

72167-40

10/08/2004

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U.S. ENVIRONMENTAL PROTECTION AGENCY
Office of Pesticide Programs
Registration Division (H7505C)
401 "M" St., S.W.
Washington, D.C. 20460

EPA Reg.
Number:
72167-40

Date of Issuance:
007 - 8 2004

Term of Issuance:
Conditional

Name of Pesticide Product:
Oxadiazon 50

NOTICE OF PESTICIDE:

☒ Registration
Reregistration

(under FIFRA, as amended)

Name and Address of Registrant (include ZIP Code):

Nations Ag II, LLC
4680 Monticello Ave. #181-174
Williamsburg, VA 23188

Note: Changes in labeling differing in substance from that accepted in connection with this registration must be submitted to and accepted by the Registration Division prior to use of the label in commerce. In any correspondence on this product always refer to the above EPA registration number.

On the basis of information furnished by the registrant, the above named pesticide is hereby registered/reregistered under the Federal Insecticide, Fungicide and Rodenticide Act.

Registration is in no way to be construed as an endorsement or recommendation of this product by the Agency. In order to protect health and the environment, the Administrator, on his motion, may at any time suspend or cancel the registration of a pesticide in accordance with the Act. The acceptance of any name in connection with the registration of a product under this Act is not to be construed as giving the registrant a right to exclusive use of the name or to its use if it has been covered by others.

This product is registered in accordance with FIFRA sec. 3(c)(7)(A) provided that you:

1. Add the phrase "EPA Registration No.72167-40" to the label before you release the product for shipment.

COMMENTS CONTINUED ON PAGE 2 OF THIS NOTICE OF REGISTRATION

If these conditions are not complied with, the registration will be subject to cancellation in accordance with FIFRA section 6(e). Your release for shipment of the product under the enclosed stamped copy of the label constitutes acceptance of these conditions.

Enclosure

Joanne I. Miller
Product Manager (23)
Herbicide Branch
Registration Division (7505C)

Signature of Approving Official:

LSI

Date:

007 - 8 2004

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2. Submit the following data required for the registration of this pesticide product within 1 year of the date of this Notice of Registration:

<u>EPA Guideline Data Number</u>	<u>Guideline Descriptor</u>
830.6317	Storage Stability Study
830.6320	Corrosion Characteristics

3. Add your EPA establishment number and net contents to the label.
4. Submit one (1) copy of the final printed labeling before you release this product for shipment.
5. Submit and/or cite all data required for the registration of this product when the Agency requires all registrants of similar products to submit data; and submit acceptable responses required for reregistration of this product under FIFRA, section 4.

A Stamped copy of the label is enclosed for your records.

Attachment

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OXADIAZON 50

A pre-emergent herbicide for the control of broadleaf weeds and annual grasses in turf and ornamentals.
FOR SALE TO, USE AND STORAGE BY COMMERCIAL TURF, NURSERY, AND LANDSCAPE PERSONNEL ONLY. DO NOT USE ON HOME LAWNS.

ACTIVE INGREDIENT:

Oxadiazon: 3-[2,4-dichloro-5-(1-methylethoxy)phenyl]-5-(1,1-dimethylethyl)-1,3,4-oxadiazol-2(3H)-one.....50 %

INERT INGREDIENTS:.....50 %

TOTAL100 %

**ACCEPTED
with COMMENTS**
In EPA Letter Dated:

OCT - 8 2004
Under the Federal Insecticide,
Fungicide, and Rodenticide Act
as amended, for the pesticide
registered under EPA Reg. No.

KEEP OUT OF REACH OF CHILDREN WARNING AVISO

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

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EPA Reg. No. 72167-UN

EPA Est. No. _____

In case of medical emergencies, call 800-308-5391. In case of environmental or transportation emergencies or injuries, call 800-424-9300. For product information, call 865-777-9505.

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. * Call a poison control center or doctor for treatment advice.
IF ON SKIN:	* Take off contaminated clothing. * Rinse skin immediately with plenty of water for 15 – 20 minutes. * Call a poison control or doctor for treatment advice.
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.
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 by mouth to an unconscious person.
HAVE THE PRODUCT CONTAINER OR LABEL WITH YOU WHEN CALLING A POISON CONTROL CENTER OR DOCTOR OR GOING FOR TREATMENT. For medical emergencies involving this product, call 1-800-308-5391.	

NET CONTENTS: _____

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PRECAUTIONARY STATEMENTS

WARNING

HAZARDS TO HUMANS

Causes substantial but temporary eye injury. Causes skin irritation. Harmful if inhaled or absorbed through skin. Do not get in eyes, on skin or on clothing. Avoid breathing dust.

