

LEGGY VEGGIES

Question: Why are my pepper and tomato seedlings so weak and leggy?

Answer: There are two possible issues that can cause your vegetable starts to be leggy. Low light level is the most likely cause of leggy vegetable starts. The second less likely cause is low potting soil nutrition.

In the Umpqua Valley, you need to get your tomato and pepper seeds planted in March to be ready to plant out by mid-May. The sun is still moving low on the horizon in March and April and often the skies are super cloudy for weeks on end.

I recommend grow lights to solve this problem. The price for these grow lights have come down to the point it makes sense to get them. Four foot LED grow lights run around \$12 and two foot LED grow lights \$6 on Amazon.

I would stay away from the pink ones as they mess with your color perception for an hour or so. The yellow ones are fine. Place the lights around 12 inches above the top of your starts.

Potting soil nutrition is the other possible cause of leggy vegetable starts. While seeds do not need any nutrition to get going, the starts benefit from a bit of fertilizer as they grow out. I use a balanced liquid fertilizer applied to the water at 1/2 strength applied after I up-pot the seedlings.

Some potting soils make this condition worse. Producers of potting soil want to maximize their profits and often the compost they use has not fully matured and is still tying up nitrogen. If you are buying low-cost potting soil, add a bit more fertilizer to compensate for this issue.

Another choice is to get bulk potting soil from either DC Co-op or Mignola Farms and store this potting soil protected from the rain for six to 12 months before using it.

This has the added benefit of reducing your potting soil cost and getting you a better potting soil product as compared to low cost bagged potting soil. I store mine in a dry stacked concrete block container with a horse stall pad on the bottom and a piece of plywood on the top.

To detail the whole process, start with well-aged quality potting soil. I load up four inch pots and let them soak in a tub of water so the soil is full saturated before apply seeds. I place 50% more seeds than the number of starts I need on the surface.



Bruce Gravens
Master Gardener

You will not get 100% germination and it is nice to have a few plants to give away.

Sprinkle about 1/8 inch of vermiculite on the surface and gently press down on the pot with the back of your hand. You should feel the vermiculite get damp as you press down. Place the pots in a warm light location, under the grow lights if you have them.

Once the starts show two sets of leaves, up-pot them in individual four inch pots. When you up-pot your pepper and tomato starts, place them deep enough that the lower leaves are touching the potting soil.

Grow out under the grow lights or natural light if it is sunny. Fertilize with 1/2 strength balanced liquid fertilizer to grow stocky starts. A gentle breeze from a small fan will help strengthen the starts.

In mid-May, plant your starts out in the garden. You want your garden soil to have a good bit of organic material well mixed in to the native soil. Ideally, you would do this in the fall of the year, but you can do it in spring once the soil is dry enough to work, but let the soil recover for at least a week before planting your starts.

When you plant your starts out, plant both the pepper and tomato plants with 2/3 of the plant under the soil. If they are too big to do that vertically, dig a trench and lay the start in the trench. Cover 2/3 of the plant and in a day or two the uncovered part will turn upwards on its own. You can fill in the soil around the start after it turns.

Covering your starts with a bit of floating row cover will give you some protection from a late frost and give them some protection when the weather turns super-hot.

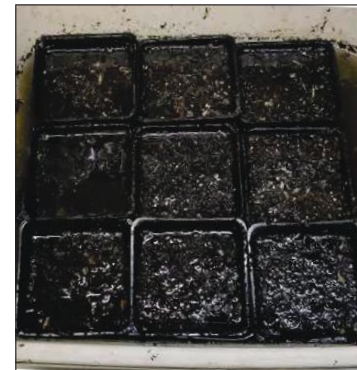
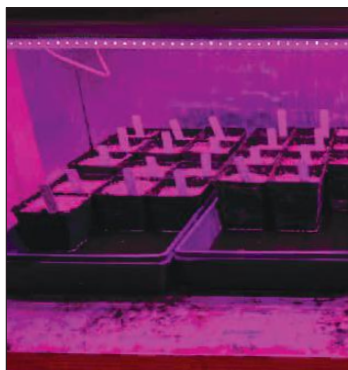
Keep your fingers dirty!

Do you have a gardening or insect question? Contact the Douglas County Master Gardeners at douglasmg@oregonstate.edu or 541-672-4461 or visit 1134 SE Douglas Ave., Roseburg. Douglas County Master Gardeners are trained volunteers who help the Oregon State University Extension Service serve the people of Douglas County.



PHOTOS BY BRUCE GRAVENS

Tomato plants after they have been up potted or transplanted to bigger containers.



(Left) Tomatoes should be started in March in the Umpqua Valley. Grow lights are an inexpensive alternative to spotty light of early spring. (Right) Fully soaked 4 inch pots ready to be seeded.



(Left) Place 50% more seeds than the number of desired starts, as germination is not guaranteed. (Right) Buying potting soil in bulk and aging it over the next six to 12 months reduces soil costs and provides a better product than some low-cost potting soils.