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Tar Spot Confirmed in NEK

The first map tracking Tar Spot in corn is out – and the growing season has begun with Northeast Kansas as the first confirmation of the year. K-State Research & Extension Row Crops Pathologist Dr. Rodrigo Onofre confirmed this troublesome disease last week in corn fields in Doniphan and Atchison Counties, almost three to four weeks *earlier* than in 2023.

While earlier than we'd like to see it, it's not completely unexpected. The Corn Belt area affected by Tar Spot has been increasing since 2018 (<https://corn.ipmPIPE.org/tarspot/historical-end-of-season-maps/>) and in Kansas since confirmation in 2022. We now have established pathogen sources in corn residue across much of the northeast part of the state allowing this disease to get a start as soon as conditions allow.

What exactly are those conditions? Temperatures in the 60–75 degree range are optimum, but last summer showed it can withstand higher temperature thresholds as well. A big part of the issue is hours of leaf wetness, with this pathogen preferring greater than seven hours. Even when we see a lack of measurable moisture, heavy dew can contribute to Tar Spot development.

While treatment may be warranted as the season progresses, scouting is the best management right now. Every field will be different. Hybrid susceptibility and previous crop management both affect pressure. In the wise words of University of Wisconsin Field Crops Pathologist Damon Smith: *Resist the temptation of spraying before V10! Margins are tight and multiple apps are generally not needed. Keep the fungicide option if/when you need it making informed decisions through scouting and/or apps.* Confirmed levels have been low. Unless scouting dictates, fungicide applications are not yet warranted. Be aware of disease presence and scout fields accordingly, planning ahead for fungicide applications if needed.

If a fungicide application is needed, excellent products are available. You can compare efficacy on specific diseases in a reference entitled *Fungicide Efficacy for Control of Corn Foliar Diseases* that includes product ratings from Plant Pathologists across the country. It is available in District Offices or by request via e-mail to dhallaue@ksu.edu. Access it online at: <https://cropprotectionnetwork.s3.amazonaws.com/corn-foliar-efficacy-2024-1709214762.pdf>. Four years of data from Darcy Telenko (Purdue) and others show definite efficacy differences among products as well as when comparing single versus multiple mode of action products.

Tar Spot can be a challenging pathogen and while this early season confirmation doesn't mean we will *have* to do something, it increases the need for vigilant scouting to stay ahead of its development. For more information, don't hesitate to drop me a line. An article in last week's KSU Agronomy eUpdate by Dr. Onofre is a great read as well. You can request a copy as referenced above or online at <https://eupdate.agronomy.ksu.edu/>.