

# UNITED STATES ENVIRONMENTAL PROTECTION AGENCY WASHINGTON, DC 20460

OFFICE OF CHEMICAL SAFETY AND POLLUTION PREVENTION

April 23, 2021

Wes Marchione Registration Manager E. I. du Pont de Nemours and Company 9330 Zionsville Road Indianapolis, IN 46241

Subject: Registration Review Label Mitigation for Rimsulfuron Product Name: DUPONT INSTIGATE HERBICIDE EPA Registration Number: 352-873 Application Date: 12/21/2017 Decision Number: 572713

Dear Mr Marchione:

The Agency, in accordance with the Federal Insecticide, Fungicide and Rodenticide Act (FIFRA), as amended, has completed reviewing all the information submitted with your application to support the Registration Review of the above referenced product in connection with the Sulfonylurea (SU) Herbicides Interim Decision, and has concluded that your submission is acceptable. The label referred to above, submitted in connection with registration under FIFRA, as amended, is acceptable.

Should you wish to add/retain a reference to the company's website on your label, then please be aware that the website becomes labeling under the Federal Insecticide Fungicide and Rodenticide Act and is subject to review by the Agency. If the website is false or misleading, the product would be misbranded and unlawful to sell or distribute under FIFRA section 12(a)(1)(E). 40 CFR 156.10(a)(5) list examples of statements EPA may consider false or misleading. In addition, regardless of whether a website is referenced on your product's label, claims made on the website may not substantially differ from those claims approved through the registration process. Therefore, should the Agency find or if it is brought to our attention that a website contains false or misleading statements or claims substantially differing from the EPA approved registration, the website will be referred to the EPA's Office of Enforcement and Compliance.

A copy of your label stamped "Accepted" is enclosed. Products shipped after 12 months from the date of this amendment must bear the new revised label. Your release for shipment of the product bearing the amended label constitutes acceptance of these conditions. If these conditions are not complied with, the registration will be subject to cancellation in accordance with FIFRA section 6.

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If you have any questions about this letter, please contact Srijana Shrestha by phone at 703-305-6471, or via email at shrestha.srijana@epa.gov.

Sincerely,

2 2

Linda Arrington, Branch Chief Risk Management and Implementation Branch 4 Pesticide Re-Evaluation Division Office of Pesticide Programs

Enclosure

(Base label):

RIMSULFURON	GROUP	2	HERBICIDE
MESOTRIONE	GROUP	27	HERBICIDE

# **DuPont<sup>™</sup> Instigate**®

**HERBIDIDE** [Alternate Brand Name: Instigate®]

For use in field corn grown for grain or silage

Active Ingredients Rimsulfuron	
N-((4,6-dimethoxypyrimidin-2-yl)aminocarbonyl)-3-(ethylsulfonyl)- 2-pyridinesulfonamide	4 17%
Mesotrione	41.67%
Other Ingredients	54.16%
TOTAL	100.00%

Contains 0.0417 lb of rimsulfuron and 0.4167 lb of mesotrione active ingredient per pound of product.

# Keep Out of Reach of Children CAUTION

Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle. (If you do not understand this label, find someone to explain it to you in detail.)

# **Precautionary Statements** Hazards To Humans And Domestic Animals

Causes moderate eye irritation. Avoid contact with eyes, skin or clothing.

# Personal Protective Equipment (PPE)

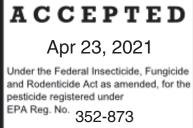
#### Applicators and other handlers must wear:

- Long-sleeve shirt and long pants.
- Chemical resistant gloves made of any waterproof material including butyl rubber, natural rubber, • neoprene rubber, or nitrile rubber.
- Shoes plus socks. •

Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exist, use detergent and hot water. Keep and wash PPE separately from other laundry.

# **Engineering Control Statements**

When handlers use closed systems or enclosed cabs in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240(d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.



# User Safety Recommendations

USERS SHOULD:

- Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
- Remove PPE immediately after handling this product.
- Wash the outside of gloves before removing.
- As soon as possible, wash thoroughly and change into clean clothing.
- Remove clothing/PPE immediately if pesticide gets inside.
- Then wash thoroughly and put on clean clothing.

# **First Aid**

- **IF IN EYES:** Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.
- **IF ON SKIN OR CLOTHING:** Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for treatment advice.
- **IF SWALLOWED:** Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. **DO NOT** induce vomiting unless told to by a poison control center or doctor. **DO NOT** give anything to an unconscious person.
- **IF INHALED:** Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-800-441-3637 for emergency medical treatment information.

# **Environmental Hazards**

**DO NOT** apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. **DO NOT** contaminate water when disposing of equipment wash water or rinsate.

# Surface Water Label Advisory

This product may impact surface water quality due to runoff of rain water. This is especially true for poorly draining soils and soils with shallow ground water. This product is classified as having high potential for reaching surface water via runoff for several months or more after application. A level, well-maintained vegetative buffer strip between areas to which this product is applied and surface water features such as ponds, streams, and springs will reduce the potential loading of rimsulfuron from runoff water and sediment. Runoff of this product will be greatly reduced by avoiding applications when rainfall or irrigation is expected to occur within 48 hours.

# Windblown Soil Particles

This product has the potential to move off-site due to wind erosion. Soils that are subject to wind erosion usually have a high silt and/or fine to very fine sand fractions and low organic matter content. Other factors which can affects the movement of windblown soil include the intensity and direction of prevailing winds, vegetative cover, site slope, rainfall, and drainage patterns. Avoid applying this product if prevailing local conditions may be expected to result in off-site movement.

# Non-target Organism Advisory

This product is toxic to plants and may adversely impact the forage and habitat of non-target organisms, including pollinators, in areas adjacent to the treated area. Protect the forage and habitat of non-target organisms by minimizing spray drift. For further guidance and instructions on how to minimize spray drift, refer to the Spray Drift Management section of this label.

# Agricultural Use Requirements

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR Part 170. Refer to the label booklet under "Agricultural Use Requirements" in the Directions for Use section for information about this standard.

### Nonrefillable Plastic and Metal Containers (Capacity Equal to or Less Than 50 Pounds):

# Storage and Disposal

**DO NOT** contaminate water, food or feed by storage and disposal.

Pesticide Storage: Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

**Container Disposal:** Nonrefillable container. **DO NOT** reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. For Metal Containers, offer for recycling if appropriate, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

# Nonrefillable Plastic and Metal Containers (Capacity Greater Than 50 Pounds):

# Storage and Disposal

**DO NOT** contaminate water, food or feed by storage and disposal.

Pesticide Storage: Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

**Container Disposal:** Nonrefillable container. **DO NOT** reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times. Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. For Metal Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities

# Nonrefillable Plastic and Metal Containers, e.g., Intermediate Bulk Containers [IBC] (Size or Shape Too Large to be Tipped, Rolled or Turned Upside Down):

# Storage and Disposal

DO NOT contaminate water, food or feed by storage and disposal.

Pesticide Storage: Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

**Container Disposal:** Nonrefillable container. **DO NOT** reuse or refill this container. Clean container promptly after emptying the contents from this container into application equipment or mix tank and before final disposal using the following pressure rinsing procedure. Insert a lance fitted with a suitable tank cleaning nozzle into the container and ensure that the water spray thoroughly covers the top, bottom and all sides inside the container. The nozzle manufacturer generally provides instructions for the appropriate spray pressure, spray duration and/or spray volume. If the manufacturer's instructions are not available, pressure rinse the container for at least 60 seconds using a minimum pressure of 30 PSI with a minimum rinse volume of 10% of the container volume. Drain, pour or pump rinsate into

application equipment or rinsate collection system. Repeat this pressure rinsing procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. For Metal Containers, offer for recycling if available or reconditioning if appropriate, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

# Nonrefillable Paper or Plastic Bags, Fiber Sacks including Flexible Intermediate Bulk Containers (FIBC) or Fiber Drums With Liners:

# Storage and Disposal

DO NOT contaminate water, food or feed by storage and disposal.

