

Cover Crops

Cover crops are often called “green manure” because they offer many of the same benefits of chemical-free fertilizers like compost or manure. They also offer many other perks that keep your soil healthy and productive all season.

What do cover crops do for your garden?

- Protect the soil from erosion by wind, rain, and snow
- Improve soil structure by creating pores, which increase aeration and help the soil hold water
- Improve soil quality by feeding soil critters, like nitrogen fixing bacteria
- Prevent weeds early in the spring
- Attract beneficial insects

How to plant cover crops

- Choose a cover crop – there are many options! See the chart below, and/or plant a mix.
- Clear your raised bed of all weeds and plants. You can keep some crops in your raised bed if they have tall stems, like tomatoes and collard greens at the end of the season, and simply plant underneath.
- Rake the soil flat
- Broadcast seeds evenly over the raised bed and gently rake in. If you have many birds and other critters in your garden, consider laying fabric row cover over the top of the soil so they don't eat the seeds you planted. You can lay fabric row cover directly on the soil and water over the top. Remove it and store it for the spring when the plants begin to grow.
- In the spring, cut down cover crops before they start going to seed. If it's a winter kill cover crop, you can leave the leaf litter as mulch. If it's an overwintering cover crop, you'll probably want to dig them into the soil and wait 2-3 weeks for the cover crop to decompose before planting.



Clover and field peas cover crop sown underneath tomatoes in the fall

	Winter-Kill Cover Crop	Over-Wintering Cover Crop
Pros	Easier to manage in the spring. You can usually plant directly into the dead cover crop plant matter.	These produce much more organic matter and nitrogen to enrich the soil
Cons	Due to their short growth period, these produce less plant material and nitrogen to enrich the soil.	Over-wintering cover crops can be difficult to clear in the spring, especially if we have a mild winter. You may have to dig them under the soil more than once if they keep sprouting back.

Adapted from Cornell Cooperative Extension

Cover Crop Categories	
Winter-kill cover crops: planted in late summer/early fall and killed by the winter cold. The dead plant matter creates a protective covering over the soil.	
Field Peas	Fixes nitrogen into the soil, and you can eat the shoots
Oats	Grows quickly and suppresses weeds
Overwintering cover crops: planted in the fall, survive the winter, and start growing again in the spring. Spring growth adds more organic matter and nitrogen to the soil, and kickstarts microbial activity in the soil.	
Crimson Clover	Fixes nitrogen into the soil, attracts beneficial insects
Rye	Grows quickly and suppresses weeds
Hairy Vetch	Fixes nitrogen, attracts beneficial insects
Summer cover crops: planted to give soil a rest between a spring crop (like lettuce) and a fall crop (like kale). These cover crops can shade out weeds and add organic matter to the soil for 2 months in the summer.	
Buckwheat	Grows quickly, suppresses weeds, attracts beneficial insects. Cut down the buckwheat as soon as it starts to flower and turn into the soil.