

**EXHIBIT
PLTF-1071**

From: gary.schmitz@basf.com [gary.schmitz@basf.com]
Sent: 9/8/2014 6:50:52 PM
To: Gary M Fellows [cn=gary m fellows/ou=apn/ou=rtp/ou=basf-corp/o=basf]
Subject: FW: ****Internal**** Dicamba Field Update

-----Forwarded by Gary L Schmitz/NVA/RTP/BASF-CORP/BASF on 08.09.2014 20:50:52-----

-----Original Message-----

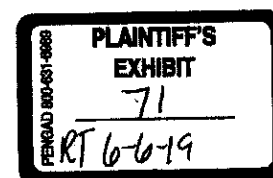
From : Dustin F Lewis/NA/BASF
To : Gary L Schmitz/NVA/RTP/BASF-CORP/BASF@BASF, Steven J Bove/NVA/RTP/BASF-CORP/BASF, Chad L Brommer/APN/RTP/BASF-CORP/BASF@BASF, Walter E Thomas/APN/RTP/BASF-CORP/BASF@BASF, John Frihauf/APN/RTP/BASF-CORP/BASF@BASF, Luke L Bozeman/NA/BASF, Dan E Westberg/NVA/RTP/BASF-CORP/BASF@BASF
cc :
Sent on : 08.09.2014 12:48:02 CDT
Subject : ****Internal**** Dicamba Field Update

Gentlemen-

As some of you know, I have been very involved in investigating dicamba drift from Pioneer DT-soybean production fields within my geography. Attached is a PDF containing an overview of what I have been learning out in the field. You will see that we still have many challenges moving forward with the launch of Engenia herbicide. I have noted several issues which BASF needs to address...some with our competition and others internally. Please do not hesitate to contact me if you would like any additional information or clarification.

Farewells and fairways-
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The Chemical Company

**Dicamba Field Update_CONFIDENTIAL
Central/Southern Illinois**

To:	Gary Schmitz, Steve Bowe, Walter Thomas, John Frihauf, Luke Bozeman, Chad Brommer, Dan Westberg,
Date:	September 8, 2014
Location:	Urbana, Illinois
Subject:	Dicamba Off-Target Movement in DT-Soybean Seed Production Fields

Preface:

- BASF has a rich history with the dicamba molecule. As we move forward with the launch of Engenia™ herbicide, the Technical Service Group has been actively engaged in establishing BASF as the dicamba experts. Activities in 2014 have included numerous educational events focusing on, but not limited to, the following:
 - BASF dicamba history
 - Engenia™ herbicide/BAPMA overview
 - Engenia™ herbicide program approach (ie-Advanced Acre)
 - On-Target Application

Of the previously listed topics, I would argue that 'On-Target Application' is the most critical factor for the success launch/adoption of Engenia™ herbicide in DT-soybeans.

Dicamba Drift Field Investigations:

- I was called out during early July to investigate an alleged Clarity® failure in a Pioneer DT-soybean production field near Shelbyville, IL. An application of Clarity (16 fl oz/A) + glyphosate (22 fl oz/A) took place when soybeans were at the V4 growth stage. At the time of application, waterhemp ranged from 3-30" height and known to be glyphosate-resistant. During my investigation, the majority of waterhemp was epinastic but apparent the population would survive. I began working with the retail applicator to create a 'rescue' plan to control the surviving waterhemp. Also, I noticed substantial off-target drift onto adjacent soybean fields. The following are a few key insights I took away from this initial meeting with the retail/applicator:
 1. BASF has a private, unpublished Clarity label for DT-soybean/cotton (previously unknown to the TS Field Team).
 2. Monsanto production regulations for DT-soybeans states applications of Clarity (16 fl oz/A) + RUP (22 fl oz/A) are to take place between V3-V6. Regulations do not state

if applications can be made prior to V3. This is placing a tremendous amount of selection pressure on dicamba when weeds, such as waterhemp, are known to be GLY-resistant. Furthermore, it directly goes against our message of <4" weed height for future Engenia applications.