Pesticide Storage: Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

**Container Disposal:** Nonrefillable container. **DO NOT** reuse or refill this container. Completely empty paper or plastic bag, fiber sack or drum liner by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Then offer for recycling if available or dispose of empty paper or plastic bag, fiber sack or fiber drum and liner in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances.

# Refillable Fiber Drums With Liners:

# Storage and Disposal

**DO NOT** contaminate water, food or feed by storage and disposal.

**Pesticide Storage:** Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

Refillable container (fiber drum only). Refilling Fiber Drum: Refill this fiber drum with DuPont Instigate herbicide containing rimsulfuron and mesotrione only. **DO NOT** reuse this fiber drum for any other purpose. Cleaning before refilling is the responsibility of the refiller. Completely empty liner by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Disposing of Fiber Drum and/or Liner: **DO NOT** reuse this fiber drum for any other purpose other than refilling (see preceding). Cleaning the container (liner and/or fiber drum) before final disposal is the responsibility of the person disposing of the container. Offer the liner for recycling if available or dispose of liner in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. If drum is contaminated and cannot be reused, dispose of it in the manner required for its liner. To clean the fiber drum before final disposal, completely empty the fiber drum by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Then offer the fiber drum for recycling if available or dispose of its of the pose of liner the fiber drum for recycling if available or dispose of an a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances.

# All Other Refillable Containers:

# Storage and Disposal

**DO NOT** contaminate water, food or feed by storage and disposal.

Pesticide Storage: Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

Container Disposal: Refer to the Net Contents section of this product's labeling for the applicable "Refillable Container" or "Nonrefillable Container" designation.

**All Other Refillable Containers:** Refillable container. Refilling Container: Refill this container with DuPont Instigate containing rimsulfuron and mesotrione only. **DO NOT** reuse this container for any other purpose. Cleaning before refilling is the responsibility of the refiller. Prior to refilling, inspect carefully for damage such as cracks, punctures, abrasions, worn out threads and closure devices. If damage is found, **DO NOT** use the container, contact DuPont at the number below for instructions. Check for leaks after refilling and before transporting. If leaks are found, **DO NOT** reuse or transport container, contact DuPont at the number below for Container: **DO NOT** reuse this container for any other purpose other than refilling (see preceding). Cleaning the container before

final disposal is the responsibility of the person disposing of the container. To clean the container before final disposal, use the following pressure rinsing procedure. Insert a lance fitted with a suitable tank cleaning nozzle into the container and ensure that the water spray thoroughly covers the top, bottom and all sides inside the container. The nozzle manufacturer generally provides instructions for the appropriate spray pressure, spray duration and/or spray volume. If the manufacturer's instructions are not available, pressure rinse the container for at least 60 seconds using a minimum pressure of 30 PSI with a minimum rinse volume of 10% of the container volume. Drain, pour or pump rinsate into application equipment or rinsate collection system. Repeat this pressure rinsing procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. For Metal Containers, offer for recycling if available or reconditioning if appropriate, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

### Outer Foil Pouches of Water Soluble Packets (WSP):

# Storage and Disposal

**DO NOT** contaminate water, food or feed by storage and disposal.

**Pesticide Storage:** Store product in original container only. Store in a cool, dry place.

**Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

**Container Disposal:** Nonrefillable container. **DO NOT** reuse or refill this container. Offer for recycling if available or, dispose of the empty outer foil pouch in the trash as long as WSP is unbroken. If the outer pouch contacts the formulated product in any way, the pouch must be triple rinsed with clean water. Add the rinsate to the spray tank and dispose of the outer pouch as described previously.

**DO NOT** transport if this container is damaged or leaking. If the container is damaged, leaking or obsolete, or in the event of a major spill, fire or other emergency, contact DuPont at 1-800-441-3637, day or night.

# Refer to inside of label booklet for additional precautionary information and Directions for Use.

Notice: Read the entire label. Use only according to label directions. Before using this product, read Warranty Disclaimer, Inherent Risks of Use and Limitation of Remedies at end of label booklet. If terms are unacceptable, return at once unopened.

In case of emergency endangering health or the environment involving this product, call 1-800-441-3637.

Agricultural Chemical: **DO NOT** ship or store with food, feeds, drugs, or clothing.

EPA Reg. No. 352-873

EPA Est.

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Produced for E.I du Pont de Nemours & Company Chestnut Run Plaza 974 Centre Road Wilmington, DE 19805

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RIMSULFURON	GROUP	2	HERBICIDE
MESOTRIONE	GROUP	27	HERBICIDE

# **DuPont<sup>™</sup> Instigate**®

# HERBIDIDE

[Alternate Brand Name: Instigate®]

For use in field corn grown for grain or silage

Active Ingredients	
Rimsulfuron	
N-((4,6-dimethoxypyrimidin-2-yl)aminocarbonyl)-3-(ethylsulfonyl)-	
2-pyridinesulfonamide	4.17%
Mesotrione	41.67%
Other Ingredients	54.16%
TOTAL	100.00%

Contains 0.0417 lb of rimsulfuron and 0.4167 lb of mesotrione active ingredient per pound of product.

# Keep Out of Reach of Children CAUTION

Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle. (If you do not understand this label, find someone to explain it to you in detail.)

# Agricultural Use Requirements

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR Part 170. Refer to the label booklet under "Agricultural Use Requirements" in the Directions for Use section for information about this standard.

Refer to inside of label booklet for additional precautionary information and Directions for Use.

Notice: Read the entire label. Use only according to label directions. Before using this product, read Warranty Disclaimer, Inherent Risks of Use and Limitation of Remedies at end of label booklet. If terms are unacceptable, return at once unopened.

In case of emergency endangering health or the environment involving this product, call 1-800-441-3637.

Agricultural Chemical: **DO NOT** ship or store with food, feeds, drugs, or clothing.

EPA Reg. No. 352-873

EPA Est.

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[Page 1 through end)]

# Precautionary Statements Hazards to Humans and Domestic Animals CAUTION

Causes moderate eye irritation. Avoid contact with eyes, skin or clothing.

# **Personal Protective Equipment (PPE)**

# Applicators and other handlers must wear:

- Long-sleeve shirt and long pants.
- Chemical resistant gloves made of any waterproof material including butyl rubber, natural rubber, neoprene rubber, or nitrile rubber.
- Shoes plus socks.

Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exist, use detergent and hot water. Keep and wash PPE separately from other laundry.

# **Engineering Control Statements**

When handlers use closed systems or enclosed cabs in a manner that meets the requirements listed in the Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240(d)(4-6)], the handler PPE requirements may be reduced or modified as specified in the WPS.

# **User Safety Recommendations**

USERS SHOULD:

- Wash hands before eating, drinking, chewing gum, using tobacco or using the toilet.
- Remove PPE immediately after handling this product.
- Wash the outside of gloves before removing.
- As soon as possible, wash thoroughly and change into clean clothing.
- Remove clothing/PPE immediately if pesticide gets inside.
- Then wash thoroughly and put on clean clothing.

# First Aid

- **IF IN EYES:** Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.
- **IF ON SKIN OR CLOTHING:** Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for treatment advice.
- **IF SWALLOWED:** Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. **DO NOT** induce vomiting unless told to by a poison control center or doctor. **DO NOT** give anything to an unconscious person.
- **IF INHALED:** Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-800-441-3637 for emergency medical treatment information.

# **Environmental Hazards**

**DO NOT** apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. **DO NOT** contaminate water when disposing of equipment wash water or rinsate.

