

## Learn to use predator insects

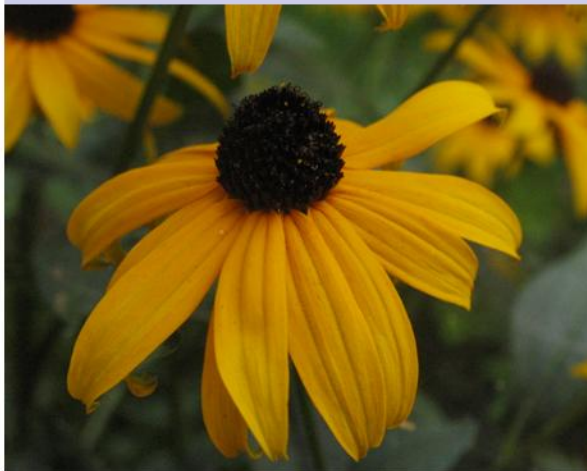
Different predator insects are common in the region and they thrive during warm weather.

Predators are less effective during cool springs and aphid populations will continue to increase. Eventually, the predators will dominate and the aphid problem disappears.



Above: Ladybeetle is a well-known predator. An adult can eat up to 100 aphids per day! On the left is the larvae, the young stage. The body is dark blue colour with orange bands.

Below: Plant flowers rich in nectar and pollen such as alyssum, yarrow and daisy (picture). The pollen attracts adults of beneficial insects.



## Kelowna's Pesticide Bylaw

Pesticide Regulation Bylaw No. 9920

The City of Kelowna Pesticide Bylaw regulates the use of pesticides for non-essential (cosmetic) purposes.

Pesticides are products used to control unwanted weeds, fungi and insects. Under the Pesticide Bylaw, most pesticides *cannot* be applied on a residential property.

Least-toxic pesticides on the "excluded list" are exempt from the restrictions of the Bylaw. Certified pesticide applicators are also exempt from the restrictions of the bylaw.

To view the entire bylaw and pesticides on the "excluded list", refer to [www.kelowna.ca](http://www.kelowna.ca) under residents / environment / pesticides.



### For more information contact

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## Managing aphids in your yard

This information sheet provides tips to manage aphids on residential plants, while minimizing the use of pesticides.



Aphids are part of nature. They can also be a nuisance.

Most plants (but not all) are susceptible to aphid infestations. They are found on many flowers and ornamentals including roses (picture above), but also on fruit trees and vegetable plants.

## What are “aphids”?

Aphids are soft-bodied insects with 6 legs. They vary greatly in colour and size.

Most aphids are small and have long legs and antennae. They may have wings, and some are covered with waxy coating.

Most of the year, adult females give live birth. The newly-born aphid immediately starts feeding on the plant. Females lay eggs in the fall that overwinter and hatch the following spring.



Aphids are distinguished from other insects by a pair of tubes from the back end of their bodies, called ‘cornicles’ (picture above).

Aphids feed by sucking plant juices through a food channel in their beaks. At the same time, they inject saliva into the host plant which may cause leaf curl or stunting of new growth.

Aphids secrete a sugary liquid called “honeydew”. This liquid gives the leaves a shiny appearance and may drop to the ground, or on vehicles and sidewalks.

## Managing aphids “naturally”

### *Be patient.*

Aphids come and go. Many aphid species are found on trees and shrubs in the spring. They leave in June for summer hosts such as grasses and weeds.

### *Be tolerant.*

Many plants are not harmed by an aphid infestation. Aphids are attracted to juicy new foliage of vigorously growing plants. Avoid fertilisation which promotes excessive new growth. Prune the affected part.

### *Replace the most aphid-prone plants.*

When aphid problems come back every year, consider replacing with other plants less susceptible.

### *Wash with water and soap.*

Use a strong jet of water to dislodge young aphids that are poorly attached on stems and leaves. Use water and soap to wash sticky leaves. Watch for early infestations that are easier to manage.

*Do not be alarmed by a small amount of damage.* A light aphid infestation is not harmful to plants.



The picture to the left shows the branch of a plum tree: the lower leaves were curled by aphid feeding. No action was taken. The upper leaves appeared after and are healthy.

Remember, aphids are small and they don't bite!

## About using pesticides

The following are least-toxic pesticides that are on the “excluded list” and are exempt from the restrictions of the Pesticide Bylaw. They are available at most garden centers.

### *Insecticidal soap*

Soaps must be applied directly to the aphids, which become susceptible to dehydration and sunburn.

Repeat application is often necessary. Avoid spraying when temperatures are above 30°C to prevent leaf damage.

### *Dormant oil*

Oil is useful for plants with a history of aphids. It is applied in early spring before leaves unfold. It prevents overwintering eggs from hatching.

Avoid spraying when temperature is below 0°C to prevent leaf burn damage.

*Apply these “excluded” pesticides only when necessary. Read the label for registered uses and precautions. Wear gloves, minimize skin contact and spray only the affected plants.*



### *Seek help for more severe problems.*

High aphid numbers may cause a general decline in plant vigour, or severe leaf curling on young plants, or are simply intolerable.

For the best course of action, consult with a garden center or a certified pesticide applicator.