

Dollars and Sense

- Did you know the maximum amount of water that can pass through a residential water meter is 72 litres per minute or 4.4 cubic metres per hour? While this amount converts to approximately \$8.00 per hour, it assumes a totally unrestricted flow – a sprinkling device or soaker hose uses/costs less.
- While we encourage water conservation, we also encourage you to be water-wise. Watering an average-sized lawn once a week throughout a 4-6 week drought period could typically cost you from \$30.00 to \$40.00. If you choose to let your lawn go dormant when rainfall is insufficient, you should be aware that after a 4-week drought, without any watering, there is a likelihood that turf crowns may wither and die, especially in sandy soil. So, at least some watering is advisable. Replacing a dead lawn (even a small portion) will cost significantly more than watering. (What's worse, you have to water the new part every day . . . and there goes another \$40.00!)
- As previously mentioned, even established trees require water. The few dollars it would cost to deep-water a tree several times during a 4-6 week drought could cost \$8 - \$10. The cost to replace a tree, even with a much smaller-size specimen, could be least 10 times that amount. Then, as with you new lawn, new trees/shrubs also have to be watered frequently.

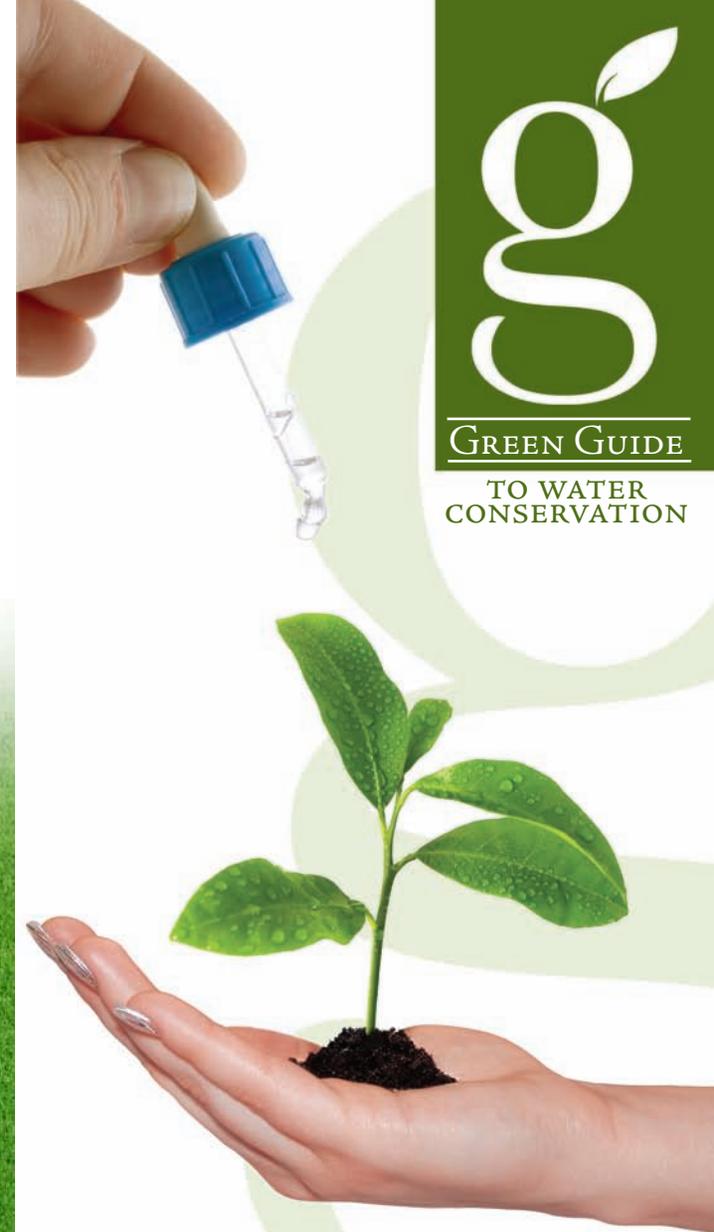
Health and Welfare

- 'Green things' remove pollutants and carbon dioxide from the atmosphere and replace them with life giving oxygen through a biological process called photosynthesis. It is not just trees that contribute to cleaner air; grass, shrubs and other plants do exactly the same thing . . . as long as they are still green and still processing our air.
- In addition to being essential for our daily breath, green things also make life pleasant. Who of us would not like to stroll along a beautiful garden or a lush meadow – it restores our sense of humanity.

**Use water,
but use it wisely!**

green
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GREEN GUIDE
TO WATER
CONSERVATION

~ BE WATER WISE ~

City of St Catharines
Green Committee Guide
to Wise Water Use

www.stcatharines.ca

After reviewing your water bill, the first thing you might have considered doing is welding most of your taps shut and, then, start looking for an alternative source. While this is obviously not feasible for your total water needs, there are ways to use tap water more wisely never-the-less.

Over the past several years, you have been inundated with many water-conserving tips such as installing low-flow toilets and showerheads, turning off the water when brushing your teeth, and running the dish washer only when fully loaded. This has worked; you have listened and are now using less water. Good!

We will not tell you, yet again, how to save water, but what we will do is suggest ways to use water more wisely! Since we are the 'Green Committee,' this brochure will focus on 'green things' – lawns and gardens – and how to maximize greening benefits while minimizing water wastage. Plants do need water to remain healthy. Knowing how to water properly is the key to avoid wasting water.

Trees and Shrubs

- Newly planted trees and shrubs need frequent watering until they are well rooted. During this period, they can be gradually weaned with deep-penetrating but less frequent watering. This will develop the deep roots necessary to make the plants more 'drought-tolerant.'
- Even well established trees and shrubs will still require periodic, thorough deep-watering during prolonged drought – dry periods exceeding four weeks. When your tree looks like it is suffering from the heat and dryness, it probably is!

Lawns and Gardens

- When watering gardens and lawns, a lot of water can be lost due to runoff and evaporation. Runoff occurs when water is applied faster than the soil can absorb it. A watering system which delivers water slowly, directly to the soil without over-spray is the most efficient and certainly loses less water to evaporation as well. (Watering early in the morning will further reduce water loss from evaporation.) A 'soaker' hose or drip system could do the trick!
- Exposed, un-mulched soil allows water to be lost to evaporation. A thick layer of organic material such as bark chips, shredded leaves or grass clippings will reduce moisture loss and also reduce maintenance. Even inorganic material such as pea gravel, crushed brick or pebbles is suitable. To be effective, a 10 cm (4 inch) depth of mulch is recommended.

- Water is wasted by over-watering! Lawns require only 2.5 cm (1 inch) of water per week – that's all – to stay healthy. If you want to include Mother Nature's help, a rain gauge can be used to monitor rainfall and, then, water is only added to make up the difference.
- There are simple lawn maintenance practices that can be used to help prepare for dry summers and maintain a healthy lawn too. Aerate and de-thatch (remove dead, matted grass) from lawns in spring to encourage penetration of water deep into the soil and help prevent water loss through runoff. Keep the lawn cut to a height of 6-8cm (2½-3 inches) – the shorter the grass, the shallower the root system. Leave grass clippings on the lawn; they decompose readily, adding nitrogen (fertilizer) back into the soil, and they act as mulch, reducing soil moisture loss. When reseeding your lawn, look for varieties of grass seed that are more drought-tolerant such as fescues and perennial rye grasses.