PERSONAL PROTECTIVE EQUIPMENT

Applicators and other handlers must wear coveralls over short-sleeved shirt and short pants, waterproof gloves, a chemical-resistant apron when cleaning equipment, mixing or loading, protective eyewear, chemical resistant headgear for overhead exposure and chemical resistant footwear plus socks. Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

ENGINEERING CONTROLS STATEMENTS

When handlers use closed systems, enclosed cabs, or aircraft 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 clothing immediately if pesticide gets inside. Then wash body thoroughly and put on clean clothing.

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 by cleaning of equipment or disposal of wastes. Oxadiazon 50 should not be used in areas where irrigation or rainfall results in the direct or indirect (via ditches and canals) contamination of surface waters through dissolved runoff or erosion of soil particles to which oxadiazon is absorbed.

DIRECTIONS FOR USE

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

Read entire label before using this product. 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 responsible for pesticide regulation.

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 intervals. 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 treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil, or water, is coveralls over short-sleeved shirt and short pants, waterproof gloves, protective eyewear, chemical-resistant footwear plus socks and chemical-resistant headgear for overhead exposure.

STORAGE AND DISPOSAL

PESTICIDE STORAGE: Do not contaminate water, food or feed by storage or disposal. Do not store in or around the home.

PESTICIDE DISPOSAL: Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER DISPOSAL: Completely empty bag into application equipment. Then dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by State and local authorities, by burning. If burned, stay out of smoke.

GENERAL INFORMATION

One water-soluble packet is equivalent to 1 pound of product, which equals 1/2 pounds of active ingredient.

Oxadiazon 50 is a preemergent herbicide for control of many broadleaf weeds and annual grasses in turf and on a variety of woody ornamental shrubs and trees. Oxadiazon 50 controls weeds by killing the seedlings of young weeds as they come in contact with the herbicide during germination.

Make applications with a properly calibrated sprayer that will apply the spray solution uniformly. Uniform application is essential for satisfactory weed control. Calibrate the sprayer before using, according to the manufacturer's directions, and check the equipment daily to assure that it is working properly.

Application Rates: Wherever a range of application rates are listed on this label (for example: "4-6 water soluble packets packets"), use higher rates of Oxadiazon 50 where heavy weed pressure is anticipated, or where medium or fine textured soils exist. Soil textures are defined as follows:

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- Coarse: Sand, sandy loam, loamy sand
- Medium: Loam, silt loam, silt
- Fine: Sandy clay loam, silty clay loam, clay loam, sandy clay, silty clay, clay

Lower rates may be used on light (coarse) texture, low organic matter (< 1.0% OM) soils; however, these guidelines are intended as general information only. Consult the list of annual grasses and broadleaf weeds below for rates used to control specific weeds.

When a range of spray volumes is recommended, use a sufficient amount to ensure adequate spray coverage under your use conditions. Generally, larger plants require larger volumes.

GENERAL HANDLING INSTRUCTIONS

Each Oxadiazon 50 water-soluble bag is sealed within a plastic outer sleeve. Do not break the seal until ready to use. Open the end of the outer sleeve by tearing it along the printed solid line. **Note:** Do not use a knife or other sharp object to break the seal. Once the outer protective sleeve is opened, the water-soluble bag inside can be dropped into the spray tank at the appropriate time without touching the bag.

HANDLING PRECAUTIONS

- Do not allow the empty outer sleeve or the tear-strip to fall into the spray tank. They are not water-soluble and could clog the sprayer.
- Do not handle the inner bag with wet gloves, as the bag will begin to dissolve on contact. This can occur with even a small amount of water.
- Do not open the inner bags, and do not attempt to remove the product from them. The water-soluble packet is not to be subdivided or re-measured.
- Do not open the PVA bag. A partial bag should not be used for a tank mix.
- Use the entire contents of the water-soluble bag.

Do not permit domestic animals to graze treated areas. Avoid contamination of water that is intended for irrigation and domestic use.

TURF

For use in dormant, established Bermudagrass, St. Augustinegrass and Zoysia turf such as fairways, golf courses, parks, and lawns. Oxadiazon 50 controls Crabgrass, Annual Bluegrass, Goosegrass, Virginia Buttonweed, and Annual Sedge.

Apply Oxadiazon 50 at least 2-3 weeks prior to greenup. Rake turf area to remove leaves and trash. If necessary, mow turf to ensure the spray solution reaches the soil surface. Measure the area to be treated and apply the amount required uniformly. If rain is not expected shortly after application of this product, sprinkle the turf thoroughly.

