WHEAT STREAK MOSAIC VIRUS

I feel like a broken record, repeating the same story year after year, telling farmers they need to control volunteer wheat before planting in the fall to prevent problems with the wheat streak mosaic virus the following spring.

Then I realize that many of you are married.

What does being married have to do with me sounding like a broken record? Simple. You weren’t listening the first five times I told this story anyway, so you won’t even notice that I’m telling it again.

You know, in spite of what my wife may have told you, I do listen to hear. Just last night, before she stormed out of the room she said, in a rather loud and annoyed sounding tone, “You’re not listening to me again!”

I heard that.

Recent rains have produced a nice flush of volunteer wheat that could lead to a significant wheat streak mosaic virus infection, if left growing until wheat planting time. The key to controlling wheat streak mosaic is to kill all nearby volunteer wheat fields at least two weeks before planting.

Wheat streak mosaic is a virus that can cause a yield loss anywhere from as little as 10% or all the way up to 80%, depending on the level of infection and when it occurred. Infections occurring in the fall will cause more damage than spring infections because there is more time for
the virus to move farther across the infected field.

The wheat streak mosaic virus doesn’t spread from plant to plant on its own. Instead, the virus is transmitted by curl mites that have blown in from an infected field. With prevailing winds in Kansas generally blowing from south to north, new wheat fields planted to the north of infected fields are the most likely to be infected.

When we find wheat streak mosaic infections they are usually most severe on the southern edge of an infected field, with the wheat gradually improving as we walk farther north into the field.

Wheat streak mosaic virus symptoms include a yellow discoloration of leaves, stunting, and yield loss. Yellowing is most severe near the tips and stunting is more pronounced when plants are infected before tilling. Infections that occur early in the fall can cause a rosetting effect, with plants sort of flattened out in the center before growing upward and producing heads. Yield loss in rosetted fields will be severe.

The reason we need to control volunteer wheat is to starve the curl mites that are spreading the virus. Volunteer wheat needs to be dead at least two weeks prior to planting. Therefore, if a herbicide will be used to kill volunteer, an extra two weeks should be included to give the herbicide time to work. If you spray with glyphosate, allow two weeks for the volunteer wheat to die, then another two weeks before planting.

The last thing I want to ask you to do is to look across the road to see what your neighbor is doing. If it looks like that neighbor is going to plant wheat, your volunteer wheat probably needs to be killed sooner rather than later.

I’ve said it before, but I’ll say it again, just in case you weren’t listening the first five times. Please be a good neighbor – control your volunteer wheat!
If you have questions, you can reach me at the Riley County Extension Office at 785/537-6350. Or, you can send e-mail to gmcclure@ksu.edu.

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