3. Retail applicators are following 'On-Target' strategies, such as boom height, travel speed, wind speed, and buffer zones to sensitive down-wind crops. However, they are using nozzles that produce VC to UC droplets. In this case, the applicator was using an original TeeJet 'Air Induction (AI)' nozzle. According to BASF leadership, we will not be allowing nozzles that can produce VC droplets due to increased potential for off-target movement.



Figure 1: Common Waterhemp survival in DT-soybean field 2-wks following Clarity + GLY application.



Figure 2: Range of Waterhemp Size at Time of Herbicide Application



Figure 3: Air Induction (AI) Nozzles

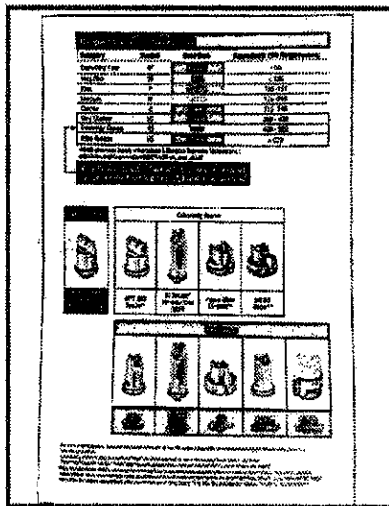
Following the initial field investigation I reached out to Pat Boone, Pioneer Soybean Production Agronomist, to visit other DT-soybean production fields near Shelbyville, IL and investigate alleged dicamba drift. Several growers working with Boone had concerns with dicamba off-target movement onto adjacent soybean fields. While many growers blamed it on volatility, it was apparent majority of injury was due to particle drift. Spent several hours investigating fields, which in some cases had dicamba drift upwards of ¼ of a mile downwind of production acres. Boone and/or a Pioneer rep had been present during all dicamba applications to make sure the appropriate wind speed and down-wind buffers were maintained. When asked about nozzle types, Boone stated that all his applicators were using nozzles recommended by Monsanto that produced VC to UC droplets. We also investigated a non-DT production field that was severely injured from dicamba tank contamination.

Key insights continued:

4. Monsanto 'dicamba training' was not adequate to get Pioneer ready for DT-soybean production.
5. Monsanto is making nozzle recommendations and application timings for our Clarity herbicide, which will not match our recommendations for Engenia herbicide.
6. Based on my conversation with Boone, Pioneer DT-seed production growers will be contractually bound to use a Monsanto brand dicamba product.



Figure 4: Dicamba tank contamination.



Copy of training material Monsanto is giving Pioneer for DT-soybean seed production. The majority of drift complaints I walked were based around applicators that used the AI, AIXR, or the AITTJ for Clarity applications. DFL

Figure 5: Copy of Monsanto nozzle recommendation for DT-soybean production.

Last week (September 4, 2014) at Boone's request, I meet with several affected growers in the region to go through dicamba training on particle drift, volatility, nozzle selection, tank-clean procedure, etc. We visited over a dozen growers who had alleged dicamba injury from nearby DT-soybean production fields. The majority of growers were distressed from the off-target movement of dicamba and were seeking retributions for yield loss and/or emotional suffering. Following the initial conflict, I walked the growers through the 'WHY and HOW' dicamba can move off-target. I also randomly sampled affected versus unaffected soybeans to look at pod count. Based on my observations in the majority of cases, yield loss it not expected from dicamba drift; however, many growers remained hesitant until they harvest the crop. Key insights continued:

- 7. Off-target movement of dicamba onto adjacent crops is highly emotional for the affected party.
- 8. Further dicamba training with growers/retailers/applicators is essential prior to the launch of Engenia herbicide.

