

LETHAL VIRAL NECROSIS INFORMATION ON A VIRUS DESCIMATING LAWNS IN FLORIDA

This document summarizes our presentation regarding Lethal Viral Necrosis. As background for the presentation, we obtained information from the University of Florida Extension Service, the Florida School Plant Management Association and other sources.

What is Lethal Viral Necrosis? This is plant death occurring from cellular damage when a susceptible grass is infected with the Sugarcane Mosaic Virus. Once a susceptible grass is infected, the lawn will die. Lawns typically completely die in 1 ½ to 3 years. There currently is no treatment nor cure.

<u>Which grasses are susceptible?</u> Floratam, a common variety of St. Augustinegrass, is the most prevalent susceptible grass. There are also varieties of grasses that host the virus but aren't killed by it.

Why is this a problem? Your neighborhood has Floratam grass which has the potential to be infected by this virus. The virus is currently located in collier and lee county.

<u>How does the virus spread?</u> The virus lives in the sap of the grass. When the sap is transmitted to other surfaces, the virus goes along for the ride and deposits itself on other susceptible grasses. The sap is most easily transmitted when grass is freshly cut or when the grass gets wet. Mower blades and tires, trimming strings, soles of shoes or anything else that touches the sap of infected grass can pick up the virus and move it from one location to another. Once the plant sap dries, the virus dies. Things that "grind" into the grass, like tires, the feet of ladders, or possibly soles of shoes, are the most likely to pick up the virus and move it along.

What can be done to prevent getting the virus? Awareness and cleanliness can help minimize the risk of spreading the virus. For example, if tires (including mower, golf cart or other vehicle tires) come in contact with grass that could possibly be infected, they should be kept off of other possibly susceptible grassy surfaces until any contaminant which may have been picked up has been washed off with an appropriate cleaner (i.e.: Lysol) or has thoroughly dried. Shoes, or other items which may transport the virus from one location to another should likewise be kept from cross-contaminating susceptible grassy areas.

How will we know if a particular grass is a susceptible variety or not? Given the prevalence in Florida of Floratam and other varietals that host the virus, it should generally be assumed the landscape grass is susceptible. However, there are places, like golf courses, where grasses used for fairways or greens are typically not susceptible nor host grasses. Even in places with "safe" grasses, it is still possible that in general landscaping surrounding those areas that a susceptible grass may be present. In general, if you're not sure that the grass is one not susceptible to the virus, it is best to err on the side of caution.

How will we know where the virus has already infected the grass? There are many conditions which cause stress to lawns. Several of these conditions look like lethal viral necrosis. In many cases trained individuals can diagnosis the condition. In some situations, it requires laboratory testing to determine the presence of the virus. Most people will not know if a lawn is impacted or not. Keep in mind, some grasses can carry the virus and not show signs of die-off. Since we won't know when or if a lawn has the virus, it is best to treat them all as potentially impacted.

What can be done if the virus infects a lawn? At that point, it is a matter of time until the lawn fully dies. The lawn will need to be replaced with a resistant grass variety.

Can anything be done preemptively to avoid the wide-spread die-off of an infected lawn? Prior to a lawn being infected or after infection but prior to decimation, the lawn can be "plugged" with patches of a resistant grass. This allows a resistant grass to establish itself and take over when / if the susceptible grass becomes infected. It should be noted that different types of grasses have different growth habits. For example, Floratam grows taller than Palmetto, a resistant St. Augustinegrass cultivar. Since Floratam is also an aggressive grass, plugging in the presence of Floratam works best with relatively large patches (1 x 1 ½' or 3 x 3') of the resistant grass. This can result in a "patchwork" appearance of the lawn until such time as the healthier grass takes over. (It should be noted that the best grass varieties for lawns in our area grow from runners and therefore cannot be "seeded" by topdressing.)

What actions should you consider now?

- Educating our community. The more people who understand what is going on with lethal
 viral necrosis and its implications, the better our odds for delaying its appearance in your
 neighborhood. While there currently are no effective treatments, research is starting.
 Keeping the virus out of our neighborhoods may buy time for those working on finding
 cures or treatments and those working to create greater availability of a wider variety of
 resistant grasses.
- 2. Limiting risk by restricting service providers who don't adhere to best practices to minimize the spread of the virus. There are a number of service providers in the community who come in contact with your lawns. In your community, you can ask (or require) that service providers who will be on the grass adhere to best practices to mitigate the spread of the virus.
- 3. Preparing for the likelihood that the virus will find its way to your community at some point. This might include determining if it is preferable to plug lawns to establish patches of resistant varieties or not and, if so, whether to do that prior to the arrival of the virus or after it begins to impact a lawn. This might also include preparing for the financial impact of addressing this problem.