

Identifying and Fighting Common Garden Pests

If you're new to community gardening in general—or just new to a particular plot within the community gardens—you may not know exactly what to expect with regard to insect pests. Did the gardener before you have to slug it out with slugs? Battle bean beetles or tomato hornworms? If so, it's possible that some insects pests are already hiding out in your soil.

Fortunately, there's a lot you can do to protect your plants from these and other common insect visitors *before* they have the chance to do much damage.

## **Preventing Insect Pest Infestations**

**Choose Insect-Resistant Cultivars**—Potatoes, tomatoes, green beans, cucumbers, and squash are just a few of the vegetables which may attract insect pests. When choosing which cultivars of these and other plants to try, look for those with natural insect resistance. (For instance, if you choose squash cultivars with solid rather than hollow stems, squash vine borers will have a much harder time moving in!)

**Visit Often**—When it comes to controlling insect pests, early detection is key. Check your garden, looking under leaves for egg casings, on top of leaves for insect frass (waste), and along stems and fruits for signs of insect damage.

**Keep It Neat**—Keep garden and paths well weeded; remove weeds and diseased or damaged plants, so insects have fewer places to hide.

**Repeat Plantings**—By planting multiple waves of the same crop a few weeks apart, you may be able to "trap" and relegate insect pests to your initial planting, enabling you to harvest subsequent waves of the same crop with less competition from insect pests.

**Room to Breathe**—Resist the urge to cram as many plants into your space as you can. Affording your crops plenty of room when planting will facilitate good air circulation, cutting down on disease and providing insects with fewer places to hide.

**Mechanical Barriers**—You can protect especially vulnerable plants by shielding them with floating row cover. Also known as garden fabric, this sheer, lightweight material allows moisture and light—but not bugs!—to penetrate it. (This is also a good way to keep birds out of your strawberries. Just be sure to uncover your plants from time to time to allow for pollination!)

## The Usual Suspects

Insect pest	Crops most likely affected	What they look like	Prevention	Treatment
Aphids	Wide range of plants		Routinely examine plants along stems and undersides of leaves for signs of adult aphids, the sticky sap aphids produce, and ants which may be "farming" aphids.	Knock the majority of aphids off plants with a strong stream of water. Follow up by handpicking. Applying an organic, insecticidal soap can also be helpful.
Cabbage worms	Broccoli, Brussels sprouts, cabbage, kale, cauliflower		Cover vulnerable crops with floating row cover to prevent cabbage moths from laying eggs on your crops. Companion plant thyme which repels cabbage worms.	Handpick any cabbage worms you find on your plants and discard. Organic pest control products such as diatomaceous earth may also be helpful.
Colorado potato beetles	Potatoes, tomatoes, eggplant		Cover vulnerable crops with floating row cover. Regularly inspect for clusters of bright orange eggs laid on leaf undersides as well as the various larval and adult beetle stages.	Crush any potato beetle egg clusters you find. Handpick larval and adult beetles and discard. Applications of diatomaceous earth may be helpful with soft-bodied, larval-stage insects.



## The Usual Suspects (continued)

Insect pest	Crops most likely affected	What they look like	Prevention	Treatment
Flea beetles	Cabbage, eggplant, lettuce, peppers, and many other plants		Cover vulnerable crops with floating row cover. Plant "trap" crops. Keep garden free of weeds and debris.	Applications of diatomaceous earth may be helpful; however, it must be reapplied after rainy weather.
Japanese beetles	Beans, squash, tomatoes, and many other plants		Cover vulnerable crops with floating row cover.	Hand pick and dispose of adult beetles. Applications of Milky Spore powder may be helpful.
Mexican bean beetles	Beans and legumes		Choose insect-resistant cultivars. Cover vulnerable crops with floating row cover.	Crush any bean beetle egg clusters you find. Hand pick and discard adult beetles.
Slugs	Strawberries, beans, lettuce, tomatoes, and many other plants		Cover vulnerable crops with floating row cover.	Hand pick slugs (in the mornings or evenings when they are most plentiful.) Applications of diatomaceous earth around plants in need of extra protection may be helpful.
Squash vine borers	Squash		Choose insect-resistant cultivars. Cover vulnerable crops with floating row cover. Examine undersides of leaves for tiny, yellow eggs and look at stems closely for signs of damage.	If you notice squash vine borers have infiltrated the stems of your squash, you can carefully slit the areas with a razor blade, remove the larvae, and discard them.
Tomato hornworms*	Hornworm caterpillars voraciously eat tomato plant leaves and stems.		Check under tomato plant leaves every few days for signs of eggs. Remove them before they can hatch.	Handpick hornworm caterpillars and remove them from the garden.

For more detail on tomato hornworms, see the "Growing Healthier Tomato Plants" flier.

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Need some extra advice or have questions about your responsibilities as a community gardener? Contact the Community Garden Supervisor at communitygardens@bloomington.in.gov.