

# **WINTER AND SPRING WHEAT INCLUDING DURUM - GRASS WEEDS CONTROLLED**

## General Information

### PRODUCT INFORMATION

RIMFIRE Max Herbicide is intended for application as a foliar spray in winter and spring wheat (including durum) for control of annual grasses and broadleaf weeds.

### ENVIRONMENTAL AND BIOLOGICAL ACTIVITY

RIMFIRE Max Herbicide is absorbed by foliage and roots of weeds and offers contact and residual weed control. RIMFIRE Max Herbicide provides the most consistent control when applied to actively growing weeds. RIMFIRE Max Herbicide is active against many important grass and broadleaf weeds (see list below for details). Environmental conditions, which support vigorous growth of crop and weeds, also result in highest herbicidal activity. Following application, symptoms of herbicidal activity may develop within several days. Speed of herbicide action depends on environmental conditions and increases with increasing temperature and moisture. Sensitive weeds quickly stop growing and no longer compete with the crop. Visible signs of activity include cessation of elongation, yellowing and/or reddening of weeds, and finally plant death.

Abnormal environmental conditions (excess soil moisture or drought, extreme cold weather) can influence crop tolerance and herbicidal activity and may cause temporary response of the crop or reduced levels of weed control. This may result in weed stunting, rather than weed death. However, weed competition will be greatly reduced, and should permit normal crop development. Crop response may occur when frost occurs shortly after an application of RIMFIRE Max Herbicide to actively growing wheat.

### CROPS

RIMFIRE Max Herbicide may be used on winter and spring wheat, including durum.

### SURFACTANTS

RIMFIRE Max Herbicide is a water dispersible granule that does not include an

adjuvant. A recommended adjuvant must be tankmixed with RIMFIRE Max Herbicide according to the guidelines as described in the MIXING INSTRUCTIONS section.

RIMFIRE Max Herbicide offers the flexibility to choose between three distinct adjuvant systems including 1) methylated seed oil or 2) “basic blend” type adjuvant, 3) non-ionic surfactant plus ammonium nitrogen fertilizer. A methylated seed oil, basic blend adjuvant or a non-ionic surfactant (NIS) plus ammonium nitrogen fertilizer must be tankmixed with RIMFIRE Max Herbicide.

Do not use additives that alter the spray solution below 6.0 pH. Best results are obtained at spray solution pH of 6.0 – 8.0.

Organosilicone-based surfactants or crop oil concentrate surfactants are not recommended for use with RIMFIRE Max Herbicide.

### 1) Methylated Seed Oil (MSO)

A methylated seed oil offers the most robust adjuvancy with RIMFIRE Max Herbicide. Select a high quality methylated seed oil containing at least 80% methylated seed oil and 10% emulsifier or greater. Use 1.3 – 1.5 pt MSO/acre in tankmixture with RIMFIRE Max Herbicide. The potential for crop response may be increased with the use of MSO compared to non-ionic surfactant plus ammonium nitrogen fertilizer.

When a methylated seed oil is used, ammonium nitrogen or ammonium sulfate fertilizers are not recommended.

### 2) Basic Blend Adjuvants

A basic blend adjuvant is a formulated combination of a non-ionic surfactant or methylated seed oil and a nitrogen source. Apply a basic blend adjuvant at 1 - 1.25 % v/v in tank mixture with RIMFIRE Max Herbicide. Select the appropriate amount of basic blend adjuvant per acre depending on local conditions but do not apply less basic blend adjuvant than 0.8 pt/acre. When a basic blend adjuvant is used, ammonium nitrogen or ammonium sulfate fertilizers are not recommended.

### 3) Non-ionic Surfactant (NIS) + Ammonium Nitrogen Fertilizer (in water carrier solutions)

Use a non-ionic surfactant at a concentration of 0.25 - 0.5% v/v (1-2 qts per 100 gallons of spray solution) with ammonium nitrogen fertilizer. At least 80% of the surfactant product must be active non-ionic surfactant. Avoid products that do not accurately define their ingredients. Use a spray grade quality urea ammonium

nitrogen fertilizer (28-0-0 or 30-0-0 or 32- 0-0 at 1 – 2 qt/acre) or ammonium sulfate fertilizer (21-0-0-24 at 1.5 – 3 lbs/acre).

#### APPLICATION INFORMATION

RIMFIRE Max Herbicide should be applied to actively growing wheat in the spring.

RIMFIRE Max Herbicide provides consistent performance when applied with water as the spray carrier and the appropriate additive is added to the spray solution. Properly calibrated ground or aerial (fixed wing or helicopter) application equipment may be used to apply RIMFIRE Max Herbicide postemergence as a foliar spray. Weed infestations should be treated before they become competitive with the crop.