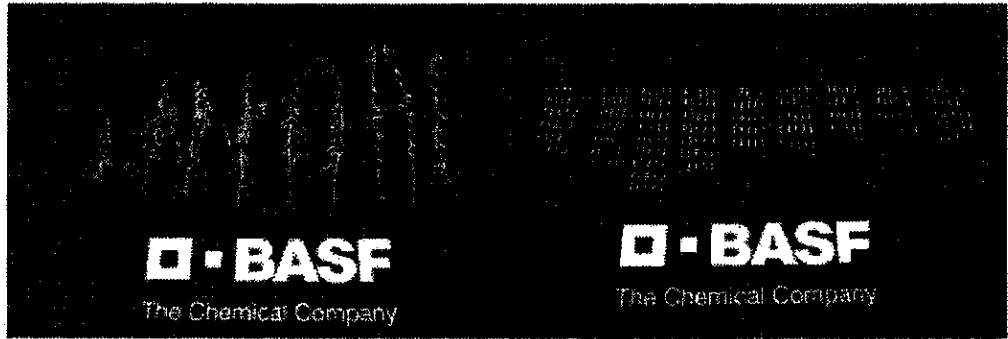


Figure 6: Dicamba drift ranging from most severe (left) to unaffected (right) and corresponding pod counts.

Following grower visits, I again reviewed the supplemental Clarity label for DT-seed production. Based on the current label, there are several oversights which could hold BASF legally responsible for dicamba drift. Furthermore, it does not put us in the position as 'the dicamba experts' if we are allowing the following applications to take place.

BASF
The Chemical Company

Clarity[®]
herbicide

Supplemental Label

**FOR USE ON DICAMBA-TOLERANT SOYBEAN MON 87708
GROWN FOR RESEARCH, FIELD TRIALS AND SEED PRODUCTION ONLY,
INCLUDING USDA REGULATED PLANTINGS OR SEED PRODUCTION**

EPA Reg. No. 7969-137

ACTIVE INGREDIENT:
diglycolamine salt of 3,6-dichloro-g-onic acid* 58.8%

OTHER INGREDIENTS: 43.2%

TOTAL: 100.0%

*Contains 36.5% 3,6-dichloro-g-onic acid (4 pounds acid equivalent per gallon or 480 grams per liter).

USE RESTRICTIONS

Maximum Seasonal Use Rate. DO NOT exceed a maximum rate of 64 fluid ounces of Clarity per acre per year.

Avoid off-target movement. Use extreme care when applying Clarity to avoid injury to desirable plants. Refer to Clarity main label for information regarding aerial and ground application recommendations and restrictions.

DO NOT feed MON 87708 soybean fodder or hay. Harvested dicamba-tolerant soybean MON 87708 grain, forage, and hay cannot be used or processed for food or feed.

This is the only statement regarding off-target movement on the supplemental Clarity label. DFL

Resistance Management
Clarity herbicide has a low probability of selecting for resistance, weed biotypes.

Operating Spray Equipment
Wear eye protectors and goggles thoroughly by using a steering wheel or commercial sprayer controls, according to the manufacturer's directions, and then apply Clarity in the appropriate direction and after applying this product.

B. Application Instructions
Clarity can be applied to actively growing weeds as early as broadcast, hand, or spot spray application using any of applicable nozzle or a carrier. For general Clarity application rates for control or suppression by weed type and growth stage, see Table 2. Clarity Application Rates for Control or Suppression by Weed Type and Growth Stage. For crop specific application timing and other details, refer to section VI, Crop-Specific Information.

To avoid uneven spray coverage, Clarity should not be applied during periods of gusty wind or when wind is at or over 15 mph.

Avoid off-target movement. Use extreme care when applying Clarity to prevent injury to desirable plants and animals.

Outdrifts
DO NOT outdrift within 7 days after applying Clarity.

Sensitive Crop Precautions
Clarity may cause injury to desirable trees and plants, including maple, oak, birch, ash, poplar, cottonwood, pine, spruce, cedar, cypress, juniper, yew, locust, and other desirable plants when conducting pre-seed, pre-emergence, or post-emergence applications. Do not apply Clarity during seed development or germination stages.