## Surface Water Label Advisory

This product may impact surface water quality due to runoff of rain water. This is especially true for poorly draining soils and soils with shallow ground water. This product is classified as having high potential for reaching surface water via runoff for several months or more after application. A level, well-maintained vegetative buffer strip between areas to which this product is applied and surface water features such as ponds, streams, and springs will reduce the potential loading of rimsulfuron from runoff water and sediment. Runoff of this product will be greatly reduced by avoiding applications when rainfall or irrigation is expected to occur within 48 hours.

### Windblown Soil Particles

This product has the potential to move off-site due to wind erosion. Soils that are subject to wind erosion usually have a high silt and/or fine to very fine sand fractions and low organic matter content. Other factors which can affects the movement of windblown soil include the intensity and direction of prevailing winds, vegetative cover, site slope, rainfall, and drainage patterns. Avoid applying this product if prevailing local conditions may be expected to result in off-site movement.

### Non-target Organism Advisory

This product is toxic to plants and may adversely impact the forage and habitat of non-target organisms, including pollinators, in areas adjacent to the treated area. Protect the forage and habitat of non-target organisms by minimizing spray drift. For further guidance and instructions on how to minimize spray drift, refer to the Spray Drift Management section of this label.

# Directions for Use

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

**DO NOT** apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the agency in your State responsible for pesticide regulation.

DuPont<sup>™</sup> INSTIGATE® herbicide, referred to below as DuPont<sup>™</sup> Instigate, Instigate herbicide or Instigate, must be used only in accordance with instructions on this label, Supplemental Labels, Special Local Need Registrations, FIFRA Section 18 exemptions, FIFRA 2ee or as otherwise permitted by FIFRA. Always read the entire label, including the Limitation of Warranty and Liability.

# Agricultural Use Requirements

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protective equipment (PPE) and restricted-entry interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

**DO NOT** enter or allow worker entry into treated areas during the restricted entry interval (REI) of 12 hours.

PPE required for early entry to the treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated including plants, soil or water, is:

- Coveralls.
- Chemical-resistant gloves made of any waterproof material including nitrile rubber, natural rubber, neoprene rubber, or butyl rubber.
- Shoes plus socks.

# **Storage And Disposal**

**DO NOT** contaminate water, food or feed by storage and disposal.

**Pesticide Storage:** Store product in original container only. Store in a cool, dry place. **Product Disposal:** Waste resulting from the use of this product must be disposed of on site or at an approved waste disposal facility.

Container Disposal: Refer to the Net Contents section of this product's labeling for the applicable "Refillable Container" or "Nonrefillable Container" designation.

Nonrefillable Plastic and Metal Containers (Capacity Equal to or Less Than 50 Pounds):

Nonrefillable container. **DO NOT** reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. For Metal Containers, offer for recycling if appropriate, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

**Nonrefillable Plastic and Metal Containers (Capacity Greater Than 50 Pounds):** Nonrefillable container. **DO NOT** reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. Triple rinse as follows: Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times. Turn the container or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. For Metal Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

Nonrefillable Plastic and Metal Containers, e.g., Intermediate Bulk Containers [IBC] (Size or Shape Too Large to be Tipped, Rolled or Turned Upside Down): Nonrefillable container. DO NOT reuse or refill this container. Clean container promptly after emptying the contents from this container into application equipment or mix tank and before final disposal using the following pressure rinsing procedure. Insert a lance fitted with a suitable tank cleaning nozzle into the container. The nozzle manufacturer generally provides instructions for the appropriate spray pressure, spray duration and/or spray volume. If the manufacturer's instructions are not available, pressure rinsate the container for at least 60 seconds using a minimum pressure of 30 PSI with a minimum rinse volume of 10% of the container volume. Drain, pour or pump rinsate into application equipment or rinsate collection system. Repeat this pressure rinsing procedure two more times. Then, for Plastic Containers, offer for recycling if available or reconditioning if appropriate, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

Nonrefillable Paper or Plastic Bags, Fiber Sacks including Flexible Intermediate Bulk Containers (FIBC) or Fiber Drums With Liners: Nonrefillable container. DO NOT reuse or refill this container. Completely empty paper or plastic bag, fiber sack or drum liner by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Then offer for recycling if available or dispose of empty paper or plastic bag, fiber sack or fiber drum and liner in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances.

**Refillable Fiber Drums With Liners:** Refillable container (fiber drum only). Refilling Fiber Drum: Refill this fiber drum with DuPont Instigate herbicide containing rimsulfuron and mesotrione only. **DO NOT** reuse this fiber drum for any other purpose. Cleaning before refilling is the responsibility of the refiller. Completely empty liner by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Disposing of Fiber Drum and/or Liner: **DO NOT** reuse this fiber drum for any other purpose other than refilling (see preceding). Cleaning the container (liner and/or fiber drum) before final disposal is the responsibility of the person disposing of the container. Offer the liner for recycling if available or dispose of liner in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. If drum is contaminated and cannot be reused, dispose of it in the manner required for its liner. To clean the fiber drum before final disposal, completely empty the fiber drum by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Then offer the fiber drum before final disposal, completely empty the fiber drum by shaking and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Then offer the fiber drum for recycling if available or dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances. **DO NOT** burn, unless allowed by state and tapping sides and bottom to loosen clinging particles. Empty residue into application or manufacturing equipment. Then offer the fiber drum for recycling if available or dispose of in a sanitary landfill, or by incineration. **DO NOT** burn, unless allowed by state and local ordinances.

All Other Refillable Containers: Refillable container. Refilling Container: Refill this container with DuPont Instigate containing rimsulfuron and mesotrione only. DO NOT reuse this container for any other purpose. Cleaning before refilling is the responsibility of the refiller. Prior to refilling, inspect carefully for damage such as cracks, punctures, abrasions, worn out threads and closure devices. If damage is found, **DO NOT** use the container, contact DuPont at the number below for instructions. Check for leaks after refilling and before transporting. If leaks are found, DO NOT reuse or transport container, contact DuPont at the number below for instructions. Disposing of Container: DO NOT reuse this container for any other purpose other than refilling (see preceding). Cleaning the container before final disposal is the responsibility of the person disposing of the container. To clean the container before final disposal, use the following pressure rinsing procedure. Insert a lance fitted with a suitable tank cleaning nozzle into the container and ensure that the water spray thoroughly covers the top, bottom and all sides inside the container. The nozzle manufacturer generally provides instructions for the appropriate spray pressure, spray duration and/or spray volume. If the manufacturer's instructions are not available, pressure rinse the container for at least 60 seconds using a minimum pressure of 30 PSI with a minimum rinse volume of 10% of the container volume. Drain, pour or pump rinsate into application equipment or rinsate collection system. Repeat this pressure rinsing procedure two more times. Then, for Plastic Containers, offer for recycling if available or puncture and dispose of in a sanitary landfill, or by incineration. DO NOT burn, unless allowed by state and local ordinances. For Metal Containers, offer for recycling if available or reconditioning if appropriate, or puncture and dispose of in a sanitary landfill, or by other procedures approved by state and local authorities.

**Outer Foil Pouches of Water Soluble Packets (WSP):** Nonrefillable container. **DO NOT** reuse or refill this container. Offer for recycling if available or, dispose of the empty outer foil pouch in the trash as long as WSP is unbroken. If the outer pouch contacts the formulated product in any way, the pouch must be triple rinsed with clean water. Add the rinsate to the spray tank and dispose of the outer pouch as described previously.

**DO NOT** transport if this container is damaged or leaking. If the container is damaged, leaking or obsolete, or in the event of a major spill, fire or other emergency, contact DuPont at 1-800-441-3637, day or night.

# **Product Information**

Instigate herbicide must be used only in accordance with instructions on this label or in supplemental DuPont publications. DuPont will not be responsible for losses or damage resulting from use of this product in any manner not specifically specified by DuPont.

