Update on Dicamba Use in Nebraska

With the introduction of Xtend dicamba-tolerant soybeans and cotton in the U.S., last year had a number of problems and unexpected issues. The immediate problem was that of widespread off-target movement of dicamba that damaged thousands of acres of non-dicamba tolerant soybeans. Nationally, over 3.5 million acres of non-dicamba tolerant soybeans were injured, with over 50,000 acres estimated to have been damaged in Nebraska.

Because of such widespread damage, in October 2017, the Environmental Protection Agency (EPA), in consultation with the three primary registrants of dicamba labeled for Xtend soybeans and cotton, classified those three products as restricted use pesticides (RUPs). The reclassification of the three products (XtendiMax, FeXapan and Engenia) added numerous additional requirements for applicators of those products, such as dicamba-specific training, additional record keeping, and use of specific spray equipment (see sidebar on page 2). To date just over 7,000 Nebraska applicators have completed dicamba-specific training. The hope is that familiarity with the product label and an awareness of the issues brought up during training will result in better stewardship of these products…and far fewer problems.

However, there are additional requirements that applicators of those products might not be aware of, and NDA would like to highlight those here.

Since the three products listed above also have uses on the label other than Xtend soybeans (such as corn, pastures, rights-of-way, sorghum and millet), any use of the RUP dicamba products on those other sites also requires the applicator to observe all of the training, equipment and record keeping requirements listed on the label. This is because the added requirements are not specific to Xtend soybeans, but required for any use of the product allowed by the labels.

Another unexpected circumstance of using the three RUP dicamba products involve those applications made earlier in the spring for pre-plant burndown of weeds. It is a common practice, especially in minimum tillage operations, to apply 2,4-D or dicamba in April or May as a pre-plant burndown for winter annual weeds and early emerging biennial weeds. What many applicators have not been aware of is the mandatory wait-time most generic dicamba products have prior to planting soybeans. In those situations, all non-RUP dicamba labels require a minimum of 30 days after application before planting soybeans. The RUP dicamba products do not have this wait-time because they are only labeled for Xtend soybeans, and cannot be applied, even pre-
Major RUP Dicamba Label Requirements

→ Dicamba/auxin-specific training is required for all applicators to use any of the RUP dicamba products. Online dicamba–specific training is still available; see the Approved UNL Training link at bit.ly/NDAPPdicamba

→ Label-mandated record-keeping for all users;

→ Applications restricted to wind speeds between 3-10 mph;

→ Applications limited to daytime hours between sunrise and sunset;

→ Revised tank cleanout requirements;

→ Additional requirements for sensitive crop scouting, including non-dicamba tolerant soybeans and specialty crops;

→ Spray prohibitions if adjacent susceptible crops are downwind and downwind buffer requirements if there are adjacent sensitive sites.

More info, including a Dicamba FAQ document, can be found at pested.unl.edu/dicamba.

Dicamba has a long history of carryover in soil, and will damage non-dicamba tolerant soybeans as they germinate if the application is made too soon before planting. For this reason, EPA did not modify the generic dicamba labels to allow for pre-plant use on fields to be planted to Xtend soybeans. Therefore, if anyone applies a non-RUP dicamba formulation in the spring as a pre-plant burndown, they must wait a minimum of 30 days before planting ANY soybean variety, including Xtend soybeans.

Going forward in 2018, NDA will continue to respond to concerns about dicamba damage, and report specific information on the season’s experiences to EPA by October 1. EPA will then determine the registration status for the three RUP dicamba products for 2019 and beyond, based on the experiences reported by state regulatory agencies, chemical registrants, university experts, growers and the public. The federal registration of all three of these products will expire near the end of 2018 (FeXapan and XtendiMax on November 9, and Engenia on December 20).

Take Precautions with Non-RUP Dicamba Products

While the new dicamba products and new RUP status has received much attention, applicators using ‘old’ non-RUP dicamba products should be mindful of the same potential for off-target damage to specialty and sensitive crops. UNL Extension Educators have described conditions in 2017 where soybean damage correlates with post-emergence applications of dicamba to corn, rather than to dicamba-tolerant soybeans. The conditions seen in 2017 are described in the article, Potential Off-Target Dicamba Movement from Corn Applications.

A companion article, Can We Manage Dicamba Applications in 2018?, describes best management practices to consider for all dicamba applications: Irrigation for Product Efficacy (as soon as allowed by the product label), Avoid Using AMS with Dicamba Applications, Avoid Dicamba Use in Both Corn and Soybean (successively), and Consider Using the More Restrictive RUP Dicamba Guidelines for All Dicamba Applications.