* Do not use on Zoysia Turf or St. Augustinegrass in California.

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Hawaii recommendation only: Oxadiazon 50 may be applied to newly sprigged Zoysiagrass that is being grown for sod. Ensure that the spray reaches the soil surface. If rain is not expected shortly after application of this product, irrigate the turf thoroughly.

PREEMERGENCE WEED CONTROL

WEEDS CONTROLLED	NUMBER OF OXADIAZON 50 WATER SOLUBLE PACKETS PER ACRE	INSTRUCTIONS
Annual Bluegrass (<i>Poa annua</i>)* Crabgrass (<i>Digitaria spp.</i>) Goosegrass (<i>Eleusine indica</i>) Annual Sedge (<i>Cyperus compressus</i>)*	4 - 6	Apply in late winter or early spring before weed seed germination and turf green up. NOTE: Treatment is effective only against spring germinating <i>Poa annua</i> .
Virginia Buttonweed (<i>Diodia virginiana</i>)	6	Apply in 30 – 150 gallons of water per acre.

* Not currently registered in California.

Review the instructions under **Application Rates** in the **GENERAL INFORMATION** section above for additional application information.

ANNUAL WEED CONTROL FOR BERMUDAGRASS ESTABLISHMENT FROM SPRIGS

WEEDS CONTROLLED	NUMBER OF OXADIAZON 50 Water SOLUBLE PACKETS PER ACRE	INSTRUCTIONS
Crabgrass, Annual Sedge, and Goosegrass	4 - 6	Apply immediately before or immediately after sprigging. Disturbance of the soil surface after applying Oxadiazon 50 may disrupt the herbicide barrier and reduce product effectiveness. For best results, irrigate immediately after application.

Oxadiazon 50 must not be applied to newly seeded areas. Wait until 4 months after treatment before seeding into treated areas. Do not use Oxadiazon 50 on putting greens or tees because of the varying cultural practices used. Apply this product in 30 – 150 gallons of water per acre.

Review the instructions under **Application Rates** in the **GENERAL INFORMATION** section above for additional application information.

ORNAMENTALS AND CONIFER NURSERIES

TREE, WOODY ORNAMENTAL SHRUB AND CONIFER NURSERY APPLICATIONS: Apply Oxadiazon 50 before weed seed germination, as a directed spray to the soil surface or as an over the top spray only on species listed in this label. Oxadiazon 50 can be applied to both established and newly transplanted plants. Apply to actively growing or dormant plants. However, Oxadiazon 50 should not be applied during bud break or during the 4 weeks immediately following bud break.

Rainfall or overhead irrigation (one-half inch) should follow immediately after application of Oxadiazon 50 to improve weed control activity. Rainfall or overhead irrigation immediately after over-the-top sprays is necessary to move the Oxadiazon 50 from the foliage to the soil surface.

Do not mix Oxadiazon 50 into the soil. Cultivating or disturbing the soil may reduce the weed control activity of Oxadiazon 50. **Do not apply in greenhouses** as plant injury may occur due to codistillation of the active ingredient onto leaf surfaces in condensation.

USE RATES: Ground application – Apply Oxadiazon 50 to ornamentals with a broadcast spreader in a minimum of 50 gallons per acre at 4 to 8 water soluble packets per acre, depending on the weeds to be controlled, as listed below. Remove existing weed growth before application. Review the instructions under **Application Rates** in the **GENERAL INFORMATION** section above for additional application information.

Oxadiazon 50 at 4 to 8 water-soluble packets per acre is effective in controlling broadleaf weeds and annual grasses such as the following:

ANNUAL BROADLEAF WEEDS	
COMMON NAME	SCIENTIFIC NAME
Bittercress	(<i>Cardamine spp.</i>)
Bristly Oxtongue ¹	(<i>Picris echioides</i>)
Carpetweed	(<i>Mollugo verticillata</i>)
Cheeseweed	(<i>Malva parviflora</i>)
*Common Groundsel	(<i>Senecio vulgaris</i>)
Common Purslane	(<i>Portulaca oleracea</i>)
*Evening Primrose	(<i>Oenothera spp.</i>)
Fiddleneck ¹	(<i>Amsinckia intermedia</i>)
Fireweed ¹	(<i>Epilobium angustifolium</i>)
Florida Pusley	(<i>Richardia scabia</i>)
*Galinsoga	(<i>Galinsoga spp.</i>)
Golden Ragwort	(<i>Senecio aureus</i>)
Lambsquarters	(<i>Chenopodium album</i>)
**Liverwort	(<i>Marchantia spp.</i>)
Oxalis	(<i>Oxalis spp.</i>)
Pennsylvania Smartweed	(<i>Polygonum pensylvanicum</i>)
Petty Spurge	(<i>Euphorbia peplus</i>)
**Prostrate Spurge	(<i>Euphorbia supine</i>)

