry Contact Information www.nhdfl.org

Department of Resources and Economic Development

AJ Dupere Urban Forester NH Division of Forests and Lands Urban Forestry Center 45 Elwyn Rd Portsmouth NH 03801 A.J.dupere@dred.nh.gov Scott Rolfe Community Forester NH Division of Forests and Lands 172 Pembroke Rd Concord NH 03301 Scott.Rolfe@dred.nh.gov