Thorough coverage of weeds is necessary to obtain good weed control. The use of nozzles and spray pressure that deliver MEDIUM spray droplets as indicated in the nozzle manufacturer's catalogs and in accordance with ASAE Standard S-572 are highly recommended for optimum spray coverage and canopy penetration.

Select spray nozzles that provide best spray distribution and weed coverage at the appropriate spray pressure. Avoid uneven spray distribution, skips, overlaps, and spray drift.

Do not apply RIMFIRE Max Herbicide through any type of irrigation system.

Apply 3 ounces/acre of RIMFIRE Max Herbicide to wheat from emergence (fully expanded first true leaf) up to flag leaf emergence. Do not apply more than a total of 3 ounces/acre of RIMFIRE Max Herbicide per season.

#### GROUND APPLICATION

RIMFIRE Max Herbicide can be applied broadcast in 10 or more gallons of water per acre. For weed control in dense weed canopies, use 15 or more gallons of water per acre. Weed infestations should be treated before they become competitive with the crop.

The use of 80-degree or 110-degree flat-fan nozzles is highly recommended for optimum spray coverage and canopy penetration. To get uniform spray coverage, use nozzles and pressure that deliver MEDIUM spray droplets as indicated in nozzle manufacturer's catalogs and in accordance with ASAE standard S-572. Use screens that are 50 mesh or larger.

Ground speed for application should not exceed 10 mph.

#### AERIAL APPLICATION

Calibrate the spray equipment prior to use. RIMFIRE Max Herbicide should be applied in a minimum of 5 gallons of water per broadcast acre. Weed infestations should be treated before they become competitive with the crop.

To get uniform spray coverage, use nozzles and pressure that deliver MEDIUM spray droplets as indicated in nozzle manufacturer's catalogs and in accordance with ASAE standard S-572. DO NOT use raindrop nozzles.

Aerial applications with this product should be made at a maximum height of 10 feet above the crop with low drift nozzles. Avoid application under conditions where uniform coverage cannot be obtained or where excessive spray drift may occur.

Flagmen and loaders should avoid inhalation of spray mist and prolonged contact with skin.

See the Spray Drift Management section of this label for additional information on proper application of RIMFIRE Max Herbicide.

#### RE-SUSPENDING WDG PRODUCTS IN SPRAY SOLUTION

Like other Water Dispersible Granules or suspension concentrates (SC's), RIMFIRE Max Herbicide may settle if left standing without agitation. If the spray solution is allowed to settle for one hour or more, re-agitate the spray solution for a minimum of 15 minutes before application.

#### COMPATIBILITY

If RIMFIRE Max Herbicide is to be tank mixed with other herbicides, compatibility should be tested prior to mixing. To test for compatibility, use a small container and mix a small amount (0.5 to 1 quart) of spray solution, combining all ingredients in the same ratio as the anticipated use. If any indications of physical incompatibility develop, do not use this mixture for spraying. Indications of incompatibility usually occur within 5-15 minutes after mixing. Indications of incompatibility include separation in the mix and either clumping or clabbering of the mixture. Read and follow the label of each tank mix product used for precautionary statements, directions for use, geographic and other restrictions.

#### WEEDS CONTROLLED

RIMFIRE Max Herbicide effectively controls the following weeds<sup>1</sup> when applied at the rates and application timings shown and weeds are actively growing. Best control is achieved when grass weeds are treated at the 1-leaf to 2-tiller stage of growth and before broadleaf weeds are larger than 2 inches in height.

#### CROP ROTATION RESTRICTIONS

To ensure safety of rotational crops, the following rotational intervals must be followed (refer in the table in the label).

- In areas where a crop is not specified, conduct a field bioassay as described in the FIELD BIOASSAY section of this label.
- In all areas, 24 inches of precipitation and a 12-month rotation interval are required for potatoes, buckwheat, and onions.

Rotational crops should not be planted on clay or eroded knolls or hillsides following a RIMFIRE Max Herbicide application without conducting a field bioassay.

#### FIELD BIOASSAY

A field bioassay must be conducted for crops not listed on this label and for crops listed on the label for which a shorter plant-back interval than listed is desired.

To conduct a field bioassay, plant strips of the crop you want to grow the season following RIMFIRE Max Herbicide application. Monitor the crop for response to RIMFIRE Max Herbicide to determine if the crop can be grown safely in previously treated RIMFIRE Max Herbicide areas.

Regardless of the bioassay results, do not plant any crop, except fall-sown or winter wheat, closer than 4 months after a RIMFIRE Max Herbicide application.

