

AG NOTES

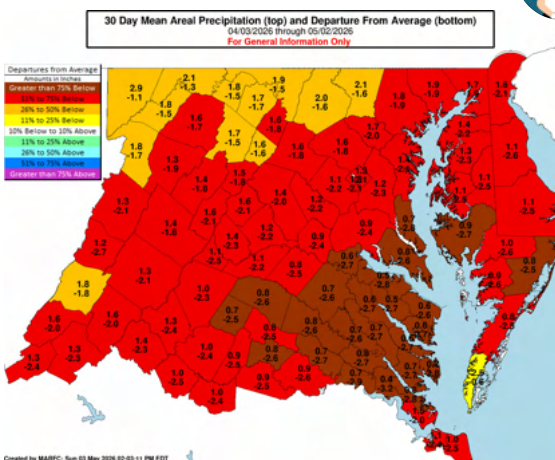
University of Maryland Extension | Harford County

Hello Harford County!

As we roll into May, the story that continues to persist on the minds of many is the weather. Most of Maryland, including Harford County, has been upgraded from a moderate drought (D1) to a severe drought (D2). While we have gotten some showers over the past week, we are still exceptionally dry and we are about 4 inches below average rainfall since January 1 and 7 inches below average since November. According to the National Oceanic and Atmospheric Administration (NOAA), we are currently in the seventh driest year on record dating back to 1894.

April also brought us some wild temperature swings of 80 degree-days followed by several days of cool temperatures and even frost in some locations. NOAA's one-month weather outlook for May is calling for a continued cold trend of below-normal temperatures but average rainfall; so perhaps we will catch some needed showers.

Switching gears I would like to thank everyone who came out to our open house event on April 25; we had a great turnout. I would also like to thank all of the 4-H families and Master Gardener volunteers who helped make the event a success.



I would also like to make everyone aware of upcoming Extension office closures: May 12 and May 25. All of our office faculty and staff will be in College Park on May 12 for a statewide University of Maryland Extension meeting and we will also be closed on May 25 in observance of Memorial Day as we remember our brave servicemen and women who paid the ultimate sacrifice for our freedom.

Until next time,
-Andy



The Extension Office will be closed on May 12 for a statewide meeting and May 25 for Memorial Day

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MDE Approves New Statewide Animal Feeding Operations Permit

Maryland Department of Environment [press release](#)

The Maryland Department of the Environment (MDE) announced the approval of a new statewide general discharge permit for animal feeding operations (AFOs), completing the renewal process required under the federal Clean Water Act.

The permit will take effect on May 8, 2026.

The permit establishes requirements for large and medium animal feeding operations to manage manure, litter, and wastewater in a manner that protects water quality in Maryland's rivers, streams, and the Chesapeake Bay. It applies to poultry operations, dairy farms, cattle operations, and other agricultural operations.

"Maryland's farmers play a vital role in our economy and our food system," said Maryland Environment Secretary Serena McIlwain. "This permit provides clear, consistent standards to support agricultural operations while ensuring the protection of our waterways and communities."

The renewed permit reflects input gathered through a series of public meetings, stakeholder engagement sessions, and written comments received during the formal public comment period. The Maryland Department

of the Environment worked in coordination with the U.S. Environmental Protection Agency to finalize the permit.

Animal feeding operations covered under the permit are required to implement comprehensive nutrient management plans and comply with conditions designed to prevent discharges to surface waters. These requirements are part of Maryland's broader strategy to reduce nutrient and sediment pollution and meet water quality goals.

Additional information, including the final permit and supporting documents, is available at: <https://mde.maryland.gov/>.



Maryland
Department of
the Environment

MEAT PROCESSING IN-DEPTH TRAINING Sponsorship Program

The Meat Processing In-Depth Training Sponsorship Program is a competitive opportunity designed to support individuals currently working in the meat processing industry who are seeking to advance their technical skills and industry knowledge.

