

Suwannee Valley Watermelon Crop Update- April 6, 2020
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Hello watermelon growers and allied industry reps as well. I hope everyone is doing well and staying safe. Just a reminder, contact your Extension agent to let them know what needs you have, and we will try to determine how we can help. Urgent crop situations that may need a farm visit to solve will require special permission for that travel. We all want you to know we want to figure out how we can assist you and the crop needs.

Disease update: The crops still look very clean now. We have confirmed a new gummy stem blight incidence in the region, but I would still suggest it likely came in on infected plants, but may not have been obvious the day of planting. The only other confirmed reports of gummy stem blight were isolated shipments of infected transplants. Fields with clean transplants are still clean. As a result, I recommend staying on a weekly Bravo or other chlorothalonil schedule for this early part of the season, perhaps the first four sprays or so. This is the recommendation for the clean fields. Inspire Super or other targeted material for gummy stem blight should only be used at this time if you have a confirmed case of gummy. So, just because we have those few cases, likely attributed to infected transplants on arrival, that does not mean everyone should even be thinking of starting with the “big guns”.

Spray and wind burn: The most common photos or plant samples sent to me for further investigation have resulted in symptoms associated with mild spray burn, often from Bravo used in the middle of those hot days. Careful with pushing the rate to the high end, and careful spraying in the middle of the day, or even mid to late morning on hot days. The spray burn is generally a brown or bronze cast on the upper leaf surface only, not usually seen on the lower leaf surface. We also have wind-burn damage showing similar burn symptoms as a result of the high winds and blowing sand last week. If in doubt, feel free to send us photos.

Sending photos will be very important this year as a means of early detection of problems.

Insect update: We still see evidence of thrips feeding on watermelon leaves. The feeding symptoms are small random scratched areas on upper leaf surface. Thrips pose little economic concern in watermelons, so don't be alarmed if you see this feeding damage. Squash bug adults continue to be active and have posed a threat in certain fields. Squash bugs pierce and suck on the watermelon plants and seem to prefer the base of the stems. We don't fully know the damage from this insect, but early in the season when plants are small, they can cause serious damage to young transplants. Scout the field perimeters, as this is where they move into the fields first. If only the perimeters have squash bugs, spray only the perimeters so you minimize killing beneficials throughout the field. We have seen excellent results of killing squash bugs with a spray applications of Bifenthrin at night. Follow labelled precautions for bees as well. By the way, we have completed our squash bug trap cropping system research trial on two farms in Levy County. We wanted to see if we could attract them to the extra

squash plants planted on the perimeter of the fields and kill them on the squash plants before they migrate to the watermelons. We are excited to report, this idea might just work. The numbers on the squash plants were much, much higher than on watermelons next to the squash. We are compiling the data and will report back to you.

Leaf tissue and petiole sap testing: This is a service we will still try to provide, but it may be on a very limited basis this year due to travel restrictions in some counties. In some cases, farmers are pulling the petiole samples and leaving them at a “drop off” location for us to pick up. Let us know if you need advice on managing your fertigation program. Remember leaf tissue samples can also be sent to a commercial lab for analysis and we can help interpret those results for you. Many petiole samples taken this past week have been high to very high in nitrogen, still pulling nitrogen from the bed fertilizer. The sap tests are very helpful in determining when to start your fertigation program. Most fields are 4-5 weeks from planting. A bed fertilizer of 60 or more lbs per acre of nitrogen should not need nitrogen fertigation before 4-5 weeks. This is of course, dependent on the bed fertilizer not being leached early. So, we are entering the critical stage now to know when to start fertigations and a sap test will help with that decision. Once started, the amount of nitrogen and potassium through fertigations is more set in a typical schedule. What varies among you guys more is the pre-bed fertilizer.

Rate of plant growth: There have been questions of what can be done to slow the plant’s growth rate to push back harvests into later May. Questions have been received about using gibberellic acid (example, ProGibb). It is labelled for melons, including watermelons, but for increasing fruit set in cool conditions, not delaying fruit set. Also, good ole copper is known to slow growth. Copper at high rates is toxic to watermelons and other cucurbits and that toxicity will have adverse effects in watermelon due to this copper toxicity. I do not recommend either of the practices to try to push back harvests to a later date. The risk of overall negative impact needs to be considered too. Any impact is likely to be very small, a couple days at most.