DuPont<sup>™</sup> Instigate herbicide is a water dispersible blend containing 45.8% active ingredients by weight.

Instigate is a selective herbicide for burndown and residual control of certain annual grass and broadleaf weeds. Instigate can be tank mixed with a variety of corn herbicides to improve burndown and residual control.

Instigate is a blend of rimsulfuron and mesotrione, two active ingredients that have different mode-ofaction on susceptible weeds.

When surface applied, rainfall or sprinkler irrigation is needed to move Instigate into the soil root zone. Instigate is absorbed through the roots, rapidly inhibiting plant growth. Susceptible weeds will generally not emerge from preemergence application. In some cases susceptible weeds may germinate and emerge a few days after application, but growth then ceases and leaves become chlorotic three to five days after emergence. Death of leaf tissue and growing point will follow in some species, while others will remain green but stunted and noncompetitive. Dry conditions following application may reduce the preemergence activity of Instigate. If an activating rain (0.5 inches) is not received within 5-7 days after preemergence application, where appropriate, rotary hoeing is suggested to activate the herbicide.

When applied to emerged vegetation, susceptible weeds take up the herbicide through the treated foliage and cease growth soon after application. Complete death of susceptible weeds may take up to 2 weeks.

On all field corn hybrids, Instigate can be used in a planned sequential application herbicide program such as Instigate followed by an in-crop application of DuPont<sup>™</sup> ACCENT® Q, DuPont<sup>™</sup> REALM® Q, DuPont<sup>™</sup> RESOLVE® Q, DuPont<sup>™</sup> REVULIN® Q or DuPont<sup>™</sup> STEADFAST® Q with appropriate tank mix partners not exceeding 1.0 ounce active ingredient rimsulfuron or 3.85 ounces active ingredient of mesotrione during the crop year.

For glyphosate-tolerant field corn hybrids, Instigate can be followed by an in-crop application of a glyphosate product with appropriate tank mix partners and adjuvant products.

Refer to the label of the respective sequential partner for specific use directions.

# Restrictions

- **DO NOT** make more than 1 application of Instigate per year.
- **DO NOT** apply to corn grown for seed, popcorn, ornamental (Indian) corn, or sweet corn.
- **DO NOT** apply another solo HPPD inhibitor postemergence herbicide such as mesotrione, topramezone or tembotrione to ground that has been treated with Instigate in the same season.
- **DO NOT** apply preemergence to coarse-textured soils (sand, loamy sand or sandy loam) with less than 1% organic matter.
- DO NOT apply more than 3.85 ounces active ingredient of mesotrione in a year. This includes combinations of preemergence applications of Instigate, as well as mesotrione from application(s) of pre-mix products including REALM® Q or REVULIN® Q. DO NOT make the second application of a mesotrione containing product within 14 days of the first application.
- DO NOT apply more than a total of 1.0 ounce active ingredient rimsulfuron during the crop year. This includes combinations of preemergence applications of Instigate, as well as rimsulfuron from application(s) of products including DuPont<sup>™</sup> BASIS<sup>®</sup> Blend, DuPont<sup>™</sup> LEADOFF<sup>™</sup>, DuPont<sup>™</sup> PREQUEL<sup>®</sup>, DuPont<sup>™</sup> RESOLVE<sup>®</sup> Q, REALM<sup>®</sup> Q or DuPont<sup>™</sup> STEADFAST<sup>®</sup> Q.
- **DO NOT** tank mix Instigate with bentazon products or severe crop injury may occur.

- **DO NOT** tank mix Instigate with foliar-applied organophosphate or carbamate insecticides including chlorpyrifos, malathion, parathion, etc, as severe crop injury may occur. To avoid crop injury or antagonism, apply these products at least seven days before or 3 days after the application of Instigate.
- **DO NOT** apply the organophosphate insecticide, terbufos within 45 days of a preemergence or preplant application of Instigate since crop injury may result.
- **DO NOT** apply Instigate within 45 days of crop emergence where the organophosphate insecticide, terbufos was applied as a treatment since crop injury may occur.
- DO NOT irrigate Instigate herbicide into coarse soils at planting time when soils are saturated.
- **DO NOT** apply this product through any type of irrigation system.
- **DO NOT** use aerial application to apply Instigate unless specified otherwise under the specific crop section on the label.
- **DO NOT** apply with suspension fertilizers as the carrier, unless specifically addressed under one of the tank mix sections of this label or other product labels containing mesotrione, or injury may occur.
- **DO NOT** graze, feed forage, grain or fodder (stover) from treated areas to livestock within 45 days of Instigate application.

Injury or loss of desirable trees or vegetation may result from failure to observe the following:

- **DO NOT** apply Instigate or drain or flush application equipment on or near desirable trees or other plants, or on areas where their roots may extend, or in locations where the chemical may be washed or moved into contact with their roots.
- DO NOT use on lawns, walks, driveways, tennis courts, or similar areas.
- **DO NOT** contaminate any body of water.

CROPS	Maximum Oz of Product/ Acre/ Single Application	Maximum Lb Al/ Acre/Single Application	Maximum Number of Applications per Year	Maximum Oz of Product /Acre/Year	Maximum Lb Al/A per Year	Retreat Interval (Days)	Last Treatment Preharvest Interval
field corn grown for grain or silage	7.0 oz	0.0182 lb ai rimsulfuron + 0.182 lb ai mesotrione	1	7.0 oz	0.0182 lb ai rimsulfuron + 0.182 lb ai mesotrione	N/A	Do not harvest forage, grain, or stover within 45 days after application

# Use Restriction Summary Table for INSTIGATE®:

# Precautions

Allow at least 4 weeks between preemergence application of DuPont Instigate and postemergence applications of unsafened rimsulfuron-containing herbicides.

Instigate herbicide may interact with certain insecticides previously applied to the crop. Crop response varies with field corn type, insecticide used, insecticide application method, and soil type.

Preplant/Preemergence applications of Instigate to corn where an application of terbufos, chlorpyrifos, or phorate is planned may cause unacceptable crop injury, especially on soils of less than 4% organic matter.

Instigate may be applied to corn previously treated with chlorethoxyfos + bifenthrin, tebupirimphose +

cyfluthrin, or tefluthrin insecticides, or other non-organophosphate soil insecticides regardless of soil type.

Instigate may be applied with pyrethroid type insecticides including esfenvalerate or lambda-cyhalothrin or with diamide type insecticides including PREVATHON®.

When weeds are stressed due to drought, heat, lack of fertility, flooding, or prolonged cool temperatures, control can be reduced or delayed since the weeds are not actively growing.

Weed escapes or regrowth may occur when application is made under prolonged stress conditions. Optimum weed control will be obtained if an application of Instigate is made following label direction when weeds are actively growing.

Crop injury may occur following an application of Instigate if there is a prolonged period of cold weather and/or in conjunction with wet soils.

Prevent drift or spray onto desirable plants.

Thoroughly clean application equipment immediately after use.

# Weed Resistance Management

Instigate, which contains the active ingredients rimsulfuron and mesotrione, is both a Group 2 and a Group 27 herbicide based on the mode of action classification system of the Weed Science Society of America.

Proactively implementing diversified weed control strategies to minimize selection for weed populations resistant to one or more herbicides is a best practice. A diversified weed management program may include the use of multiple herbicides with different sites of action and overlapping weed spectrum with or without tillage operations and/or other cultural practices. Research has demonstrated that using the labeled rate and directions for use is important to delay the selection for resistance.

The continued effectiveness of this product depends on the successful implementation of a weed resistance management program.

