

Soil Blocking Mix Recipes

Do we really need to mix our own? (Part 1)

In our professional experience, the answer is an unquestionable "Yes". Allow us to explain. You could very well go to the store and pick up a bag of your normal potting soil. You could wet it down into the "slur" and begin making blocks. However, the results you need, the results you expect from a tool that you've just spent good money on, will be compromised.

You've heard, "your only as good as your weakest link". Potting soil can be your weakest link. Store bought potting soils are never meant to be turned into a bucket of oatmeal. Nor are they capable of withstanding three to one compression. They aren't designed to hold their shape without any container and then be fogged down with water. This is the point where so many people say: "Those soil blockers just don't work very well." They broke the weakest link as their blocks fall apart, and wear away from moisture. Or maybe, they couldn't even get the potting soil to make a block at all.

And, some potting soils are sterilized, so would you still call it "organic"? It can not support a growing plant. We recommend the following ingredients and ratios because they work and have worked on over one million blocks on our farm. This is the fastest way to get excellent results with soil blockers. We have used these exact ingredients with super results.

DO NOT USE COMPOSTED STEER MANURE OR COMPOSTED WOOD BY-PRODUCTS. THEY WILL NOT WORK IN SOIL BLOCKS. THEY WILL INHIBIT GERMINATION DUE TO AMMONIA OFF-GASSING.

Do we really need to mix our own? (Part 2)

The revised answer to this common question is "NO", not anymore. There was a time when mixing your own was the only way. Now, many potting soils have surfaced on the market, many just might work for soil block making. We've tried many. Mixed results, never as good as our own home-made blocking mix.....

However, great results can still be easily had with a little investigation at any nursery, greenhouse, garden center or hardware store.

Just look for a blend of potting soil that has about **3 parts peat to 1-2 parts perlite**. This is known as "peat-lite", and is common among growers. Hopefully, the peat has been limed, if not, throw in a handful of dolomite lime. Just blend in 4 parts of that to 3 parts compost, worm castings, or worm compost for a great mix. Leave out the fertilizer, and use a supplemental liquid fertilizer as soon as the plants are 10-14 days old. Pro-Mix brand is one we recommend.

Blocking Soil Mix Recipe (our farm favorite since 2001.)

Use a **10 quart bucket** for measuring. A standard mop and bucket is normally 10 quarts. Or, 1/2 of a 5 gallon bucket is 10 quarts or 2.5 gallons. Use a measuring cup for the fertilizer. Use a high-grade very fine to medium fine sphagnum peat moss with environmental quality label on it, like Sunshine Brand.

Note to flower farmers: Leave out the fertilizer meals if you are making blocks in advance and you are not planting seeds immediately, as the breakdown of these meals can interfere with the germination of some flower seeds. Makes 2 bushels (1.6 cubic feet). Mix in an over sized wheel barrow, Vermont Cart, or lay down a tarp and mix by rolling the mix from corner to corner. When mixing by hand, use long sleeved gloves if you don't want dirt under your fingernails. A children's shovel works great.

Follow the directions in the order given. If you can't find the items for the [base fertilizer](#), leave it out and begin fertilizing with an organic liquid fertilizer in 6-10 days after the seeds have sprouted. Flower farmers, leave out the nitrogen fertilizers for your smallest and longest germinating seeds. Try fish emulsions mixed with kelp products. Earth Juice is common. I use organic fertilizers, and common is

Maxi Crop and it works great. We have [fish fertilizer](#) and [liquid kelp](#) of the absolute highest quality if you need it. Make base fertilizer first:

Step 1--Base Fertilizer

- 1 cup blood meal or feather meal or cotton seed meal or shrimp or crab meal or alfalfa meal, or soy bean meal, (or 1/2 cup kelp meal + 0-1/2 cup other meals.)
- 1 cup colloidal phosphate (soft rock phosphate)
- 1 cup greensand
- 1 cup glacial rock dust or mined rock dust
- Mix together thoroughly.

Step 2--Blocking Soil

- 3 buckets brown peat or half peat moss and half coco peat or [coco pith/fiber](#)
- 1/2 cup horticulture-grade lime. MIX
- 2 buckets coarse perlite, OR any of these following ingredients:
 - 1/4" pumice stones, diatomite rock, small coco chips, chopped wheat straw or coarse sand
- 4 cups base fertilizer. MIX 1 bucket good garden soil
- * 2 buckets compost, thoroughly decomposed*

**(If you don't have good garden soil, you can substitute compost for that ingredient. If you don't have good compost, you can substitute pure worm castings or worm compost (vermicompost) for all three parts.)*

Mix all ingredients thoroughly. Make sure to blend the lime in with the peat really well. Use a powdered, Horticulture-grade lime over 95% Calcium Carbonate with Magnesium or Dolomite lime. Blending the lime and fertilizer in with the peat first helps distribute it evenly.

Storing mix is just fine as it mellows out the ingredients. And, you'll want to have some around for over watered slurs, so you can "fluff them up". But, don't store the wet mix, or "slur". Use it up, or dry it out and rehydrate again. The wet mix will start to break down, tying up the nitrogen and creating ammonia germination inhibitors.