Precautions to avoid herbicide drift
• Use coarse spray nozzles instead of fine nozzles.
• Increase the amount of spray volume.
• Increase the amount of spray volume.
• Increase the amount of spray volume.

of nozzles designed to produce coarse droplets via ground applications on Challenger® platforms, Grounding Systems, XR (operating at 15" and 18" fan), Turbo Tee®, Turbo Flood®, or large capacity flood nozzles such as 210, 2310, or generic capacity 200.

• Using the spray product at or below 15 gpa and the nozzle volume at or above 30 gallons per acre for ground broadcast applications, unless otherwise specified by the manufacturer of self-inducing nozzles. Contact your spray nozzle supplier concerning the choice of self-inducing nozzles.

• Additionally approved self-inducing nozzles may be used.

Aerial Application Methods and Equipment
Off-air Volume (Lan 1) = 10 gallons of water per acre @ 20 gallons of diluted spray per treated acre for broadcast applications. Use the higher spray volume when treating areas of tall vegetation.

Application Equipment Select nozzle designed to produce minimal amounts of fine spray particles. Make aerial applications at the lowest safe height to reduce evaporation of the spray to evaporation and wind.

The applicator must follow the label restrictions and directions to avoid drift hazards, including those found in the labeling, as well as state and local regulations and ordinances.

DO NOT use aerial equipment if spray particles can be carried by the wind into areas where sensitive crops or plants are growing or where undesirable organisms exist.

General Application Guidelines
When applying Clarity by hand, determine the amount of herbicide and water volume needed using the following formula:

Row width in inches	Row width in inches	Row width in inches
Row width in inches	Row width in inches	Row width in inches

Table 2. Clarity Application Rates for Control or Suppression by Weed Type and Growth Stage
Use the Application Rates given in sections V and VI, Crop-Specific Information.

Weed Type and Stage	Rate Per Acre (gpa)	Weed Type and Stage	Rate Per Acre (gpa)
Annual Broadleaf weeds in established weed crops	5 - 15 15 - 20	Biennial Top growth suppression Top growth suppression Top growth suppression Other grasses	8 - 14 10 - 20 20 20
Perennial Broadleaf weeds in established weed crops	5 - 15 15 - 20	Other grasses	10 - 20 20

• Rates above 3 gpa require pre-spray or pre-herbicide control of vegetation, but should probably be applied with other herbicides to be effective on the same species or biotype.

• Spraying applied in Table 2 will require 1000 gallons per acre for suppression control.

• DO NOT broadcast apply more than 30 gpa per acre for single application. Use the higher end of label rate range when treating areas with tall grasses or weeds or when using self-inducing nozzles. Refer to section VI, Crop-Specific Information for details on other information and application rates. The rates used for this application do not apply to other crops.


• Rates above 30 gpa require pre-spray or pre-herbicide control of vegetation, but should probably be applied with other herbicides to be effective on the same species or biotype.

Based on our current Clarity label, applicators could apply dicamba with coarse droplet sizes, even recommending the highly drift-prone Turbo Tee nozzle. Additionally, the current label allows aerial applications. DFL

For BASF to remain as the dicamba experts, I suggest immediately amend the supplemental Clarity label to mimic the droplet size we will be requiring with Engenia (ie- XC to UC). This should be priority #1 as DT-seed acres will be increasing across the county next year. While Monsanto is making their own mistakes with nozzle recommendations, we need to be proactive in addressing our stewardship messaging as our Clarity herbicide will be used being used on these acres until USDA deregulation of the DT-soybean.

Moreover, we need continued communication with Monsanto regarding their specific requirements/recommendations for DT-soybean production. Application timings in seed production fields should also be addressed based on weed height, not just crop stage alone. We also need to challenge Monsanto's current nozzle recommendations and attempt to get them in-line with our recommended droplet size.

Please do not hesitate to contact me for any additional information or clarification.


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