

Beneficial Insects

Gardeners often focus on the pest insects that eat more than their fair share of crops. Actually, there are only ten or twelve insects you are ever likely to have problems with in your vegetable garden. The vast majority of the thousands of insect species in Seattle are beneficial.

Good bugs provide food for birds and fish; help break down organic matter to enrich the soil; pollinate our squash, cherries, strawberries and other crops; give us honey or beeswax; or just make us smile such as when we spot the first tiger swallowtail butterfly of the spring. One kind of insect, the cinnabar moth, is helping farmers in King County control the poisonous weed tansy ragwort.

Many of the good insects are parasitic or predaceous on the bad ones. Predators catch, kill and eat their prey outright, and they are generally larger than their prey. Parasites lay their eggs on, within, or near their prey, and the immature parasite gradually eats and kills the prey. Parasites are usually smaller than their prey. These insect-eating insects are a very important factor in keeping down the populations of pest species. Unfortunately, gardeners don't know and appreciate most of these garden friends and may kill them. Keep in mind that if you kill them, you inherit their work.

There are many kinds of insect eaters in your garden. Here are four of them:

Lady Beetles (or Ladybugs)

These are the most widely known good bug. They feed on aphids, mites and scale in both the larval and adult stage, so be sure you recognize the lady beetle larva, which is about ½ inch long, bumpy skinned, and usually spotted or banded with bright colors. Since a single lady beetle can eat 2,400 aphids in her lifetime, they are good helpers. Many gardeners are tempted by slick advertisements to buy quantities of lady beetles to release in their gardens. What the ads don't say is that lady beetles normally undergo a dispersal flight after overwintering. When they are released, they will usually fly away, and your neighbors will benefit from your purchase.

Lady beetle larva



Lacewings

These insects come in green or brown with golden eyes, long antennae, and finely veined wings held tent-like over the body. The larvae are about 3/8 inch long with flattened, wedged-shaped bodies and long sickle-shaped jaws. Many people think the larvae look a lot like tiny alligators. Adults feed mostly on nectar, but larval lacewings eat aphids and other small insects, mites and insect eggs. They grab their prey with the two hollow jaws and literally "suck them dry."

Lacewing



Syrphid Flies

These insects are also called hover flies because of the way they pause in mid-air as they fly from flower to flower. They are usually black and yellow and resemble small yellow jackets or bees. The larvae are wrinkled, fleshy, brown or green maggots. The adults eat pollen and nectar, but the larvae feed on aphids. If you spot one that does not have an aphid in its mouth, chances are it is moving its pointy front end around searching for its next victim.



Black Beetles

There are several kinds of ½- to-1 ½ inch black ground beetles common to Northwest gardens. They eat garden pests including moths, cutworm larvae, and slugs. These predators are usually quick on their feet. (They have to be if they are going to catch their dinner!) They generally run about and feed at night and hide under sod, pots and logs by day. If you place cans or saucers at ground level for trapping slugs, you may accidentally kill the black beetles, too. Prevent this by raising your slug bait containers to above ground level. Slugs will still be able to get into the bait.



Ground Beetle

There are many other good “bugs,” such as dragonflies; ichneumonid, braconid, and trichogramma wasps; rove beetles; tachinid flies; and centipedes, to name a few. Most insecticides will kill all these beneficial insects as fast or faster than pest species, and pest populations will be faster to make a comeback.

If you have a lot of these good guys in your garden, pests can often be kept at minimal levels. The idea is not to completely kill off every pest or the pest-eaters would die, too. What we want is to keep pests down to levels we can tolerate.