Note:

A different recipe is used for the micro blocker. The idea is to "get 'em up and pot 'em on". No nitrogen meals are used because they are not needed and you'll be "potting on" in a few days anyway. Note: no limestone is needed either. **Screen compost and peat moss with a 1/4" mesh screen, first.**

Micro Block Soil Recipe (our favorite)

- 4 gallons peat, or half peat moss and half coco peat or preferably coco pith/fiber
- 1 cup colloidal phosphate (soft rock phosphate)
- 1 cup glacial rock dust 1 cup greensand. MIX
- 1 gallon well decomposed compost, worm castings, or vermicompost.

THE LADBROOKE COMPANY RECIPE

Very simple, extremely effective mix. Always mix the peat and limestone first.

- 4 parts peat moss
- 1 part very well decomposed compost, pure worm castings, or vermicompost
- 1/8 part sand (coarse, washed, and weed free)
- handful of limestone or rock powder

[Click here for an understanding of what type of compost you should be buying or making.](#)

Step 3--Make the "Slur"

[\(Click here for a Picture Demonstration of making slur and soil blocks.\)](#)

The slur refers to the wet potting soil. You will want some kind of a durable tub, Rubbermaid bins, wheelbarrows, buckets, etc. work well, but it is really nice to wet down the potting soil and charge your blocker in the same container. Use about 1 gallon of non-chlorinated water to 3 gallons of potting soil. Water down the potting soil and stir with a stick, shovel or your hands. The key here is to get it into an oatmeal-like consistency. You should be able to pick it up, squeeze it tightly and watch the water drip slowly from your hands. You could pick it up and chuck it against a wall, and it should stick for a few moments, then fall. It's sort of like the perfect whipping cream: nice peaks at the top, doesn't fall over when piled, smells sweet and soft to the touch, yet springy and resilient. O.K., got it?! Now, let it sit for one hour.

This is an important step on our farm, and is not taken lightly. I know it's hard to believe, but the one hour will give the peats, whatever they are, time to absorb the water and become completely saturated. This will definitely prevent "dry out", if the blocks are kept moist from here on out. This one hour allows the peat to fill all the dry spots and prevent "wicking" away of moisture by any dry area on a soil block, as they are exposed to air on 5 sides, sometimes 6 sides if you use hardware cloth or mesh bottomed trays to lay your blocks on. You might even notice that the mix seems a little stiffer, a little drier than an hour ago. GOOD! Add a bit more water to make it just right!

Step 4--Charging the Blocker

Get the tub of soil lower than the elbows. I stack one tub on top of a Rubbermaid bin, or for a commercial blocker, leave the bin on the ground. Now, get yourself a bucket of water that will fit a soil blocker. This will dip and clean the blocker before and after each "discharging". The minimal size will do, as you can always replace a smaller amount of water quickly, and not create a mud bath. Dip your soil blocker and then press it firmly on top of and into the blocking mix. Twist left and right, left and right, now pick it off the soil and charge again, deeper, harder, to the bottom floor of your tub. Twisting and pushing....water should begin oozing out of the top of the blocker, GOOD! It's charged! Pause momentarily and think, "there's a vacuum created at the bottom, and those blocks will stick right to the bottom of that tub if I don't twist and tilt ever so slightly while I lift at the same time!" I used to scrape the bottom clean, but it's not necessary, if you charged that blocker perfectly. However, that will come with some practice, so scrape off the blocker if you like. Now, the thumb and thumb joints are the fulcrum, the pushing off point and the pusher. The fingers hold the blocker steady, steady, place them right where you want them and lay them right on the spot where the blocker was and discharge the blocker while simultaneously lifting the blocker off the tray in a straight vertical non-wavering motion. Say "lift off, straight as an arrow. The blocks should have come out perfect; accept nothing but perfection here, you paid good money to have these little cubes look professional. Keep trying, it's easy, you'll get into it, and you won't be able to stop. Practice a few times, and then throw the cubes back into the bin!

Step 5--Placement of Soil Blocks

One of the most common questions asked is: Where do I put my soil blocks? There are numerous ways to place blocks. We like large sheets of agriculture plastic on heat mats. Also, we reuse anything we can; old 1020 plastic flats, 17 x 17 plastic mesh flats, recycle-able food containers, pieces of plywood, and benches made of mesh screen. The real idea in soil blocks is the Truth presented here: There is no one perfect way, there is only the way that works best for you and your system of gardening or farming. Some have said that with all the adamant advice we have given you, why do you take a hands-off approach to block placement systems? The answer is this: Soil blockers are relatively new in horticulture in America. America has built her entire ag system on cheap imported plastics. To say there is only "one way" is to stop progress in identifying new block placement systems. We are tirelessly looking for ways to improve, but if you are a small farmer the best way is to use the magic of the block and set them on wire benches so that all six sides will be air pruned and ready for field transplants with zero transplant shock. Give them an 1/8" air gap on all sides and mist by overhead misting or fogging or watering deeply with a rose head watering can. Make your own wire mesh trays modeled after opened bottomed plastic flats, but make them any size that fits with your heat mat and bench top space.