



City of Kingston

Guidelines for Tree Preservation and Protection

Where trees are to be retained and protected, a Tree Preservation and Protection Plan must be provided that clearly identifies and details the tree protection methodology to be implemented prior to construction and maintained until such time that construction (including landscaping) is completed.

Tree Preservation and Protection Plans shall be prepared in accordance with these guidelines. The final plan shall be signed and/or stamped by a Certified Arborist, and all tree work shall be done under the supervision of a Certified Arborist.

The Tree Preservation and Protection Plan should identify all applicable trees on the subject property on a map or site plan. The plan shall identify each tree by number, and in table format shall indicate the identification number, species, caliper size of the tree, the condition of the tree, and whether the tree is to be preserved or removed and the rationale for the action. The plan shall also include details and written specifications for tree protection and preservation.

Tree Preservation & Protection Measures

The following is a sample of methods that can be used to protect and preserve trees during construction projects:

- Trimming and pruning of branches;
- Aeration of the soil around the trees;
- Wrapping the trunks in wooden slats;
- Root pruning and trimming;
- Root feeding;
- Watering;
- Dry wells;
- Retaining walls;
- Tree Protection Barriers; and,
- Tree Protection Zones.

Tree Protection Zone

The Tree Protection Zone (TPZ) is defined as an area surrounding a tree that is marked and fenced off and where there is no storage of materials of any kind, no parking or moving of vehicles, and no disturbance of the soil or grade. The TPZ shall be a minimum distance of 1.5 metres beyond the Drip Line of the tree or group of trees, and some trees and some site conditions may require a larger TPZ.

Within the TPZ there must be:

- No disturbance or alteration of the existing grade of any kind;
- No addition of fill, excavating, or scraping to change the grade;
- No storage of building materials or equipment;
- No storage of surplus soil, construction waste, or debris over the root systems of the protected trees;
- No disposal (dumping or flushing) of contaminants or liquids; and,
- No movement of vehicles (personal or business), equipment or pedestrians.

The above requirements are for areas designated as a TPZ, and should also be used as guidelines for other areas where tree roots are impacted.

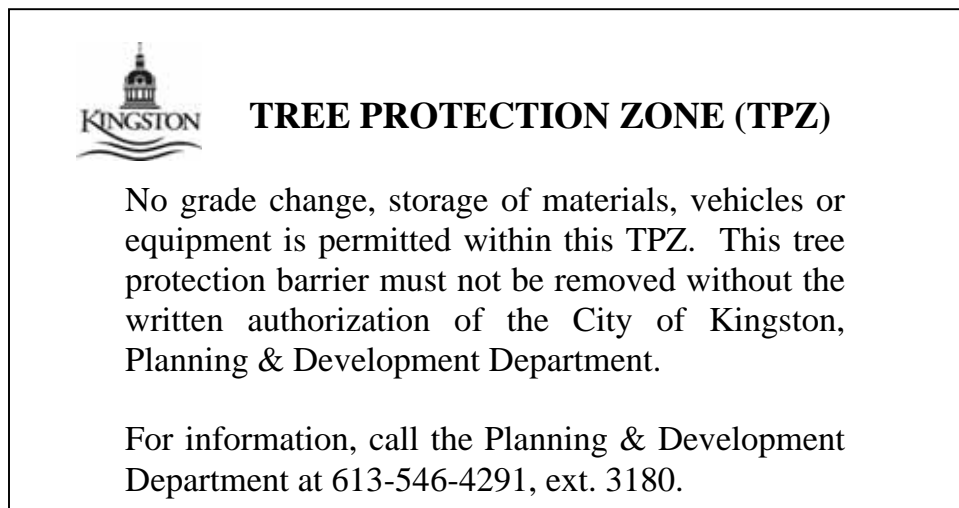
Tree Protection Barriers

Tree protection barriers shall be installed according to the following guidelines:

- A 2.4 metre (8 ft.) high plywood clad hoarding is the most preferred barrier. Other cladding can be considered, subject to approval by the City of Kingston. The barrier can be lowered around branches lower than 2.4 metres (8 ft.). Within a City road allowance, where visibility is a consideration, 1.2 metre (4 ft.) high orange plastic web snow fencing on a 2" x 4" frame (i.e. not just stakes) should be used.
- All supports and bracing used to safely secure the barrier should be located outside the TPZ. All supports and bracing should minimize damage to roots.
- Where some fill must be temporarily located near the TPZ, a plywood barrier must be used to ensure no material enters the TPZ.

Tree Protection Signage

A sign that is similar to the illustration below must be mounted on all sides of a Tree Protection Barrier. The sign should be a minimum of 40 cm x 60 cm (15.7" x 23.6") and made of white gator board or equivalent material.



Site and Landscape Plan

An applicant for a construction project must provide a site plan and/or landscape plan indicating the Tree Preservation and Protection Plan prepared by a Certified Arborist.

Excavation, Trenching or Tunneling

- No excavation or trenching is permitted within a TPZ.
- Directional micro tunneling and boring is permitted within a TPZ.
- Any open face cuts outside of a TPZ that are consistent with an approved plan that require root pruning, require the services of a Certified Arborist or qualified tree worker under the supervision of a Certified Arborist.

Maintenance of Retained Trees

All Tree Preservation and Protection Plans shall include both a watering schedule and pruning specifications and schedule for all trees to be retained and protected.

Standard notes to be included on all Tree Preservation and Protection Plans

1. This Tree Preservation and Protection Plan is consistent with proposed grading and infrastructure works as submitted by the consulting engineer.
2. All existing trees, which are to remain, shall be fully protected with staked/anchored fencing to City standards, erected a minimum of 1.5 metres beyond the “Drip Line” at the discretion of City staff.
3. Groups of trees and other existing plantings to be protected shall be treated in a like manner with fencing around the entire clump(s). Areas within the protective fencing shall remain undisturbed and shall not be used for the storage of building materials or equipment, or parking of vehicles.
4. No rigging cables shall be wrapped around or installed in trees. Surplus soil, equipment, debris or materials shall not be placed over root systems of the tree(s) within the protective fencing.
5. No contaminants will be dumped or flushed where feeder roots of trees exist.
6. The developer or his/her agent(s) shall take every precaution necessary to prevent damage to the trees to be retained.
7. Where limbs or portions of trees are removed to accommodate construction work, they will be removed carefully in accordance with accepted arboricultural practices.

8. Where root systems of trees are exposed directly adjacent to or are damaged by construction work, they shall be trimmed neatly and the area backfilled with appropriate material to prevent desecration.
9. Where necessary, the trees will be given an overall pruning to restore the balance between roots and top growth or to restore the appearance of the trees.
10. Trees that have died or have been damaged beyond repair, shall be removed and replaced by the owner at their own expense, with trees of equal size and species.
11. If grades around trees to be protected are likely to change, the owner shall be required to take such precautions as dry welling, retaining walls and root feeding, to the satisfaction of the City.