



The Strawberry Store System for Germination of Gourmet Strawberry Seeds

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Version 1.0

Introduction

For over 25 years we have been collecting, growing and conducting research on gourmet strawberries. Our interest began with the alpine types and has continued with musk, Virginia and heirloom hybrids. Germination of the seeds is said to be easy, but experienced growers have had difficulty with this task.

This document has been prepared to help beginning gardeners and experienced commercial growers to better understand the germination process and offers tips that we hope are useful. By the use of videos we hope to make this a more pleasant experience that will allow the viewer to select the aspect of germination that is of particular interest without having to read a long boring document.

Preparation

When seeds arrive, determine if they need to be preconditioned. By this we mean, have they been previously frozen? Strawberry seeds germinate more consistently and faster if they have been frozen for 3-4 weeks. Unconditioned seeds can take as long as 30 days to germinate, or even longer. We have found that conditioned seed germinates quicker, in as little as 4 - 14 days depending on the variety.

Here at The Strawberry Store and Strawberry Seed Store **we precondition all seeds**. We freeze seed for long term storage. Be assured that seed that you receive from us has been frozen for at least a month before you receive it.

If there are delays in transit (such as for International orders) or if the seed warms up to room temperature for several weeks, it needs to be reconditioned before sowing by freezing them. If you received the seed within a week of shipment and plan to sow within a couple of days, refrigerate the seeds until you use them. For longer term storage place them in the freezer. Make sure they are sealed to prevent moisture getting into the package.

When you are ready to sow, check the germination on the package. The minimum standard for strawberries is 60% germination. We do sell seed with germs this low on occasion, but most times germ is in the 70 – 90% range. Knowing this will help you during the process to determine the number of seeds to sow per cell.

One last tidbit about the seed. Strawberry seed can remain viable for two or more years depending on how it is stored. If frozen it can last beyond the two year period, though germination percentage drops as time goes on.

Media

The most important things to remember about germinating strawberry seeds:

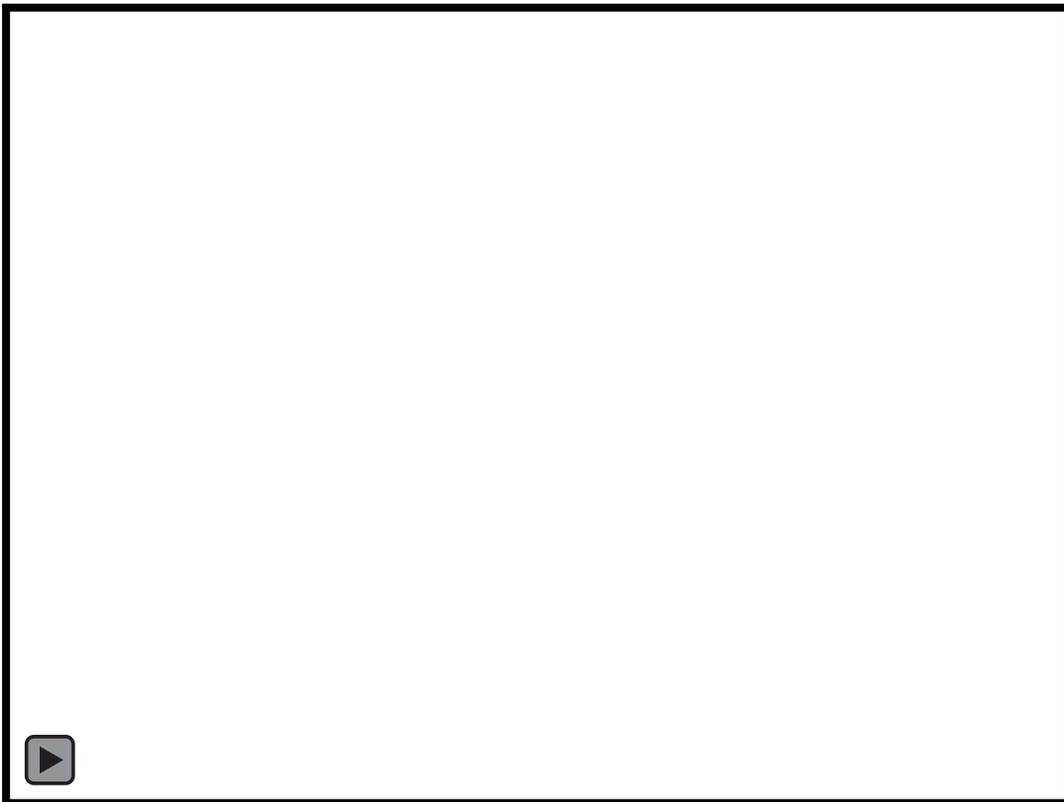
1. Do not let the media dry out during this process
2. Do **not** cover the seed, light aids germination
3. Use a well drained mix. We do not recommend using garden soil unless it is sterilized. Add sand or perlite to aid in drainage.
4. A mix with peat is preferred to other media due to the pH requirements of strawberries. Strawberries need a pH of 6.5 to 6.8. We have used coir but some source of coir have excessively high amounts of salt.

