

## TECH TIP: FINAL PUSH STRATEGIES FOR GARDEN MUMS

When you're starting to see shaded garden mums (a.k.a. mums grown under blackout cloth) at retail and earlier, natural-season varieties in the homestretch, it's easy for your anxiety and sense of urgency to ramp up. If you're one of the many growers feeling the pressure on your mum size, here are a few strategies and other things to consider.



Start by asking yourself, "How far off is my crop, actually?" Before you do anything drastic, get a solid handle on how much of a growth deficit you need to make up in the next few weeks. Don't go off a feeling here—you need to measure your plants before making crop management decisions. Here are a few rough benchmarks and catch-up strategies for each "deficit group":

**Minor growth needed.** If your mums still need 1 to 2 inches of growth, sizing-up without taking drastic measures is still feasible for mid-season and later varieties. Earlier varieties may be more challenging but should still hit the mark (or be very close).

Action plan: Under normal conditions, most growers are reducing feed rates by now, but keep
applying fertilizer until buds are roughly pea sized. Nitrate-based fertilizer formulations with a
low amount of phosphorous will keep growth moving while minimizing the risk of pushing
axillary shoots out from lower in the canopy and covering buds.

**Moderate growth needed.** If your mums need 3 to 4 inches of growth to hit spec, quick action is critical, because the window of opportunity to put growth on mid- and late-season varieties is almost closed. Early varieties needing this much growth will likely finish small, and pushing hard at this point may cause bud abortion or plants to be soft at retail.

• Action plan: Flag a few plants and mark the current shoot height. Do 1 to 2 heavy fertilizer applications (300 to 350 ppm) with a nitrate-based fertilizer (one feed with something like a 20-10-20 at most) and maintain a moderate soil moisture level this week; don't let your crop drydown as thoroughly as you normally would. This will help keep nutrients in solution, reduce the chances of high EC stress (and potential bud abortion) occurring, and allow plants to take up the feed more readily. Mark crop height on the flags every three days to gauge the growth rate. When plants reach about 2 inches below spec, reduce feed to 250 ppm for a couple of applications and then to 200 ppm until buds are pea sized.

**Major growth needed.** If your crop needs more than 4 inches of growth to reach your desired finished spec, it's time to make some tough decisions. An inch of growth per week is feasible during the main vegetative growth phase in June and July, but once flowering is induced (which is the case for most mums by now) this is not realistic without sacrificing crop quality.

- Action plan: If you're contract-growing to a certain spec, it's time to give your customer a call
  and ask which is their bigger priority—size or tone? Prioritizing the relationship with your
  customer will pay dividends in this situation, so don't wait to let them know their plants might
  be a little bit below size until the day before plants ship.
- If size is the bigger priority for you or your customers, follow the steps above for "moderate growth needed." Pushing the crop harder than this will undoubtedly result in buried flower buds and soft plants that will lodge and fall apart at retail (or in the hands of consumers). If you truly feel compelled to do 3 to 4 heavy feeds before tapering-off your fertilizer program (rather than 1 to 2), consider a paclobutrazol drench once plants reach the "as big as they're going to get" point. If applying a PGR drench to help with tone, do so at least five days before ship or sale to achieve the desired effect, as this process isn't instantaneous.
- If tone and dense flower color is the bigger priority, use the "minor growth needed" action plan provided above. This will help tighten up the canopy a bit more and ensure that, while smaller than you'd like, plants will perform well for your customers. Also, consider repositioning them as large, fall container inputs at retail or pair them with other fall annuals like smaller cabbages or kales in larger deco pots (if you have some on hand or can get them quickly) to add value that may have been lost by their smaller finished size.