Biological Hoticulture...In Action

Alison Kutz-troutman

Back in 2003, North Creek Nurseries in Landenberg Pennsylvania, began to experiment with aerated compost teas. Partners Dale Hendricks and Steve Castorani were determined to see for themselves if adding the biological boost of these materials would make a difference to their plug holding and overwintering qualities, as this is where the stress was the greatest in their production system. Grower Tim McGinty was put to the test to figure out how to make trial compost teas for the company.

After a few compost tea drenches, they could easily see the difference in root health and made some cultural decisions to reduce fungicide applications on some liner crops going into the cooler months. They also saw a reduction in need for other fertilizers and a much-reduced stress reaction in the plants going into the fall. Still working on their trials this year, they are focusing on the deeper landscape plugs, which have shown a good response to the compost teas. The plugs have stronger root architecture and less top growth, both of which save on trimming and make shipping much easier. Their healthy plants are easier to maintain and can hold longer in plug stage without any negative effect to the plants.

The tea was diluted from their small compost tea brewer, just enough to get a good irrigation into the soil media. North Creek Nurseries carefully selected tea composts from regional sources and used a combination of a good organic mushroom compost and a high-grade worm compost.

Notes and Observations

North Creek Nurseries’ Steve Castorani made the following observations in regard to the compost tea trial:

- “We noticed that by using the tea we had less (top growth) or re-growth as compared to juicing the plants with conventional liquid feed. This is important in that it reduced maintenance on our plugs, as we don’t have to cut back the foliage to keep them in top form. It also reduced the need for additional water; with less foliage there is less evapotranspiration.”
- “We did the experiment on our line of Landscape Plugs, which are native plants that North Creek developed for the landscape and restoration market. The other noticeable trait is that even though we reduced foliar growth, the root growth was actually enhanced. When foliar growth is trimmed to keep the plants in good condition, the plant usually adjusts by reducing root mass to compensate for the loss of foliage. By slowing the top growth, the plant is able to retain more root mass. Having strong, healthy roots is the most important thing when transplanting these plugs into the field or on the job.”
Alison Kutz-Troutman is the owner of Sound Horticulture, which specializes in the use of compost teases, biological fertility, beneficial insects and biocontrol systems for greenhouse growers. Reach her at Alison@SoundHorticulture.com.