Selected participants will be sponsored to complete the Related Technical Instruction (RTI) portion of the Penn State Butcher Apprenticeship Program. This training provides intensive, hands-on education in meat cutting, butchery techniques, product fabrication, food safety, and related technical competencies essential to the meat processing workforce.

This sponsorship is part of a broader regional effort led by University of Maryland Extension.

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The End of Gramoxone: What Growers Should Know

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University of Maryland Extension

Syngenta recently announced it will stop manufacturing Gramoxone at the end of June. The product contains paraquat, a widely used herbicide for controlling weeds before planting, at planting and post-directed after crops emerge. Paraquat is an important tool for managing tough weeds, including herbicide-resistant weeds such as Palmer amaranth. Only the Gramoxone brand of paraquat will be discontinued. Based on current estimates, Gramoxone supplies should be adequate for 2026, but growers may want to begin exploring alternative brands.

Other paraquat brands may not be labeled for all the applications listed on the Gramoxone label. For example, only certain formulations allow post-directed applications in cucurbit crops such as watermelon. Because labels vary, fruit and vegetable growers should carefully review each paraquat label and follow all state requirements before applying.

Product	Manufacturer	Cucurbits	Orchards/Vineyards	Solanaceous
Axil Solutions Paraquat 3SL	Axill Solutions LLC	No	Yes	Yes
Better Choice Brands Paraquat 3SL	Better Choice Brands, LLC	Yes	Yes	Yes
Devour	Invictus Crop Care, LLC	No	Yes	Yes
Gramoxone SL 3.0	Syngenta Crop Protection, LLC	Yes	Yes	Yes
Helmquat 3SL	Helm Agro US, Inc.	Yes	See label	See label
Paraquat Concentrate	Solera Source Dynamics, LLC	No	Yes	Yes
Para-Shot 3.0	Sharda USA, LLC	No	Yes	Yes
Parazone 3 SL	AMVAC Chemical Corporation	Yes	Yes	Yes
Quick-Quat	Drexel Chemical Corporation	No	Yes	Yes
Willowood Paraquat 3SL	Generic Crop Science, LLC	No	Yes	Yes



Small Grain Disease Update

Andrew Kness, Senior Agriculture Agent | akness@umd.edu
University of Maryland, Harford County

As we get into the month of May, wheat will be heading and growers will have to consider a fungicide application to manage Fusarium head blight (FHB), the most troublesome and challenging disease of small grains in our region. FHB not only has the potential to reduce yields, but the fungus that causes FHB also produces a mycotoxin that affects the grain quality, rendering it too dangerous for consumption. This toxin is deoxynivalenol (DON), also known as vomitoxin for its tendency to make livestock vomit if ingested. Elevators test every load of wheat for DON and prices are docked or entire loads rejected if DON levels exceed defined thresholds. Therefore, it is imperative that growers take steps to minimize DON concentration in their wheat.

The first step in managing DON is growing a variety that is less susceptible to *Fusarium graminearum*, the causal agent of FHB. We are obviously past this point in the growing season so management shifts to weather predictions, modeling, and fungicide applications to manage DON.

FHB is favored by warm, wet conditions during flowering. As you know, we have been very dry up to this point but pay close attention to conditions as wheat begins to flower. If the rains return, we can go from low FHB probability to severe in a matter of days. The Fusarium Risk Assessment tool can help you predict and model FHB risk. Access the tool at wheatcab.psu.edu and run the model based in your variety's resistance traits.

If you choose to apply a fungicide to manage FHB and DON, be sure to use a product that has efficacy on the disease. Fungicide efficacy tables can be accessed from the [Crop Protection Network](#). Products with the best efficacy against FHB include Prosaro Pro SC, Miravis Ace SE, Sphaerex, Prosaro 421 SC, and Proline 480 SC. Do not use any products that contain a group 11 fungicide (Qoi/strobilurins) after heading because these chemicals can increase DON production.

