

Meet Some Natural Enemies: The “Good Guys”



Natural Enemies are good because they can stop major damage from spreading to many habitats, including farmers' crops and your own garden. But using these “good guys” is a science and you have to be careful when using them. If you introduce one insect to control another, you have to make sure it doesn't have bad effects. This is why BioControl insects are studied VERY closely, so they don't stop one pest and then become a pest themselves!

There are four different kinds of Natural Enemies; 1. **Predators**, 2. **Pathogens**, 3. **Weed-feeders**, and 4. **Parasitoids**.

Predators of insects and mites include beetles, true bugs, lacewings, flies, midges, spiders, wasps and predatory mites. Some are extremely useful natural enemies of insect pests. Unfortunately, some prey on other beneficial insects as well as pests.

Insects and mites, like plants, humans and other animals, can be infected by disease-causing organisms such as bacteria, viruses, and fungi, called **Pathogens**.

Weeds can be carried to far away places by animals and the wind. **Weed-feeders** can control these foreign weeds by feeding on seeds, flowers, leaves, stems, roots, or by transmitting plant pathogens, which will infect plants.

The young of **Parasitoids** grow on or within an insect pest (called the host). The young eats the host and kills it. Bye-bye “bad guy”!

PRAYING MANTIS



LADYBIRD BEETLE



LACEWING



SYRPHID FLY



Meet Some Pests: The “Bad Guys”



You might think of your little brother or sister as a pest but they are nothing compared to these guys. Insect pests can destroy golf courses, forests and even your garden! Biological Control is a great way to stop them and can be used in place of, or even alongside insecticides. If you can learn to identify these “bad guys”, you can research what “good guys” can stop them and maybe save a garden or even a whole farm!

MEXICAN BEAN BEETLE



THRIPS



LEAFHOPPER