To aid in the prevention of developing weeds resistant to this product, users should:

- Scout fields before application to ensure herbicides and rates will be appropriate for the weed species and weed sizes present.
- Start with a clean field, using either a burndown herbicide application or tillage.
- Control weeds early when they are relatively small (less than 4 inches).
- Apply full rates of Instigate herbicide for the most difficult to control weed in the field at the specified time (correct weed size) to minimize weed escapes.
- Scout fields after application to detect weed escapes or shifts in control of weed species.
- Control weed escapes before they reproduce by seed or proliferate vegetatively.
- Report any incidence of non-performance of this product against a particular weed to your company representative, local retailer, or county extension agent.
- Contact your company representative, crop advisor, or extension agent to find out if suspected
  resistant weeds to this MOA have been found in your region. If resistant biotypes of target weeds
  have been reported, use the application rates of this product specified for your local conditions.
  Tank mix products so that there are multiple effective sites of actions for each target weed.
- If resistance is suspected, treat weed escapes with an herbicide having a site of action other than Group 2 or 27 and/or use nonchemical methods to remove escapes, as practical, with the goal of preventing further seed production.
- Suspected herbicide-resistant weeds may be identified by these indicators:

- Failure to control a weed species normally controlled by the herbicide at the dose applied, especially if control is achieved on adjacent weeds;
- A spreading patch of non-controlled plants of a particular weed species; and
- Surviving plants mixed with controlled individuals of the same species.

Additionally, users should follow as many of the following herbicide resistance management practices as is practical:

- Use a broad spectrum soil-applied herbicide with other sites of action as a foundation in a weed control program.
- Utilize sequential applications of herbicides with alternative sites of action.
- Rotate the use of this product with non-Group 2 or 27 herbicides.
- Avoid making more than two applications of DuPont Instigate and any other Group 2 or 27 herbicides within a single growing season unless mixed with an herbicide with a different site of action with an overlapping spectrum for the difficult-to-control weeds.
- Incorporate non-chemical weed control practices, such as mechanical cultivation, crop rotation, cover crops and weed-free crop seeds, as part of an integrated weed control program.
- Use good agronomic principles that enhance crop development and crop competitiveness.
- Thoroughly clean plant residues from equipment before leaving fields suspected to contain resistant weeds.
- Manage weeds in and around fields, during and after harvest to reduce weed seed production.

# Integrated Pest Management

This product may be used as part of an Integrated Pest Management (IPM) program that can include biological, cultural, and genetic practices aimed at preventing economic pest damage. IPM principles and practices include field scouting or other detection methods, correct target pest identification, population monitoring, and treating when target pest populations reach locally determined action thresholds. Consult your state cooperative extension service, professional consultants or other qualified authorities to determine appropriate action treatment threshold levels for treating specific pest/crop systems in your area.

# **APPLICATION INFORMATION – ALL USES**

Rate of INSTIGATE®	Pounds of Active Ingredient Rimsulfuron	Pounds of Active Ingredient Mesotrione
5.25 oz	0.0137	0.137
6.0 oz	0.0156	0.156
7.0 oz	0.0182	0.182

# Application Information - Field Corn Grown for Grain or Silage

Instigate herbicide may be used in either conventional, conservation tillage, or no-till crop management systems and may be applied either preplant, preplant incorporated (less than 2" deep), preemergence, or early postemergence to field corn. Instigate herbicide can be applied to corn that exhibits up through 2 leaf collars.

# Application Timings

**Preplant Surface-Applied or Preplant Incorporated:** Instigate herbicide may be up to 14 days applied prior to planting. For preplant incorporated treatments apply to the soil and uniformly incorporate in the top two inches of soil before planting using a finishing disc harrow, field cultivator or similar implement

capable of providing uniform two inch incorporation. **DO NOT** incorporate Instigate deeper than 2" or weed control may be reduced.

**Preplant/Preemergence Burndown:** Instigate may be applied when weeds are present at the time of treatment. The addition of crop oil concentrate or methylated seed oil is recommended for burndown of labeled weeds 3 inches or less in height. When weeds are greater than 3" in height or weeds not controlled by Instigate herbicide are present, the addition of a burndown herbicide (e.g. paraquat, glyphosate, dicamba and/or 2,4-D) is recommended. If giant ragweed, common cocklebur, henbit, Pennsylvania smartweed or purple deadnettle are present at the time of application, the addition of atrazine or atrazine-containing herbicides will improve control. Observe directions for use and precautions and restrictions on the label of the burndown label herbicide. When mixing with liquid nitrogen fertilizer or glyphosate, substitute a non-ionic surfactant for crop oil concentrate. When tank mixing with EC formulation herbicides, such as DuPont<sup>™</sup> CINCH® or Surpass® NXT, refer to TANK MIXING section for additional adjuvant information.

**Preemergence:** Apply Instigate herbicide during planting (behind the planter after furrow closure) or after planting, but before crop emergence. Failure to thoroughly close and firm the seed furrow may allow herbicide to directly contact the seed which can cause injury.

**Early Postemergence Treatment:** In the event planned preemergence applications are delayed and corn is emerging, application may be made to emerged corn up through 2 collars. Use only clean water as the carrier when applying Instigate after corn emergence.

For control of labeled emerged weeds, applications of Instigate must include a crop oil concentrate or a nonionic surfactant. In addition, nitrogen based adjuvant (UAN or AMS) must be used unless specifically prohibited by tank mix partner labeling. Crop oil concentrate plus nitrogen based adjuvant is the preferred adjuvant system for Instigate for control of labeled emerged weeds. When applied in tank mix combination with a glyphosate that contains a built-in adjuvant, ensure the total adjuvant load is equivalent to the recommendations on this label. Select adjuvants authorized for use with both products.

Best results are obtained when applications are made to actively growing plants. Instigate is rainfast 1 hour after application.

**DO NOT** use with spray additives that alter the pH of the spray solution below 5.0 or above 9.0 as rapid product degradation can occur. Spray solutions of pH 6.0 - 8.0 allow for optimum stability of Instigate.

#### **Application Rate**

The typical DuPont Instigate use rate for most soils and application situations is 6 oz product per acre. Instigate may be applied within a rate range of 5.25 - 7.0 oz product per acre before corn emergence. Use higher rates on fine soils (silty clay loam, clay loam, sandy clay, silty clay or clay) or on soils with greater than 3% organic matter. **DO NOT** apply to coarse soils (sand, loamy sandy or sandy loam) with less than 1% organic matter. See cumulative rimsulfuron and mesotrione rate limitations noted under "Restrictions."

Instigate may be applied at 5.25 to 6.0 oz product per acre for early postemergence treatment on corn exhibiting up through 2 leaf collars.

#### Spray Adjuvants

When an adjuvant is to be used with this product, the use of an adjuvant that meets the standards of the Chemical Producers and Distributors Association (CPDA) adjuvant certification program is recommended. For preplant or preemergence burndown applications, for control of emerged labeled weeds, application of Instigate must include a crop oil concentrate, modified seed oil or a nonionic surfactant. In addition, nitrogen based adjuvant (UAN or AMS) must be used unless specifically prohibited by the tankmix partner labeling. Crop oil concentrate/modified seed oil plus nitrogen based adjuvant is the preferred adjuvant

systems. When applied in tank mix combination with a glyphosate or glufosinate herbicide that contains a built-in adjuvant system, ensure the total adjuvant load is equivalent to the recommendations on this label. Select adjuvants authorized for use with both products.

Instigate applied postemergence to the corn must include a crop oil concentrate or a nonionic surfactant. The use of methylated seed oil (MSO) adjuvants or MSO blend adjuvants may cause severe crop injury to occur. MSO adjuvants are not recommended. In addition, an ammonium nitrogen fertilizer must be used unless specifically prohibited by tank mix partner labeling. See TANK MIXING section for additional adjuvant information if tank mixing Instigate with EC formulation herbicides.

#### Weeds Controlled

Instigate applied as directed in this label will control or suppress the weeds listed in Tables 1 and 2. Additional weeds may be controlled with tank mixes. See the TANK MIXTURES section for recommended tank mix combinations.