Fungicides should be applied at flowering, or Feekes Growth Stage (FGS) 10.5.1. FGS 10.5.1 is reached when 50% of the tillers have yellow anthers protruding from the

center of each head (Figure 1). The window of application remains open for about 5-7 days after FGS 10.5.1. Some products claim wider application windows, starting at FGS 10.3 (1/2 head emergence); however this timing is sub-optimal to an application made at flowering or 5-7 days later. This is because the fungicide has to come in contact with the heads in order to offer protection and secondary tillers are still well within the boot at FGS 10.3.

Last year we had several wheat fields that had uneven head emergence due to uneven germination in the fall. If you have fields this year that are showing uneven development, your FHB fungicide application should lean towards the later part of the 7 day interval in order to catch as many emerged heads as possible.

Flat-fan nozzles angled straight down should be avoided. Instead, use nozzles angled 30 to 45 degrees forward or dual nozzles (angled front and back) for best coverage. Ground applications should be made with at least 10 to 15 gallons an acre of carrier water and aerial applications should be made with 5 gallons per acre.

If growers encounter a particularly bad field of wheat infected with FHB during harvest, combine settings and fan speeds should be adjusted to blow out as many of the light, infected kernels as possible. DON levels can increase while in storage, so grain should be dried quickly to 15% for short-term storage and below 12% for long-term storage.



Figure 1. Wheat with yellow anthers in center of head, FGS 10.5.1 (A. Kness, Univ. of Maryland).



USDA Designates Nine MD Counties as Primary Natural Disaster Areas

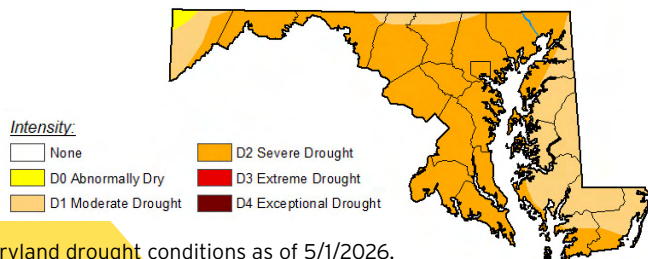
Maryland Department of Agriculture [press release](#)

Due to ongoing dry conditions during the growing season, nine counties in Maryland have received drought disaster designations from the United States Department of Agriculture (USDA). Farmers in the primary designated counties of Allegany, Carroll, Charles, Frederick, Garrett, Howard, Montgomery, Prince George's and Washington are now eligible for certain assistance from the USDA Farm Service Agency (FSA).

This drought disaster assistance includes FSA emergency loans. Provided that eligibility requirements are met, the FSA will assess each emergency loan application individually to consider specific circumstances and needs. Farmers in eligible localities have eight months from the date of the disaster declaration to apply for these emergency loans.

According to the [U.S. Drought Monitor](#), these counties suffered from a drought intensity value during the growing season ranging from severe for eight or more weeks to extreme or exceptional.

For more information on available assistance programs and the application process, please visit the Maryland FSA State Office website at <https://fsa.usda.gov/state-offices/Maryland>.



Maryland drought conditions as of 5/1/2026.

MDA's Statement Impact of Late Spring Frost on Crops

Maryland Department of Agriculture [press release](#)

Early the morning of Tuesday, April 21, farmers across Maryland experienced one of the most significant crop losses in recent memory due to a late spring frost. Since the onset of the frost, the Maryland Department of Agriculture has been in touch with those vineyards and fruit growers across the state that have been hit the hardest by this late season freeze. Initial reports from growers indicate a loss of up to 100% of certain fruit crops, while damage to other crops won't be fully realized until later in the growing season.

Farming comes with inherent challenges, and while setbacks like this are familiar, they are no less devastating—especially amid rising costs and ongoing economic pressures. The Maryland Department of Agriculture stands with our growers during this difficult time and continues to work closely with partners at the U.S. Department of Agriculture to identify and share information about available assistance programs.

Farmers affected by the frost are encouraged to contact their [local Farm Service Agency office](#) for guidance and support. We strongly urge all Marylanders to support our farms and communities by buying local—your purchases can make a meaningful difference for the families and small businesses that help keep our state nourished.