#### WEED RESISTANCE

##### Mode of Action

The active ingredients in this product, mesosulfuron-methyl, and propoxycarbazone-sodium are Group 2 Herbicides based on the mode of action classification system of the Weed Science Society of America. Any weed population may contain plants naturally resistant to Group 2 herbicides. Weeds resistant to Group 2 herbicides may be effectively managed utilizing another herbicide from a different Group and/or by using cultural or mechanical practices. However, a herbicide mode of action classification by itself may not adequately address specific weeds that are resistant to specific herbicides. Consult your local company representative, state

cooperative extension service, professional consultants, or other qualified authorities to determine appropriate actions for treating specific resistant weeds.

### Best Management Practices

RIMFIRE Max Herbicide is an acetolactate synthase (ALS) inhibiting herbicide.

Repeated use of herbicides with the same mode of action allows resistant weeds to spread. Proactively implementing diversified weed management programs may delay the development of resistant weeds. Diversified programs include the use of multiple herbicides with different modes of action with overlapping weed spectrums as well as the utilization of cultural weed control practices, such as tillage.

- Use labeled rates of herbicides and carefully follow the directions for use
- Scout fields after a herbicide application to facilitate early detection of weed shifts and/or weed resistance
- Implement measures to avoid allowing weeds to reproduce by seed or proliferate vegetatively
- Clean equipment between sites and avoid movement of plant material between sites to retard the spread of potentially resistant weed seed.

The use of RIMFIRE Max Herbicide should conform to resistance management strategies established for the use area. Consult your agricultural advisor for resistance management strategies and recommended pest management practices for your area.

### SPRAY DRIFT MANAGEMENT

RIMFIRE Max Herbicide is not volatile. Damage to sensitive crops can occur as a result of spray drift. Spray drift can be managed by several application factors and by spraying under the appropriate climatic conditions. Consequently, avoidance of spray drift is the responsibility of the applicator and grower.

### ENDANGERED SPECIES

To avoid adverse effects on endangered plant species, the following mitigation measures will be required where endangered species occur in Counties listed in the table on the following page.

For ground applications, the applicator must:

1. Apply when there is sustained wind away from native plant communities, OR
2. Leave 50 foot untreated buffer between treatment area and native plant communities.

For aerial applications, the applicator must:

1. Apply only when there is sustained wind away from native plant communities, OR
2. Leave 350 foot untreated buffer between treatment area and native plants.

#### PRECAUTIONS FOR USE

- Use adjuvants as specified on this label.
- RIMFIRE Max Herbicide is rainfast 4 hours after application to most weed species. Rainfall within 4 hours may result in reduced weed control.
- Applications should be made to actively growing weeds. Weed control may be reduced when weeds are under stress due to severe weather conditions, drought, very cold temperatures, etc. Weed control may be reduced if the herbicide application is made under dry, dusty conditions – especially in the wheel track areas. Ground speed for application should not exceed 10 mph.

#### RESTRICTIONS FOR USE

- Do not apply RIMFIRE Max Herbicide to crops undersown with grass or legume species.
- Do not make more than one application of RIMFIRE Max Herbicide per season.
- Do not apply more than 3 ounces/acre of RIMFIRE Max Herbicide per season.
- Do not apply more than 0.053 pounds of mefenpyr-diethyl per acre per year.
- Do not apply when wind causes drift to off-site vegetation as injury may occur. Small amounts of RIMFIRE Max Herbicide via drift or tank contamination can cause severe damage to crops other than wheat. Careful management of spray drifts and tank cleanout is required.
- Do not apply RIMFIRE Max Herbicide in tank mixture with malathion, mancozeb, phosphorodithioate (Di-Syston), or methyl parathion as unacceptable crop phytotoxicity may occur.
- Do not apply RIMFIRE Max Herbicide in tank mixture with tebuconazole.
- Do not harvest wheat for forage before 30 days or grain and straw 71 days after a RIMFIRE Max Herbicide application.

Limitations, Restrictions, and Exceptions

## WINTER AND SPRING WHEAT INCLUDING DURUM

### USE RATES

Unless otherwise recommended by Bayer CropScience, do not use less than 3 oz per acre of RIMFIRE Max Herbicide.

Apply RIMFIRE Max Herbicide at 3 ounces/acre to wheat in spring as a single application to actively growing weeds. Do not exceed a product application rate of 3 ounces/acre in a single application in the spring.

### NOTE:

Cheat (True cheat), Barnyardgrass, Foxtail barley, Green foxtail, Japanese brome, Yellow Foxtail: These weeds will be controlled when RIMFIRE Max Herbicide is applied at the pre-tiller stage of weed growth.

See label for recommended tankmix partners.

### Method

[Broadcast/Foliar Air](#)

[Broadcast/Foliar Ground](#)

### Rates

[field rates 0](#)

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### Restricted Entry Interval

12 hours

### Timings

[Postemergence \(Weed\)](#)