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Redroot Pigweed	(<i>Amaranthus retroflexus</i>)
Shepherdspurse'	(<i>Capsella bursa-pastoris</i>)
Speedwell	(<i>Veronica spp.</i>)
Sow Thistle'	(<i>Sonchus oleraceus</i>)
Spotted Catsear	(<i>Hypochaeris radicata</i>)
*Swinecress	(<i>Coronopus didymus</i>)
Yellow Woodsorrel'	(<i>Oxalis stricta</i>)

ANNUAL GRASSES	
COMMON NAME	SCIENTIFIC NAME
Annual Sedge'	(<i>Cyperus compressus</i>)
*Barnyardgrass	(<i>Echinochloa crus-galli</i>)
Carpetgrass	(<i>Axonopris offinis</i>)
Crabgrass	(<i>Digitaria spp.</i>)
Fall Panicum	(<i>Panicum dichotomiflorum</i>)
**Goosegrass	(<i>Eleusine indica</i>)
Green Foxtail	(<i>Setaria viridis</i>)
Ripgut Bromegrass'	(<i>Bromus catharticus</i>)
Wild Oats'	(<i>Avena fatua</i>)

* Use 6 to 8 water-soluble packets of this product per acre.

** Use 8 water-soluble packets of this product per acre.

' Not currently registered in California for use on Annual Bluegrass, Annual Sedge, Bristly Oxtongue, Cheeseweed, Fiddleneck, Fireweed, Ripgut Bromegrass, Shepardspurse, Sow Thistle, and Wild Oats.

PLANT TOLERANCE: Oxadiazon 50 may be used as a directed spray to the soil surface on a wide variety of field grown and container grown woody ornamental shrubs and trees and on conifers in nurseries. Oxadiazon 50 may be used as an over-the-top spray in a minimum of 50 gallons per acre, at the recommended rates, only on the ornamental species below:

SPECIES	VARIETIES
Arborvitae	American – Smaragd, Rheingold Giant – Zebrina
Baby's Breath	<i>Gypsophila paniculata</i>
Barberry	Japanese
Boxwood	Dazzler
Cedar	Eastern Red
Cranberry	American
Dodonaea	Purpurea
Euonymus	Evergreen – Golden Japanese, Gold Spot
False Cypress	Nootka – Aurea
	Hinoki – Graciosa, Pygmaea
	Sawara – Aurea Nana
Fir*	Douglas, Fraser, Grand, Noble
Gladiolus	
Hemlock*	Canada

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Holly	Japanese – Helli Kurogane Chinese – Parsonii
Juniper	Common – Berkshire, Effusa Creeping – Blue Chip, Blue Rug, Andorra Singleseed – Blue Star Savin – Buffalo, Tamariscifolia
Oleander	Common
Ophiopogon	
Pine	Eastern White, Mugho, Scotch
Raphiolepis	
Spruce*	Blue
Statice	<i>Limonium spp.</i>

- Not currently registered for use on Hemlock, Fir, and Blue Spruce in California.

Local conditions may affect the use of this product. Consult State Agricultural Experiment Station or Extension Service weed specialists for specific recommendations regarding local weed problems and for information about using lower dosages.

LANDSCAPE PLANTINGS: ROADSIDE, COMMERCIAL, & INDUSTRIAL SITES. Apply Oxadiazon 50 before weed seed germination as an over-the-top spray only on those ornamentals on this label.

USE RATES: Apply Oxadiazon 50 as a broadcast spray, in a minimum of 50 gallons of water per acre, to established ornamentals using 4 water-soluble packets per acre. Remove all existing weed growth before applying. Applications should not be made within 60 days of transplanting. Do not apply with drift control agents or adjuvants. Sprinkle irrigate within 2 hours after applying this product, otherwise, crop injury may result.

CROP TOLERANCE: Oxadiazon 50 may be used as an over-the-top spray only the ornamental species listed below.