Applicators should also be mindful of the small amount of dicamba that can contaminate spray equipment and cause crop injury from subsequent loads. Removing Dicamba Residues from Your Sprayer: A Tricky Task is a must-read.

Email Distribution

Note that this is the first edition of our all-electronic newsletter! NDA is trying to obtain email addresses to reach our regulated and interested public, and will be making tweaks to the newsletter format to make it more accessible and easier to read. Please help by forwarding your email notice to co-workers and acquaintances who work with pesticides! Subscribe here.
Recycle Your Pesticide Containers

Now in its 27th year, the Nebraska recycling program encourages producers and others to bring clean, dry, intact pesticide containers to a nearby collection site. While there is no charge for the service, producers do need to triple- or pressure-rinse pesticide containers and drain them before dropping them off.

The program accepts plastic containers made from high-density polyethylene (HDPE) only. HDPE containers are marked with the plastic resin code #2.

Accepted containers:

- Pesticide, crop oil, adjuvant and surfactant containers (1.0 or 2.5 gallons)
- Crop protection chemical drums (15, 30, 55 gallons)
- Crop oil, adjuvant and surfactant drums
- Stained, but clean, containers/drums

More information on this UNL coordinated program, including a detailed list of the collection sites, can be found here.

Rinsing Saves Money

It’s easy to leave six or more ounces of pesticide in a 2.5-gallon container.

That is 2% of the contents. Not rinsing means you throw away product then or later when product left in the container gets sticky and is difficult to remove.

Moreover, the label requires it!

Please take a minute to become familiar with how to prepare your used containers before taking them in for recycling.

Now that spring has finally arrived and pesticide-related activities are in motion, it is also a good time to review information about safe transport, storage and disposal of pesticides. Pesticide accidents can be prevented by careful planning, using a secure storage location, adopting safe handling methods during transport and following proper disposal guidelines for products and containers.

Pallet image from G. Phillips & Sons, recycling program contractor.
Pesticide Applicator Testing
Opportunities Still Available!

The opportunities for recertifying your commercial pesticide applicator license by training have passed, but you can still recertify, or add categories to a current license, by taking the exams.

Walk-in testing locations and dates are available for all categories, and additional dates may be added in several locations. Exams are available from 9 a.m. to 2 p.m., and there is no charge for this service.

Computer-based testing services for the general standards exam and eight category exams are provided by Pearson VUE at eight locations around the state. Dates and times vary by site, but may be more frequent and convenient for you than the walk-in sites. However, there is a $55 charge per exam.

Information on walk-in exams and computer testing locations can be found at the NDA Pesticide Program page.

Meet Our New Inspectors

The Pesticide Program has had some turnover within the last 6 months, so you may see a new face in your part of the state.

The western area inspector is Eric Trumbull. Eric is currently in North Platte, but will be near Tryon in the future. Eric has a degree from Chadron State College in Rangeland Management, and has experience in that area, as well as pesticide applications when he worked for the USDA NRCS near Grand Teton National Park.

The south-central area inspector is Aaron Ide. Aaron lives in Cozad, and also has a degree from Chadron State College in Rangeland Management. Aaron has work experience in Wyoming as the education and outreach specialist with the Campbell County Weed and Pest District. He also worked for the Nebraska Game and Parks Commission doing noxious and invasive species control work and with the Youth Conservation Program in the summers. He has also worked with a commercial applicator.

Eric Fuentes-Ruiz, who previously tended the south central region, has transferred to the southeast area, and is based in Lincoln.

Our pesticide-fertilizer program inspectors and their respective territories are shown below. All pesticide-related complaints or questions should be directed to the Lincoln office by calling (402) 471-2351.
Nebraska Noxious Weed Infested Acres
*Mitch Coffin, Noxious Weed Program Manager*

Noxious weeds continue to be a serious threat to agriculture across the state and country. The most noticeable infestations in Nebraska occur on range and pasture lands. Weeds like purple loosestrife, phragmites and saltcedar tend to impact wetland areas that may not directly affect agriculture. However, these plants do affect surface water, wildlife and recreation in these infested areas.

