

### Create the Best Environment

While you can buy beneficial insects and introduce them to your landscape, it is far cheaper and probably more effective to simply encourage the beneficial species native to your area. Create the kind of environment they like. The more diverse the plantings in and around your yard and garden, the more attractive it will be to a wide variety of helpful insects. The more permanent plantings you have around the landscape—perennial beds, woodland gardens, groupings of shrubs—the more stable the habitat you offer for beneficials to reside in year after year. Some homeowners go so far as to set aside a special nursery, or insectary patch, where weeds, brambles, and wildflowers are encouraged to thrive, providing a haven for good bugs. These special plantings are most effective within 25 to 50 feet of the plants you are trying to protect, but they are effective up to 150 feet away. Hedgerows, windbreaks, and wooded patches also serve as nurseries for beneficials.

As for specific plants, parasitic wasps are especially fond of Queen Anne's lace and other members of the carrot family. Daisies, related flowers, and some evergreens provide a haven for all sorts of helpful insects.

Clyde Robin Seed Company (see the source list at the back of the book for the address) offers a wildflower mixture specially designed to attract and support beneficial insects. This mix produces an attractive wildflower garden with a secret agenda of supporting a beneficial insect population in your landscape. It contains seeds for evening primrose, wild buckwheat, baby blue eyes, candytuft, bishop's flower, black-eyed susan, strawflowers, nasturtiums, angelica, and yarrow.

Entomologist Linda Gilkeson has observed in her research that water is as important to maintaining a beneficial insect population as is food and shelter. Consider placing two birdbaths in the yard. To make one of them attractive to insects, stack several piles of small stones in it to allow the insects to drink water without the danger of drowning. Place this bath in among the flowers where birds are less likely to land. You don't want them eating

the insects you are trying to attract. Put the birdbath out in the open where birds prefer to land so they can spot cats and other predators. This makes water available to both the good birds and the good bugs, while preventing the birds from gobbling up too many beneficials.

Following are descriptions of some of the predators and parasites that already might be lurking around your landscape, looking for some insect pest to pounce on. Get to know them so that you can provide the conditions that will make them happy residents in your yard, and they'll help keep pests in line.

### Assassin Bugs

How appropriate to employ the assassin bug in your army of pest controllers. Assassin bugs move rather clumsily and fly slowly—hard to imagine them being very helpful at catching and killing insect pests, but they do have lightning-fast front legs with which to snatch their victims. With their powerful beaks they pierce their catch and inject a paralyzing venom before devouring them completely. (This insect is also called the “kissing bug”!) Assassin bugs will kill aphids, various caterpillars, Colorado potato beetles, Japanese beetles, leafhoppers, and Mexican bean beetles. They will also catch bees and butterflies.

Several species exist. Most are brown or black and range from  $\frac{3}{8}$  to 2 inches long. They have slender heads with protruding eyes and legs armed with sharp spines. They feed mostly on larvae and lay their eggs in the soil. Assassin bugs overwinter as adults, nymphs, or eggs. During the rest of the year you'll find them on alfalfa, camphorweed, plants in the carrot family, goldenrod, Mexican tea, and oleander. Do not pick them up; their bite stings.

### Bigeyed Bugs

Found in western North America, this insect preys on aphids, chinch bugs, leafhoppers, spider mites, and most immature insects. It has huge eyes and is grayish, with tiny black spots on its head and thorax. The adults hibernate in garden trash for the winter. Several generations are produced each year. Attract