Editor's note: For a detailed write-up of how to manage orchards after a freeze event, I recommend reading [this detailed article from Penn State](#) or contact our office for a print copy.



Proposed Settlement Announced in Right-to-Repair Litigation Against John Deere

Paul Goeringer, Agriculture Law Legal Specialist
University of Maryland, Agriculture Law Education Initiative

This article is not a substitute for legal advice. Reposted from the [Ag Risk Management Blog](#).

Introduction

As farm equipment has become more sophisticated, the opportunity for operators and independent mechanics to work on that equipment has become increasingly difficult. Many of the major equipment manufacturers limit operators to working only with their authorized dealers for repairs. This can often increase costs to operators and wait times for repairs during critical times of the year. Independent mechanics and operators have pushed for years for the right to repair this equipment without going through these authorized dealers.

Recently, a proposed settlement was filed with a federal court to resolve a multidistrict lawsuit brought by independent mechanics and farm operators against John Deere for antitrust violations arising from its practice of limiting repair services to authorized dealers. If approved by the court, the settlement would allow repair of John Deere equipment beyond authorized dealers. The motion to approve the settlement was filed in *In Re: Deere & Co. Repair Services Antitrust Litigation (MDL No. 3030)*.

Background

This lawsuit originated in 2022, when the federal courts consolidated a number of lawsuits brought against John Deere, alleging that Deere had violated the Sherman Antitrust Act by monopolizing the right-to-repair for farm equipment by allowing it only through authorized dealers. The claims are that Deere restricted access to diagnostic software that would have allowed independent mechanics and operators the ability to handle repairs. These cases were consolidated into one multidistrict litigation in the Northern District of Illinois, creating a class action lawsuit. This lawsuit has survived multiple attempts by John Deere to have it dismissed.

This case was strengthened when the Federal Trade Commission, the Minnesota Attorney General, and the Illinois Attorney General filed an antitrust lawsuit against Deere. This lawsuit also claimed that Deere violated the Sherman Antitrust Act by limiting farmers and independent mechanics access to diagnostic software. This case was filed in the Northern District of Illinois in early 2025.

In the lawsuit, the plaintiffs and Deere entered into mediation to attempt to settle the lawsuit. The proposed settlement announced on April 6, 2026 is the product of those negotiations through the mediation process.

Terms of the Proposed Settlement

The proposed settlement announced on April 6, 2026, provides a number of key things that potential class members should be aware of. The first key term in the proposed settlement is that it will provide injunctive relief preventing Deere from limiting access to diagnostic software. If accepted by the court, this will allow operators and independent mechanics access to software that enables repairs beyond authorized Deere dealers. At the same time, Deere will have to make reasonable and fair efforts to provide access to future diagnostic software. This future access would have been made available to operators and independent mechanics as soon as 50 percent of Deere's authorized dealers have access to the software. Access to Deere's Operations Center PRO Service to perform offline diagnostics will need to be made available by the end of 2026. Deere will also have to provide access to its Dealer Technical Assistance Center ("DTAC") Solutions by the end of 2026. Allow the same group to report potential design and manufacturing defects to Deere. This injunction will remain in place for 10 years to allow the plaintiffs and the court to enforce the terms of the injunction.

Deere will also provide \$99 million into a qualified settlement fund for benefit of the class members. This fund will be used to compensate members of the class who sought repairs from John Deere due to its practices since 2018. The details on how these funds will be distributed to class members has not been announced at this time. At the same time, members of the class will have the opportunity to opt out of the settlement and bring their own claims against John Deere.

What Does This Mean?

It's important to note that this is currently just a proposed settlement. The federal district court will still need to accept the settlement terms. We should know if the terms of the settlement will be accepted by early summer. This proposed settlement is a significant win for those who have been advocating for the right to repair for some time. This proposed settlement will give farmers who buy or lease John Deere equipment the ability to either repair it themselves or seek an independent mechanic to repair it. This change will significantly reduce wait times when key equipment breaks down during critical times of the year. As details of the proposed settlement fund are announced, it will be easier for potential class members to understand whether they qualify for compensation. Until then, we will continue to need to monitor this situation.

