Invasive Emerald Ash Borer Found in Pickering

Pickering, ON, April 12, 2012 – The Emerald Ash Borer (EAB), an invasive insect that attacks and kills only ash trees, has recently been detected in west Pickering.

While the City is taking steps to deal with the situation on municipal property, it warns that large ash trees on private property are also at risk. To mitigate the infestation, all Pickering homeowners who have ash trees are advised to look for signs of infestation such as "D" shaped exit holes on the tree trunk; signs of woodpecker damage; and/or thinning near the top or 'crown' of the tree.

See maps and identification images starting at page 3 of this document.

Ash tree characteristics:

- Opposite branch and bud arrangement Branches and buds grow directly across from each other and not staggered. Please note that the growth may be affected by pruning and death of a branch
- Compound leaves Leaves are compound and composed of 5 to 11 leaflets. Leaflets may be smooth or toothed.
- Bark On mature trees, the bark is tight with a distinct diamond-shaped pattern. On young trees bark is grey and relatively smooth.
- Seeds Ash tree seeds are dry and are contained in oar-shaped, flat keys that usually occur in clusters. Seeds typically hang on the tree until late fall or early winter.

Check out some helpful Ash Tree Identification tips from the Emerald Ash Borer University.

Need help identifying an Ash tree?

Search and download Leafsnap for free from your mobile app store. This mobile app uses visual recognition software to help identify tree species from photographs of their leaves.

EAB only attacks true ash trees. In Pickering, green and white ash are the most common ash species, with blue and black ash being rare. Mountain ash and prickly ash have "ash" in their name but are not from the same species and are not susceptible to EAB.

Signs of EAB

The following are signs and symptoms your ash tree may be infested with EAB:

- The leaves in the top third of the ash begin to die back.
- New branches begin to grow from the low trunk or roots.
- Under the bark there are white lines or canals. These larval feeding galleries are typically packed with sawdust and excrement.
- The bark on the tree begins to split.
- There are D-shaped exit holes formed by adult beetles exiting the tree.
- There is increased woodpecker activity that creates large holes in the tree.

EAB tunnels underneath the bark of ash trees and destroys its vascular system, killing the tree within five years of initial infestation. Unfortunately, signs of EAB usually only become apparent once a tree is heavily infested. Early symptoms of EAB include loss of green colour in the uppermost leaves and thinning of the crown.

Although your tree may have some signs of EAB infestation, other diseases/infestations may be affecting your trees growth. It is recommended you have a certified arborist inspect your tree before you begin treatment.

If EAB is detected early enough, or if the ash tree appears healthy, the tree may be treated with TreeAzin (a naturally occurring bio insecticide), which has shown to be effective in controlling EAB and keeping ash trees alive and healthy. If a tree is heavily infested (more than a third of the crown has died off), the City recommends removal for safety reasons and to prevent the continued EAB spread.

What do I do with my ash tree if it is infested?

The City recommends you remove any ash trees infected or apparently healthy with trunks under 20 centimetres (eight inches) in diameter and replace them with other species such as maple or oak. This trunk size is suggested because current treatment costs outweigh the benefit of removing and replanting smaller size trees. However, as the homeowner you make the final decision.

With larger, more mature trees you have two options:

- Larger, structurally sound ash trees can be treated with an insecticide called TreeAzin[™]. A list of
 qualified TreeAzin[™] service providers and their addresses can be found on the <u>BioForest</u> site.
 Please get more than one quote. You will likely need to retreat the tree every two years for 10 to
 15 years.
- 2. If the tree is heavily infested (more than a third of the crown has died off), it is usually too late to treat it. The tree will die within one to two years. For safety reasons, and to slow the progress of EAB infestation, we ask you remove the tree. It is recommended that you contact a certified arborist to properly remove the tree. Again we recommend that you get more than one quote to insure that you get a fair price for the service. Please replace the lost canopy by planting a new tree of a different species.

If you know your neighbour has ash trees please bring this important information to their attention. If they do not treat their trees it will contribute towards the EAB infestation but it should not undermine the benefits of any TreeAzin™ treatments you have applied to trees on your property.

For information about treating your private ash tree visit <u>BioForest Technologies Inc</u>. or <u>Ash Tree</u> Treatment Options

Residents with a heavily infected ash tree should contact a certified arborist for proper removal. Trees that are taken down can be burned in home woodstoves and fireplaces, but cannot be taken as firewood to a cottage or campground outside of a federally regulated area. Those found illegally transporting firewood or ash wood materials may be subject to a federal fine or prosecution.

Details on Federally Regulated Area on the Canadian Food Inspection Agency Site

The Canadian Food Inspection Agency (CFIA) has taken action to limit the spread of EAB by issuing a ministerial order to prohibit the movement of firewood of all tree species, and ash tree products such as nursery stock, logs, branches, and wood chips into or around federally regulated areas.

Residents who move any of the above materials into or out of the region without prior permission from the CFIA could face fines and/or prosecution. The regulations extend to vehicles used to carry restricted wood materials.

The City will continue to work with the CFIA, and will advise residents when movement of wood outside the regulated area can resume. Residents can also help by being vigilant in watching for EAB and contacting the CFIA if any are spotted.

For more information, please contact the City of Pickering Customer Care Centre at customercare@pickering.ca or 905.683.7575.

Identifying Ash Trees

Take this guide to each tree on your property to identify Ash Trees.





Ridged Bark

On mature trees (left), bark is tight and displays patterns of diamond shaped ridges. On young trees (right), bark is relatively smooth.



Seeds
When present, seeds usually hand in clusters

and are dry and oar-shaped.



Compound 'Opposite' Leaves

Leaves contain 5 to 11 leaflets with smooth or toothed margins (tips). Leaflets are posisitoned opposite with one at the top.



'Opposite' Branches

Branches and buds are directly across from each other ranterh than staggered. However, due to the death and grooming of individual branches, it is possible that not every branch will be opposite.



What is the Emerald Ash Borer?

The Emerald Ash Borer is a metallic green wood-boring beetle of about 1 to 1.5 cm in length that attackes all native species of ash trees, typically killing them in 2 to 3 years. Its larva bore tunnels inside the treem feeding off the inner bark until the tree dies.

Native to northeastern Asia, the pest was first discovered in Ontario in the Windsor area in 2002. Since then, infested ash trees have been discovered in Essex, Lambton, Elgin and Middlesex Counties and in the Municipality of Chatam-Kent



Infested ash trees often exhibit the following symptoms



Crown Die-back

Severely attacked trees may exhibit crown dieback as the canopy dies from the top down. Leaves may wilt or turn yellow during the growing season.



Woodpeckers

Woodpeckers feed on the larvae under the bark. Look for increased Woodpecker feedings or signs of their probing in the bark.



Bark Cracks

Vertival splits of 7 - 10 cm are often present over larval galleries. These are ofthen more noticeable on young trees that do not already have splits from growth related expansion.



Exit Holes

Once fully mature the adult beetles emerge through exit holds they chew through the bark. These holes are distinctly D-shaped and are 3.5 - 4 mm across.





Tunnels

Winding S-shaped larval tunnels snake under the bark where larvae bore channels. Removing the bark exposes larvae and sawdust-filled galleries.

This information was provided courtesy of the City of London www.london.ca Photos courtesy of Michigan State University, Forestry Images (www.forestryimages.org).