Dry Farm Tomato Planting Guide

Dry Farming is an ancient farming practice that mainstream agriculture has lost touch with because it is not a yield maximization strategy. Dry farming has historically been practiced in areas that have Mediterranean like climates with wet winters and dry summers and usually 20 inches or more of annual precipitation. Dry farming is making a comeback as a low-input and sustainable alternative to irrigated agriculture as summer water becomes scarce in the Western U.S. Tomatoes are also believed to have a more sweet and concentrated flavor! This guide will outline what farmers in the Willamette Valley and adjacent areas have been doing in our dry farming trials. There is not a recipe for dry farming tomatoes but we encourage growers to experiment!

How is Dry Farming Different?

Planting

• If you’re planting seeds on your own vs purchasing transplants, you’ll want to start your seeds indoors 6 to 8 weeks or more before the last average spring frost.

• Harden off transplants for a week before moving outdoors.

• Transplant as soon after your seedbed is prepped, there is still plenty of soil moisture, and the threat of frost is unlikely. Use row cover if frost is predicted after planting.

• Trellising is optional and may help with ease of harvest, although most dry farmers do not trellis with this low-input approach and believe allowing the plants to sprawl and cover soil helps to conserve moisture.

• Transplants are often spaced wider when dry farmed than when irrigated. Soils with higher water-holding capacity may allow for closer spacing. Our planting density in Corvallis on a Woodburn Silt Loam has ranged between 18 to 25 square feet per plant.

• Many dry farmers pinch off the lower leaves on transplants, and plant deep so that just 4 true leaves are above ground.

• It is a common practice for dry farmers to compress the soil around the base of the plant, which creates capillary action bringing soil moisture to the surface. This can be done with hands, feet, or roller.

• Water transplants well right before planting.
Care
• Weed management is key for dry farming. Weeds very effective at sucking moisture out of the soil. In order to keep tomatoes happy, keep on top of weeds as they germinate!
• Growers utilize various forms of surface protection to conserve moisture for summer crop growth depending on their site, scale, and equipment. Some of these include: dust mulch, weed fabric, plastic mulch, and deep mulching with straw or woodchips
• Since there is no overhead irrigation annual weeds tend to be suppressed but perennial weeds like bindweed and Canada thistle still thrive.
• If you are on a site with low or no perennial weed pressure, in theory you can sit back and enjoy your summer before harvest begins!

Recommended Varieties
• Indeterminate, early-maturing, or even dry farmed varieties are preferred. Many dry farmers save their own seed from tomatoes that perform well on their site.

FAQ’s
How many times do I irrigate?
If you are able to get your plants in early the answer is, Never! For the dry farming trials in Corvallis 2015 - 2017 we planted in mid-May and didn’t water in the field once. Some growers choose to irrigate in tomato transplants depending on their site and soil, and how late they are planted in the field.

Can I direct seed?
With tomatoes and other small seeded crops, we recommend transplanting.

How much lower is the yield using dry farming technique?
Yields can be anywhere from a ¼ to ½ less than conventional irrigated tomatoes, but are reported to taste better and store longer.

Do I have to trellis?
Trellising is optional. It may help with ease of harvest, although most dry farmers do not trellis with this low-input approach and believe allowing the plants to sprawl and cover soil helps to conserve moisture.

Where can I get more information about dry farming?
You can visit us at:  http://smallfarms.oregonstate.edu/dry-farm/dry-farming-project
Facebook Page:  Dry Farming Collaborative
How do I get involved with the Dry Farming Project?
Contact :  Amy Garrett
OSU Extension Service – Small Farms Program  
anym.garrett@oregonstate.edu