2026 Harford County Farm Bureau Scholarship Program

Alice Archer, Harford County Farm Bureau Secretary
harfordfb@gmail.com | (443) 417-3505

The Harford County Farm Bureau Scholarship is available to applicants whose families are members of Harford County Farm Bureau. The applicant must be accepted or enrolled in a full-time accredited 2 or 4 year college, university, or technical school, and the applicant's chosen curriculum must be in an approved program in agriculture or an agriculturally related field.

The Harford County 4-H Memorial Scholarship is available to graduating high school seniors who have been a member of Harford County 4-H for a minimum of 2 years. The applicant must be accepted or enrolled in a full-time accredited 2 or 4 year college, university, or technical school. It is not necessary for the applicant's chosen curriculum to be agriculturally related. This scholarship was established to memorialize several Harford County

4-H members who lost their lives at a young age because of accidents or health issues. Funds for this scholarship come from donations and from the sale of 4-H livestock projects which are sold at the Harford County Farm Fair.

There is one scholarship application form, which can be used for either or both scholarships. To obtain an electronic copy, please contact the Farm Bureau office at harfordfb@gmail.com or call Alice Archer at (443) 417-3505.

The completed application and all requested information should be sent to: Harford County Farm Bureau, 3525 Conowingo Road, Suite 200, Street, MD 21154-1900. Applications must be postmarked by or delivered to the Farm Bureau office at the Harford County Agricultural Center by Tuesday, **June 2, 2026**.



Early Planting, Cold Soils, and What The Risk Really Looks Like

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University of Delaware

Warm conditions have allowed for rapid planting progress, but forecasted cold nights often raise concerns about seedling injury—especially during the first hours after planting when seeds take up water (imbibing).

A recent study from Ohio State evaluated cold stress during germination in soybean and corn (<https://doi.org/10.1002/agg2.70361>). They found that short periods of cold exposure (3-24 hours, down to ~35°F) had **minimal impact on final germination**. Soybean showed a small reduction (~7%) when cold lasted more than 12 hours, but germination still exceeded 85%. Corn germination was unaffected and remained above 93%.

These results align well with a University of Delaware/University of Maryland study on soybean planting timing (<https://doi.org/10.1002/agj2.70107>) where across multiple environments, planting date from mid-April through late May had little effect on soybean yield, even when early plantings experienced freeze injury or emergence issues due to inaccurate planting depth. Soybean plants were able to compensate through branching, maintaining yield potential.

Take-home points:

- Brief cold periods after planting are unlikely to significantly reduce stands.
- Soybean is more sensitive than corn, but still relatively resilient.
- The greater concern is prolonged cold, wet conditions or delayed planting.

Planting ahead of a short cold spell is generally a low-risk decision. Early planting preserves yield potential, and short-term cold stress during germination is unlikely to offset those gains.



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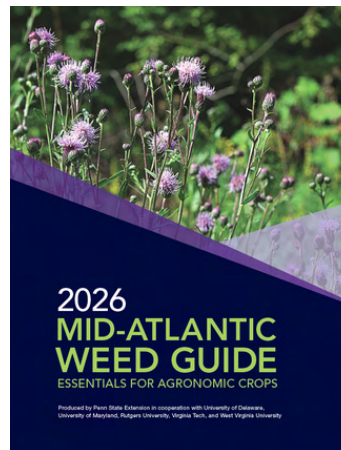
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Dates to remember

12 May. Extension office closed for statewide Extension meeting in College Park.

25 May. Extension office closed for Memorial Day.

06 Jun. Seminar: Fruits and Berries for Small Places. 10-11 AM. Baltimore County Ag Center, Cockeysville, MD. Free. Register [online](#) or contact Lexie Lesser at (410) 887-8090.



The 2026 Mid-Atlantic Weed Guide is available for purchase at <https://extension.psu.edu/mid-atlantic-field-crop-weed-management-guide>



May 2026