Common Name	Instigate + 2,4-D	Instigate + glyphosate	Instigate + Atrazine
Alfalfa, volunteer	С	С	С
Amaranth, Palmer	С	С	С
Amaranth, Powell	С	С	С
Amaranth, spiny	С	С	С
Barley, volunteer	С	С	С
Barnyardgrass	С	С	С
Bluegrass, annual	С	С	С
Buckwheat, wild	С	С	С
Buffalobur	С	С	С
Burcumber	С	С	С
Butterweed	С	С	С
Carpetweed	С	С	С
Carrot, wild	С	С	С
Chamomile, false	С	С	С
Chickweed, common	С	С	С
Cocklebur	С	С	С
Crabgrass, large (1/2")	С	С	С
Cupgrass, woolly (1")	С	С	С
Dandelion (6" dia)	С	С	С
Deadnettle	С	С	С
Dock, curly	PC	С	С
Filaree, redstem	S	С	
Foxtail, bristly	С	С	С
Foxtail, giant	С	С	С
Foxtail, green	С	C	С
Foxtail, yellow	С	С	С
Galinsoga	С	С	С
Hemp	С	С	С
Henbit	С	С	С
Horsenettle	С	С	С
Jimsonweed	С	С	С
Johnsongrass, seedling	PC	C	С
Knotweed, prostrate			PC
Kochia	NC	C	С
Kochia (ALS-sensitive)	С	C	С
Lambsquarters, common	С	C	С
Mallow, Venice			С
Marestail	С	C	С

#### Table 1: Contact Weed Control with DuPont Instigate\* Herbicide

Millet, Wild Proso	PC	С	С
Morningglory, ivyleaf	C	C	C
Mustard, birdsrape	C	C	C
Mustard, black	C	C	C
Mustard, wild	C	C	C
Nightshade, eastern black	C	C	C
Nightshade, hairy	C	C	C
Nutsedge, yellow	C	C	C
Oat, wild	C	C	C
Panicum, fall	C	C	C
Pigweed, prostrate	C	C	C
Pigweed, redroot	C	C	C
Pigweed, smooth	C	C	C
Pigweed, tumble	C	C	C
Pokeweed, common	C	C	C
· · · · · · · · · · · · · · · · · · ·	PC	PC	PC
Purslane, common			
Pusley, FL	PC	С	C C
Quackgrass			
Radish, wild	С	С	C
Ragweed, common	С	С	С
Ragweed, giant	С	С	С
Ryegrass, Italian	С	С	С
Sandbur, field	PC	С	
Sesbania, hemp	PC	С	С
Shattercane	С	С	С
Shepherdspurse	С	С	С
Sida, prickly	С	С	С
Signalgrass, broadleaf	С	С	С
Smartweed, annual	С	С	С
Stinkgrass	PC	С	С
Sunflower	С	С	С
Thistle, Canada	С	С	С
Thistle, Russian, seedling	С	С	С
Velvetleaf	С	С	С
Waterhemp	С	С	С
Wheat, volunteer	С	С	С

\* Apply to weeds less than 5 inches tall. For control of emerged weeds the Instigate application must include the appropriate spray adjuvant. Refer to the SPRAY ADJUVANTS and TANK MIXTURES sections of the label.

# Table 2: Residual Weed Control with Preemergence Applications of DuPont Instigate Herbicide

Common Name	Instigate	Instigate + Atrazine	Instigate + DuPont™ Cinch® or Surpass NXT
Amaranth, Palmer	PC	С	С
Amaranth, Powell	PC	С	С
Amaranth, spiny	С	С	С
Barnyardgrass	С	С	С
Bluegrass, annual	PC	С	С
Buffalobur	С	С	С
Burcucumber	PC	PC	PC
Carpetweed	PC	С	С
Chamomile, false	С	С	С
Chickweed, common	С	С	С
Cocklebur	С	С	С
Crabgrass, large	PC	С	С
Crowfootgrass			С

0			â
Cupgrass, praire			С
Cupgrass, southwestern			C
Filaree, redstem	С	С	С
Fotail, bristly	С	С	С
Foxtail, giant	С	С	С
Foxtail, green	С	С	С
Foxtail, yellow	С	С	С
Galinsoga	С	С	С
Goosegrass			С
Henbit	С	С	С
Jimsonweed	С	С	С
Kochia	PC	С	С
Kochia (ALS-sensitive)	С	С	С
Lambsquarters, common	С	С	С
Marestail	С	С	С
Morningglory, ivyleaf	PC	С	С
Morningglory, pitted	PC	С	С
Mustard, birdsrape	С	С	С
Mustard, black	С	С	С
Mustard, wild	С	С	С
Nightshade, eastern black	С	С	С
Nightshade, hairy	C	С	С
Oat, wild	PC	C	C
Panicum, browntop			С
Panicum, fall	С	С	C
Pigweed, prostrate	PC	C	C
Pigweed, redroot	C	C	C
Pigweed, smooth	C	Č	C
Pokeweed, common	C	C	C
Purslane, common	C	Č	C
Pusley, FL	0	Ŭ	C
Ragweed, common	С	С	C
Ragweed, giant	PC	Č	C
Ryegrass, Italian	C	Č	C
Sicklepod		PC	PC
Signalgrass, broadleaf	PC	C	C
Smartweed, annual	C	C	C
Sunflower	C	C	C
Thistle, Russian	PC	C	C
Velvetleaf	<u></u> С	C	C
Waterhemp	PC	C	C
Watementp Wheat, volunteer	<u></u> С	C	C
· · · · · · · · · · · · · · · · · · ·	U		C
Witchgrass			U U

C = CONTROL, PC = PARTIAL CONTROL

#### Tank Mixtures

DuPont Instigate may be tank mixed with preemergence corn herbicides including atrazine, glyphosate, dicamba, 2,4-D, DuPont<sup>™</sup> CINCH<sup>®</sup> and Surpass NXT to provide added residual activity or burndown activity on emerged weeds. Consult tank mix partner labeling for rate and soil-type restrictions.

Ensure the tank mix product is labeled for the same timing, method of application, adjuvants, and use restrictions as Instigate and other products used in the tank mixture.

Ensure the tank mixture is not specifically prohibited on the label of the tank mix product.

For postemergence applications to corn if mixing with an EC formulation including CINCH® or Surpass®

NXT the user should leave the crop oil concentrate (COC) out of the adjuvant mix. These herbicides can act like an adjuvant in certain combinations and thus increase the risk of crop injury.

Instigate may be tank mixed with CINCH® ATZ, CINCH® ATZ LITE, FulTime® NXT, Keystone® NXT, or Keystone® LA NXT postemergence to the corn, but special attention must be paid to adjuvant selection and/or application method. If any of these tank mixtures are used the user should leave the urea ammonium nitrate (UAN) out of the mix.

There is still a risk of temporary crop injury in the form of leaf burn with these mixtures. To further reduce the risk of crop injury, the user may also leave out the crop oil concentrate (COC) or replace it with a nonionic surfactant (NIS). In either case, the control of emerged weeds may be reduced somewhat due to less than optimum adjuvant effect or weed coverage and there is still a risk of temporary crop injury in the form of leaf burn with these mixtures.

It is the pesticide user's responsibility to ensure that all products are registered for the intended use. Read and follow the applicable restrictions and limitations and directions for use on all product labels involved in tank mixing. Users must follow the most restrictive directions for use and precautionary statements of each product in the tank mixture.

#### Mixing instructions Fertilizer carrier instructions

Instigate may be mixed with water or pre-slurried in water and added to liquid fertilizer (excluding suspension fertilizers) for preemergence application. When using liquid fertilizer as the carrier, always pre-slurry Instigate in water before adding fertilizer solutions. Add the Instigate slurry to the final liquid fertilizer mixture – **DO NOT** add Instigate during the fertilizer mixing process. Always use good agitation while adding the Instigate slurry to the liquid fertilizer. Maintain good agitation until sprayed.