In 1990, Nebraska had only four designated state noxious weeds. These four plant species infested 3,987,914 acres (6.1% of the land) in 1990. Those weeds were musk thistle, plumeless thistle, Canada thistle and leafy spurge. Since 1990, an additional eight plants (spotted knapweed, diffuse knapweed, purple loosestrife, phragmites, saltcedar, Japanese knotweed, giant knotweed and sericea lespedeza) have been declared noxious weeds in Nebraska. The 2017 infestation data shows that 894,239 acres (1.8% of the land) were infested with noxious weeds across the state. This data includes the twelve, state-designated noxious weeds. Infested acres data is reported annually to the Nebraska Department of Agriculture by each county weed control authority.

This data indicates that over 3 million acres have been improved and are more productive than in 1990. In the case of range and pastureland, this means more grass, which in turn means more pounds of beef. Some noxious weeds are found in cropland and hay ground. These areas are now more productive because of less noxious weed competition while also improving the quality of the crop.

Much of the success of the noxious weed program can be credited to an aggressive public awareness campaign conducted by each county weed control authority. Most landowners and managers are concerned about noxious weeds and strive to improve their property. However, public awareness is needed to ensure continued success.

The real winners are those who have taken the right approach to improve their land by controlling not only noxious weeds, but also other invasive weeds that compete with grass and crops. Immediate results may not be noticed for a year or two. However, long-term results will out-weigh the cost of controlling noxious and invasive weeds.

Uncontrolled noxious weed infestations should be reported to your local county weed control authority.

Check your guesses at [bit.ly/NDAnoxweed2](bit.ly/NDAnoxweed2) or [neinvasives.com](neinvasives.com)

Images from USDA Plants, NDSU, NE Invasive Sp., KS Dep’t Agric.
FieldWatch has added several new states in 2018, making the DriftWatch and BeeCheck registries more beneficial to aerial applicators and others who work near state lines or who work in multiple states.

In addition, other states manage their own registries for specialty crops or apiaries (see the map at right, and web links in the left sidebar).

Free App for DriftWatch/BeeCheck Registries

The new FieldCheck app allows pesticide applicators of any kind to locate specialty crop and beehive locations easily from their mobile device or tablet. With increased functionality and ease-of-use, larger icons and the ability to choose your desired search location through GPS or a specific address, the new app will bring the existing FieldWatch platforms to you even faster and easier than before. DriftWatch Specialty Crop Site and BeeCheck Apiary Registry data will be more accessible to you on the go – all you do is click on the pins to see the detailed contact and location information you need! The new app is FREE to all users but you must sign in as an existing FieldWatch registered applicator or set up a new applicator account to get started. Sign up today at FieldWatch for Applicators.

No smartphone? You can still register at the link above and select your area of interest by choosing individual counties or drawing an area on the map. Doing this is also FREE, and email alerts will be sent to you when new specialty crops or beehives are added to the map in the area selected.
CDC Study: Injury and Illness Related to Foggers

Total release foggers, also known as “bug bombs,” are pesticide products containing aerosol propellants that release their entire contents at once to fumigate an area. These products are often used around the home to kill insect pests.

The Centers for Disease Control and Prevention (CDC) published a study in February looking at fogger incidents reported in 10 states from 2007-15. Although the vast majority of exposures resulted in low to moderate symptoms, many of the most common causes were within the control of the applicator and/or resident.

Most common causes of exposure:

- Failure to leave the premises during application (not just the particular room being treated) (16.6% of all exposures)
- Early entry (for example, to turn off smoke alarms, or retrieve pets or other items) (14.8%)
- Failure to vacate room before fogger discharge begins (10.7%)
- Inadequate ventilation following application and before reentry (9.2%)
- Nozzle malfunction or incorrect fogger activation, causing unintentional discharge (9.0%).

This CDC report tells us that many incidents can be prevented through improved communication.

Ideas for prevention:

- Provide guidance (such as a checklist) to your customer about necessary preparations, such as what to do with food, cookware, smoke detectors, pets, etc.
- Consider doing a walkthrough of the building (not just the room being treated) before the application.
- Make sure your customers (and the residents) know how long they need to remain out of the building. If you’ve left this information with a property manager, is s/he relaying this information to the residents? Most fogger labels require that occupants leave for 2-4 hours, and may require leaving for 2-4 hours during ventilation.
- Post signs at entry points (e.g., front and back door) that identify the hazard and include your contact information.
- Assume that you will encounter a faulty fogger at some point. Make sure it always is pointed away from your face. Think about your storage and transportation practices and emergency protocols.

See the full CDC report at oda.fyi/FoggerStudy. (reprinted with permission of the Oregon Department of Agriculture)