Here are reasons to consider using vermicompost in your germination mix, for strawberry seeds or for any garden seed.

Vermicompost:

1. Adds nutrition and many minerals to the mix
2. Has been shown to increase germination of seeds
3. Has been shown to protect seedlings from several diseases and insect pests.
4. Adds beneficial microorganisms to the media

Click the video to learn about the media mix and system used by TSS .

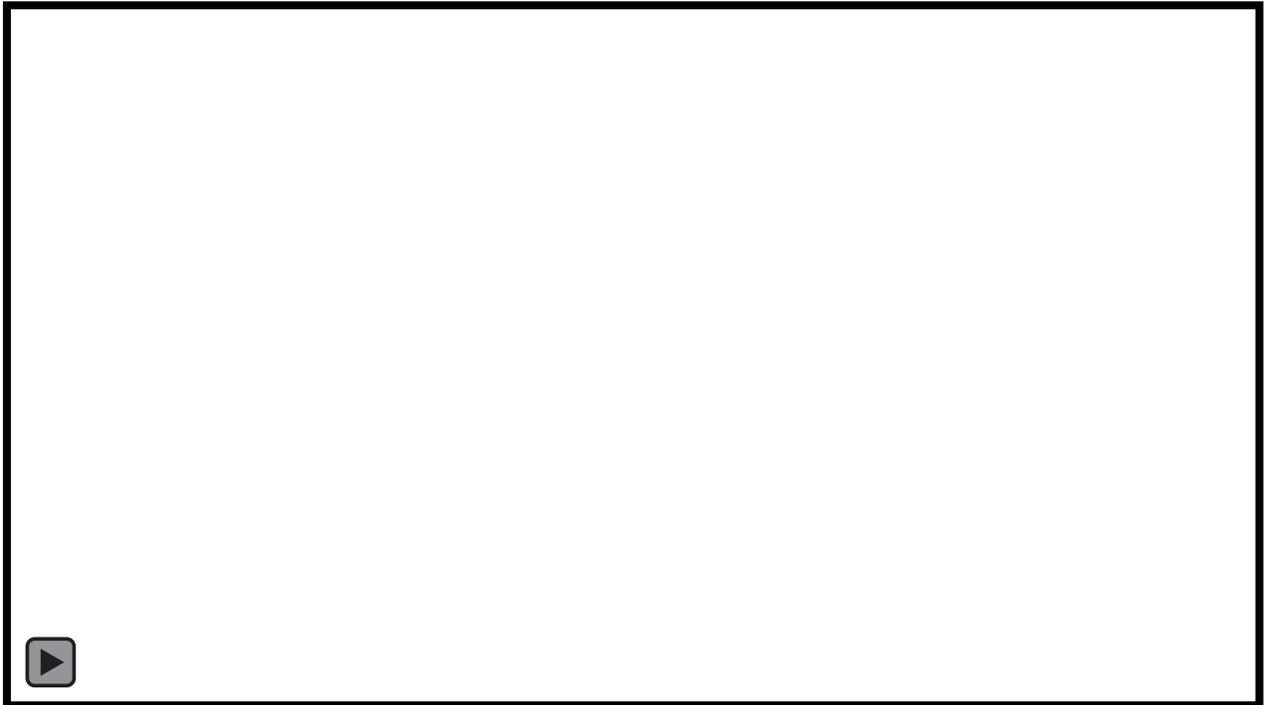


Before we move on, here are a couple of other tips. First, we do not recommend using peat pellets for germinating strawberry seeds. There is too high a risk that the surface will dry out and the seeds will die. Even if you are an experienced gardener it is a risk.

A second precaution involves using compost in your seedling mix. If the compost is stable and is no longer heating you are part of the way there. Compost takes a lot of time to decompose and to be consistent. If the compost has been turned frequently and thoroughly you should be ok. I have seen a number of cases of erratic germination results, or even slow death of seedlings due to the unknown composition of compost. To be safe, have it analyzed before using it in germination mixes. Seedlings can be particularly sensitive to excess salts, improper pH and other characteristics of compost that has not completely decomposed.

Sowing

Click the video to start it.



Germination System

Not all systems have to be complicated. Over a number of years we have tested many systems to germinate strawberry seeds. This is the one that seems to work best for us and it's the simplest one we use to date. Click the video to start it.



Post Germination

If you continue to soak the cells in a tray of water you run the risk of some pretty serious pest problems including Pythium and fungus gnats. As soon as the first seeds start to sprout the tray needs to be taken out of the water and placed in a well lit area. Under no circumstances do we recommend that the tray should be in water for more than 7 or 8 days. Click the video below for more details.



Wrap Up

Should you have questions about this process please contact us. We want you to be successful and to enjoy the growing process as much as you will enjoy the fruit that you harvest.

We intend to update this document with new information and/or videos as time goes on. Check back from time to time to see if the version has changed. The version is just below the title on page 1.

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