When using liquid fertilizer as the carrier, conduct a compatibility test with all the components prior to mixing.

**DO NOT** use with spray additives or liquid fertilizer carriers that alter the pH of the spray solution below pH 5.0 or above pH 9.0 as rapid degradation may occur. Spray solutions of pH 6.0-8.0 allow for optimum stability of Instigate.

#### Water Carrier Instructions

- 1. Fill the tank 1/4 to 1/3 full of water.
- 2. While agitating, add the required amount of Instigate.
- 3. Continue agitation until the Instigate is fully dispersed, at least 5 minutes.
- 4. Once the Instigate is fully dispersed, maintain agitation and continue filling tank with water. Instigate should be thoroughly mixed with water before adding any other material.
- 5. As the tank is filling, add tank mix partners (if desired).
- 6. If the mixture is not continuously agitated, settling will occur. If settling occurs, thoroughly reagitate before using.
- 7. At the end of the day, or for extended periods of time between Instigate applications, it is recommended to flush boom hoses and lines of spray solution and recharge with clean water. This will aid in proper sprayer cleanout when concluding Instigate applications before moving on to spray other products/crops.
- 8. Apply Instigate spray mixture within 48 hours of mixing to avoid product degradation.

# Tank Mix Compatibility Testing

Perform a jar test prior to tank mixing to ensure compatibility of Instigate and other pesticides. Use a clear glass quart jar with lid and mix the tank mix ingredients in their relative proportions. Invert the jar containing the mixture several times and observe the mixture for approximately 1/2 hour. If the mixture

balls-up, forms flakes, sludges, gels, oily films or layers or other precipitates, it is not compatible, and the tank mix combination must not be used.

# **Application and Spray Volumes**

# Ground Application (Also refer to Spray Drift Management section)

Avoid spray overlaps as excessive rates may result in adverse crop response.

Spray nozzle should be uniformly spaced the same size and type, and should provide accurate and uniform application. Use spray nozzles that provide medium to coarse droplet size to provide good coverage and avoid drift. Apply in a spray volume of 10-80 gals/A using water or liquid fertilizer (excluding suspension fertilizers) as the carrier. Use a pump that can maintain a pressure of at least 35-40 psi at the nozzles and provide proper agitation within the tank to keep the product dispersed. Lower pressure may be used with extended range or drift reduction nozzles.

Always ensue that agitation is maintained until spraying is completed, even if stopped for brief periods of time. If the agitation is stopped for more than 5 minutes, re-suspend the spray solution by running on full agitation prior to spraying.

To minimize spray drift to non-target areas, apply this product using nozzles which deliver a coarse or larger spray droplet as defined by ASAE standard S-572 and as shown in nozzle manufacturer's catalogues. Keep the spray boom at the lowest possible spray height above the target surface. Refer to nozzle manufacturer's recommendations for proper nozzle, pressure setting and sprayer speed for optimum product performance and minimal spray drift. Use sprayers that provide accurate and uniform application.

Maintain adequate agitation at all times, including momentary stops.

# Aerial Application (Also refer to Spray Drift Management section)

DuPont Instigate may be applied aerially for preemergence or postemergence weed control only in the following states: Alabama, Arkansas, Colorado, Florida, Georgia, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Minnesota, Mississippi, Missouri, Nebraska, North Dakota, Ohio, Oklahoma, South Dakota, Tennessee, and Texas.

For aerial application use only nozzles producing coarse-ultra coarse droplets. **DO NOT** use nozzles producing fine-medium size droplets.

Applications must be made in a minimum of 2 gallons of water per acre.

#### **Rotational Crop Guidelines**

Rotational crops vary in their crop response to low concentrations of Instigate remaining in the soil. The amount of Instigate that may be present in the soil depends on soil moisture, soil temperature, application rate, elapsed time since application and other environmental factors. When Instigate is used in combination with other products, always follow the most restrictive rotational crop requirements.

The following rotational intervals must be observed when Instigate is applied at 5.25 - 7.0 oz per acre:

Rotation Crop	Interval (months)
Corn, field	Anytime
Cereals, Winter	4
Cereals, Spring	9
Alfalfa <sup>†</sup> *	10

Canola <sup>†</sup>	10
Corn, pop, sweet, or seed	10
Cotton <sup>†</sup>	10
Flax	10
Peanuts	10
Peas <sup>1,2</sup>	10
Potatoes	10
Rice	10
Snap beans <sup>1,2</sup>	10
Sorghum <sup>†</sup>	10
Soybeans	10
Sunflower	10
Sweet potatoes/yams**	10
Tobacco	10
Crops Not Listed	18

† 18 months in the Red River Valley region of ND and MN. In all other areas, the rotation intervals should be extended to 18 months if drought conditions prevail after application and before the rotational crop is planted, unless sprinkler irrigation has been applied and totals greater than 15" during the growing season.

\* On sprinkler irrigated fields in Idaho, Utah, and Northern Nevada it is best to use deep fall tillage such as plowing prior to planting alfalfa. Product degradation may be less on furrow irrigated soils and may result in some crop injury.

\*\*On soils with pH 6.5 or less.

1.Plant these rotational crops only if the following criteria below have been met. If all criteria are not met, plant peas and snap beans a minimum of 18 months following Instigate application.

- A minimum of 20" of rainfall plus irrigation has been received between application and planting of the rotational crop.

- Soil pH is 6.0 or greater.

- Application of Instigate applied no later than June 30 the year preceding rotational crop planting.

- No other HPPD herbicides were applied the year prior to planting peas and snap beans.

2.DO NOT plant peas or snap beans on sand, sandy loam or loamy sands in Minnesota or Wisconsin.

Planting unspecified rotational crops, or those rotational crops that are specified at shorter than listed intervals may result in injury to the rotational crop.

#### **Cover Crops**

Use of cover crops as a means of soil improvement, erosion control, weed and/or insect suppression, etc., following harvest of corn in the fall is increasing. Planting of cover crops in fields treated with DuPont Instigate is allowed as long as these cover crops are not grazed by livestock nor harvested for food. Cover crops are to be tilled under or chemically controlled with burndown herbicides in the spring. Many cover crops can be planted within 90-120 days after application of Instigate. However, all potential cover crops have not been evaluated for tolerance to Instigate and significant injury may occur. Prior to seeding a cover crop complete a successful field/ home bioassay to provide an indication of the level of tolerance to the prior Instigate application. Refer to the "Field/Small Scale Bioassay" section. If used in tank mixtures with other herbicides, always follow the most restrictive label.

#### Field/Small Scale Bioassay

A field/ small scale bioassay must be completed before rotating to a cover crop other than those specified in the "Rotational Crop Guidelines" section of this label. To conduct an effective field bioassay, grow strips of the crop(s) you intend to grow the following season in a field previously treated with Instigate. The test strip should be placed in a controlled area and should include low areas and knolls, and include variations in soil such as type and pH. Crop response to the bioassay will determine if the crop(s) grown in the test strips can be grown safely in the areas previously treated with Instigate.

For an effective small scale bioassay, collect uniform samples of all soil types from the Instigate treated field (see example above for types of soil in the sample) and place the soil into a sturdy container. Plant the desired cover crop into the soil, apply water and place the container in a warm, sunny area to allow germination and growth of the crop. Monitor growth of the cover crop over a three to four week period. If

the cover crop emerges and grows normally, the risk to establish and grow the cover crop in the field treated with Instigate should be tolerable.

