

Summary of 2025 Field Study

Plant Type: Cherry Tomatoes, "Sweet 100"

Summary: On 20 June 2025, we planted 4 "Sweet 100" cherry tomato plants in 3 gallon pots. The base soil was fresh potting soil; all got an initial dose of tomato fertilizer, and the same amount of water. We used 4 different ratios: control, 12:1, 20:1, and 30:1. For example, 20:1 means 20 parts of the potting soil, and 1 part of the SAI blend of biochar, plant compost, animal compost, beneficial bacteria, beneficial fungi, and a water retention ingredient. All materials are certified by the Ca EPA and by the CDFA, and all are certified organic except for one. All 4 started at 17cm tall.



Photo 1: L to R, "Control", 12:1, 20:1, 30:1.

10 July 2025 Update: While all 3 SAI plants currently have 8 tomatoes, and the control plant has 2 tomatoes, the 20:1 plant is much larger than the others. The 20:1 plant is 74cm tall and 66cm wide, while the control plant is 41cm tall and 32cm wide. The largest leaf on the 20:1 plant is ~2x larger than the largest leaf on the control plant.

Preliminary conclusion: in 2025, this is the third tomato type where the 20:1 ratio seems optimal in fresh potting soil. This is down from the 12:1 ratio seen in 2024. We attribute that to this year's blend includes mycorrhizae fungi, presumably enhancing nutrient uptake from the soil.