SPECIES	VARIETIES
Ice Plant	Large Leaf
Ivy	English, Algerian
Daisy	African Trailing
Periwinkle	Major, Minor

TANK MIX COMBINATIONS: Ornamental Plantings, Noncropland areas:

Tank-mix combinations consisting of Oxadiazon 50 with Roundup® are recommended to control existing undesirable vegetation. When applied as a directed spray, Oxadiazon 50 plus Roundup will provide pre- and postemergence control of the susceptible species that are listed on the respective labels of the two herbicides.

MIXING INSTRUCTIONS: Oxadiazon 50 should be added to the tank and agitated before adding Roundup. Please refer to the Roundup label for information on the use of surfactants. Only mix the

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amount of spray needed for immediate application needs as settling can occur if the spray mixture is sits over an extended period of time.

PRECAUTION: Roundup is not recommended as an over-the-top spray on ornamentals. Exercise extreme care to avoid contact of spray containing Roundup with foliage, green bark, stems, or bare roots of desirable turfgrasses, shrubs, trees, or other desirable vegetation since severe damage or destruction may result. If spraying a tank mix with Roundup on areas adjacent to desirable plants, use a shield made of plywood, cardboard, or sheet metal while spraying to help prevent spray from contacting foliage of desirable plants.

**BROADCAST APPLICATION RATES:
OXADIAZON/ROUNDUP TANK MIX**

Existing Broadleaf and Annual Weeds	OXADIAZON 50 Number of Water Soluble Packets per Acre	ROUNDUP Quarts Per Acre
Less Than 6 Inches Tall	4 - 8	1
Greater Than 6 Inches Tall	4 - 8	1 ½
Existing Perennials	4 - 8	2 - 5

These rates are intended as general information only. Consult the rate sections in individual product labels for detailed information regarding specific weed species controlled and rates of application.

Review the instructions under **Application Rates** in the **GENERAL INFORMATION** section above for additional application information.

CONDITIONS OF SALE AND WARRANTY

The **DIRECTIONS FOR USE** of this product are believed to be reliable and should be followed carefully. However, it is impossible to eliminate all risks inherently associated with use of this product. Crop injury, ineffectiveness or other unintended consequences may result because of such factors as weather conditions, presence of other materials, or use of the product in a manner inconsistent with its labeling, all of which are beyond the control of NATIONS AG II, LLC or the seller. All such risks shall be assumed by the buyer.

NATIONS AG II, LLC warrants that this product conforms to the chemical description on the label and is reasonably fit for the purposes set forth in the **DIRECTIONS FOR USE** when it is used in accordance with such directions, subject to the inherent risks mentioned above.

NATIONS AG II, LLC NEITHER MAKES NOR INTENDS, NOR DOES IT AUTHORIZE ANY AGENT OR REPRESENTATIVE TO MAKE ANY OTHER WARRANTIES, EXPRESSED OR IMPLIED, AND IT EXPRESSLY EXCLUDES AND DISCLAIMS ALL IMPLIED WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. THIS WARRANTY EXTENDS TO, AND THE BUYER SHALL BE SOLELY RESPONSIBLE FOR ANY AND ALL LOSS OR DAMAGE WHICH RESULTS FROM THE USE OF THIS PRODUCT IN ANY MANNER WHICH IS INCONSISTENT WITH THE LABEL DIRECTIONS, WARNINGS, OR CAUTIONS. BUYER'S EXCLUSIVE REMEDY AND MANUFACTURER'S OR SELLER'S EXCLUSIVE LIABILITY FOR ANY AND ALL CLAIMS, LOSSES, DAMAGES, OR INJURIES RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT, WHETHER OR NOT BASED IN

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CONTRACT, NEGLIGENCE, STRICT LIABILITY IN TORT OR OTHERWISE, SHALL BE LIMITED, AT THE MANUFACTURER'S OPTION TO REPLACEMENT OF, OR THE REPAYMENT OF THE PURCHASE PRICE FOR, THE QUANTITY OF PRODUCT WITH RESPECT TO WHICH DAMAGES ARE CLAIMED. IN NO EVENT SHALL MANUFACTURER OR SELLER BE LIABLE FOR SPECIAL, INDIRECT OR CONSEQUENTIAL DAMAGES RESULTING FROM THE USE OR HANDLING OF THIS PRODUCT. NATIONS AG II, LLC and the seller offer this product, and the Buyer and User accept it, subject to the foregoing CONDITIONS OF SALE AND WARRANTY.

Nations Ag II, LLC
2901-12 Rivendell
Knoxville, TN 37922

Quali-Pro is a trademark of FarmSaver.com LLC
Roundup is a registered trademark of Monsanto Agricultural Company.

EPA Draft 6-22-04 REV 2 100404