# **Sprayer Preparation/Cleanup**

It is important that spray equipment is clean and free of previous pesticide deposits before using Instigate and then properly cleaned out following application. Clean all application equipment before applying Instigate. Follow the cleanup procedures specified on the label of the product previously sprayed. If no cleanup procedure is provided, use the procedure that follows. Immediately following applications of Instigate, thoroughly clean all mixing and spray equipment to avoid subsequent crop injury.

When cleaning spray equipment before applying Instigate, read and follow label directions for proper rinsate disposal of the product previously sprayed.

When spraying or mixing equipment will be used over an extended period to apply multiple loads of Instigate, partially fill the tank with fresh water at the end of each day of spraying, flush the boom and hoses, and allow to sit overnight.

#### **Cleanup Procedure**

- 1. Drain the tank and thoroughly hose down the interior surfaces. Flush the tank, hoses, and boom with clean water for a minimum of 5 min.
- 2. Partially fill the tank with clean water and add one gal of household ammonia (containing 3% active) for every 100 gal of water. Finish filling the tank with water, then flush the cleaning solution through the hoses, boom, and nozzles. Add more water to completely fill the tank and allow to agitate/recirculate for at least 15 min. Again, flush the hoses, boom, and nozzles with the cleaning solution, then drain the tank.
- 3. Repeat Step 2.
- 4. Remove the nozzles, screens and the end caps of sprayer booms and clean separately in a bucket containing the cleaning agent and water.
- 5. Thoroughly rinse the tank with clean water for a minimum of 5 min, flushing the water through the hoses and boom.

# Mandatory Spray Drift Management

#### **Aerial Applications:**

- Do not release spray at a height greater than 10 ft above the vegetative canopy, unless a greater application height is necessary for pilot safety.
- For applications prior to the emergence of crops and target weeds, applicators are required to use a Coarse or coarser droplet size (ASABE S572.1)
- For all other applications, applicators are required to use a Medium or coarser droplet size (ASABE S572.1).
- The boom length must not exceed 65% of the wingspan for airplanes or 75% of the rotor blade diameter for helicopters.
- Applicators must use 1/2 swath displacement upwind at the downwind edge of the field.
- Nozzles must be oriented so the spray is directed toward the back of the aircraft.
- **DO NOT** apply when wind speeds exceed 10 miles per hour at the application site.
- **DO NOT** apply during temperature inversions.

# **Ground Boom Applications:**

- Apply with the nozzle height recommended by the manufacturer, but no more than 3 feet above the ground or crop canopy unless making a turf, pasture, or rangeland application, in which case applicators may apply with a nozzle height no more than 4 feet above the ground.
- For applications prior to the emergence of crops and target weeds, applicators are required to use a Coarse or coarser droplet size (ASABE S572.1).

- For all other applications, applicators are required to use a Medium or coarser droplet size (ASABE S572.1).
- **DO NOT** apply when wind speeds exceed 10 miles per hour at the application site.
- **DO NOT** apply during temperature inversions.

### **Boom-less Ground Applications:**

- Applicators are required to use a Medium or coarser droplet size (ASABE S572.1) for all applications.
- DO NOT apply when wind speeds exceed 10 miles per hour at the application site.
- **DO NOT** apply during temperature inversions.

### Spray Drift Advisories

#### **Boom-less Ground Applications:**

• Setting nozzles at the lowest effective height will help to reduce the potential for spray drift.

### Handheld Technology Applications:

• Take precautions to minimize spray drift.

THE APPLICATOR IS RESPONSIBLE FOR AVOIDING OFF-SITE SPRAY DRIFT. BE AWARE OF NEARBY NON-TARGET SITES AND ENVIRONMENTAL CONDITIONS.

#### Importance of Droplet Size

An most effective way to reduce spray drift is to apply large droplets. Use the largest droplets that provide target pest control. While applying larger droplets will reduce spray drift, the potential for drift will be greater if applications are made improperly or under unfavorable environmental conditions.

#### **Controlling Droplet Size – Ground Boom**

- **Volume** Increasing the spray volume so that larger droplets are produced will reduce spray drift. Use the highest practical spray volume for the application. If a greater spray volume is needed, consider using a nozzle with higher flow rate.
- **Pressure** Use the lowest spray pressure recommended for the nozzle to produce the target spray volume and droplet size.
- **Spray Nozzle** Use a spray nozzle that is designed for the intended application. Consider using nozzles designed to reduce drift.

#### **Controlling Droplet Size – Aircraft**

• **Adjust Nozzles** - Follow nozzle manufacturers recommendations for setting up nozzles. Generally, to reduce fine droplets, nozzles should be oriented parallel with the airflow in flight.

#### **Boom Height – Ground Boom**

Use the lowest boom height that is compatible with the spray nozzles that will provide uniform coverage. For ground equipment, the boom should remain level with the crop and have minimal bounce.

#### **Release Height – Aircraft**

Higher release heights increase the potential for spray drift. When applying aerially to crops, **DO NOT** release spray at a height greater than 10 ft above the crop canopy, unless a greater application height is necessary for pilot safety.

#### **Shielded Sprayers**

Shielding the boom or individual nozzles can reduce spray drift. Consider using shielded sprayers. Verify that the shields are not interfering with the uniform deposition of the spray on the target area.

When making applications in hot and dry conditions, use larger droplets to reduce effects of evaporation.

#### **Temperature Inversions**

Drift potential is high during a temperature inversion. Temperature inversions are characterized by increasing temperature with altitude and are common on nights with limited cloud cover and light to no wind. The presence of an inversion can be indicated by ground fog or by the movement of smoke from a ground source or an aircraft smoke generator. Smoke that layers and moves laterally in a concentrated cloud (under low wind conditions) indicates an inversion, while smoke that moves upward and rapidly dissipates indicates good vertical air mixing. Avoid applications during temperature inversions.

#### Wind

Drift potential increases with wind speed. AVOID APPLICATIONS DURING GUSTY WIND CONDITIONS. Applicators need to be familiar with local wind patterns and terrain that could affect spray drift.

#### **Sensitive Areas**

Making applications when there is a sustained wind moving away from adjacent sensitive areas (e.g., residential areas, bodies of water, known habitat for threatened or endangered species, non-target crops) is an effective way to minimize the effect of spray drift.

#### **Drift Control Additives**

Using product compatible drift control additives can reduce drift potential. When a drift control additive is used, read and carefully observe cautionary statements and all other information on the additive's label. If using an additive that increases viscosity, ensure that the nozzles and other application equipment will function properly with a viscous spray solution. Preferred drift control additives have been certified by the Chemical Producers and Distributors Association (CPDA).

USEPA REGISTERED PRODUCTS MENTIONED IN THIS LABEL FOR USE IN TANK MIXTURES OR OTHER REASONS		
PRODUCT BRAND NAME	ACTIVE INGREDIENT(S)	EPA REGISTRATION
		NUMBER
Cinch®	s-metolachlor	352-625
Cinch® ATZ	s-metolachlor	352-624
Cinch ATZ Lite	s-metolachlor	352-623
Surpass® NXT	acetochlor	62719-672
FulTime® NXT	acetochlor + atrazine	62719-668
Keystone® NXT	acetochlor + atrazine	62719-671
Keystone® LA NXT	acetochlor + atrazine	62719-670
Accent® Q	nicosulfuron	352-773
Realm® Q	rimsulfuron + mesotrione	352-837
Resolve® Q	rimsulfuron + thifensulfuron-methyl	352-777
Revulin® Q	nicosulfuron + mesotrione	352-900
Steadfast® Q	nicosulfuron + rimsulfuron	352-774
Basis® Blend	rimsulfuron + thifensulfuron-methyl	352-854
LeadOff®	rimsulfuron + thifensulfuron-methyl	352-853
Prequel®	isoxaflutole + rimsulfuron	352-779

#### IDENTIFICATION INFORMATION FOR OTHER PRODUCTS INCLUDED IN THIS LABEL:

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# For product information call: 1-800-258-3033

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