

PRODUCT NO.

2101

NET CONTENTS  
GALLONS

# BUTOXONE®

## A SELECTIVE WEED KILLER

For the control of certain seedling broadleaf weeds in seedling stands of Alfalfa, Birdsfoot Trefoil, Red Clover, Alsike, White and Ladino Clovers, and for use on established stands of Alfalfa; also Soybeans and Peanuts.

**ACTIVE INGREDIENT:**

Dimethylamine salt of 4-(2,4-dichlorophenoxy) butyric acid\* . . . . . 23.0%

**INERT INGREDIENTS** . . . . . 77.0%

\*Equivalent to 19.5% by weight of 4-(2,4-dichlorophenoxy) butyric acid, or not less than 1.75 lbs. 4-(2,4-DB) acid per gal. at 68°F.

U. S. Patent No. 2,863,754 and U. S. Patent No. 2,866,816

### CAUTION: Keep Out of Reach of Children

**CAUTION:** Avoid contact with skin, eyes, or clothing. Do not store near fertilizers, insecticides, fungicides, or seeds. Do not contaminate water intended for irrigation purposes. Do not reuse shipping containers. Store at temperatures above 32°F. If allowed to freeze remix before using.

Avoid spray drift to susceptible plants and crops as it may injure cotton, tobacco, tomatoes, and ornamentals. Coarse sprays are less likely to drift. Do not use same spray equipment for other purposes without first thoroughly cleaning with alkali and water. Small amounts of 2,4-D, MCPA, silvex, or 2,4,5-T may injure legumes and peanuts; sprayers previously used to apply these chemicals must be thoroughly cleaned with alkali and water before being used for applying Butoxone. Similarly, after using Butoxone give sprayer a thorough cleaning before using again to spray susceptible crops. Contact your supplier for special instructions on cleaning spray equipment. Do not use near greenhouses.

Destroy container by burying in a safe place. Do not burn.

Do not contaminate water by cleaning of equipment, or disposal of wastes. Apply this product only as specified on this label.

### LEGUMES

**CONTROLS THESE WEEDS:** At the recommended rates Butoxone will control many seedling broadleaf weeds including those in the following list:

- Lambsquarters (Chenopodium album)
- Pigweed (Amaranthus spp.)
- Stinkweed (Fenweed or Pennycress) (Thlaspi arvense)
- Ragweed (Ambrosia artemisiifolia)
- Curly Dock (Rumex crispus)
- Sweet Clover (Volunteer plants)
- Wild Mustard (Brassica kaber, B. nigra)
- Wild Turnip (Brassica rapa)
- Sugar Beet (Volunteer plants)
- Shepherdspurse (Capsella bursa-pastoris)

- Wild Beet (Beta maritima)
- Jimsonweed (Datura spp.)
- Annual Morningglory (Ipomoea spp.)
- Hedge Smartweed (Polygonum scandens)
- Narrowleaf Plantain (Plantago lanceolata)
- Smartweed (Polygonum persicaria)
- Kochia or Mexican Fireweed (Kochia scoparia)
- Prickly Lettuce (Lactuca scariola)
- Velvetleaf (Abutilon theophrasti)
- Cocklebur (Xanthium spp.)

### DIRECTIONS FOR USE: LEGUMES (first read cautions)

**WHEN TO APPLY:** Weeds must be in the young seedling stage and actively growing to achieve satisfactory results. The older the weeds become the more difficult they are to control. For best results spray weeds in the 2 to 5 leaf stage of growth.

**SEEDLING LEGUMES:** Spray when legume crop has reached the 1 to 2 trifoliate leaf stage and growing conditions are good.

**ESTABLISHED ALFALFA:** Certain weeds will emerge in the fall and over winter in a rosette stage. Best control of these weeds will result from applications in late fall or early winter rather than in the spring. Do not apply after flowering. Follow state recommendations for timing and possibly lower rates to be used under local conditions.

**HOW TO APPLY:** Read caution regarding spray drift. Apply as an overall spray by ground sprayer or airplane. Use agitation to keep emulsion well mixed, especially if emulsion has been allowed to stand. Calibrate sprayer accurately.

**AMOUNT TO USE:** Mix thoroughly in sufficient water to give adequate coverage of the weeds without run-off. Apply at rates and dilutions shown in table. Use the higher rate if weeds are past the seedling stage. The use of 1/2 to 1 pint of Rhodia Spreader Activator per 100 gallons of spray will usually result in better weed control, especially if weeds are beyond the seedling stage. Calibrate sprayer accurately.

BROADLEAF WEEDS	Amount Butoxone Per Acre	4-(2,4-DB) Acid Equiv. Per Acre	Suggested Dilution Per Acre
For Lambsquarters, Pigweed, Kochia, Cocklebur, Velvetleaf, Jimsonweed, Annual Morningglory, Wild Turnip.	4 1/2 pts.	1 lb.	Airplane Applications: 10 gals. of water or Ground Sprayer Applications: 20 to 30 gals. of water
For Stinkweed, Curly Dock, Smartweed, Ragweed, Wild Mustard, Prickly Lettuce, Wild Beet, Shepherdspurse, Hedge Smartweed, Narrowleaf Plantain, Volunteer Sweet Clover.	6 1/2 pts.*	1 1/2 lbs.	
*On Red Clover do not use more than 1 1/4 qts. per acre.			

### GENERAL CAUTIONS: LEGUMES

Do not graze established alfalfa, nor feed straw or hay from established alfalfa to livestock within 30 days after application. Do not graze or feed SEEDLING Alfalfa, Clover, and Birdsfoot Trefoil within 60 days after application. Do not use on Sweet Clover and other legumes not mentioned, nor on established clovers grown for seed. Irrigation, in particular, overhead sprinkler irrigation, should be delayed as long as possible (10 days or more) following application of Butoxone to avoid washing the chemical into the root zone. Do not apply when crop is stressed from lack of moisture. Do NOT use on peas.

Apply as a postemergence spray. When properly timed there is little or no effect on the crop. In established Alfalfa there may be some twisting of stems and malformation of leaves. This condition is usually outgrown.

Do not spray when daytime temperatures are expected to exceed 90°F. within the next 2 or 3 days. Do not apply when crop is stressed for lack of moisture. Do not apply if temperatures are likely to fall below 40°F. during or shortly after treatment.

### PEANUTS—TOPICAL (OVERHEAD) APPLICATIONS

Use 1 gallon of Butoxone per 8 acres for the control of Cocklebur. For control of weeds such as Annual Morningglory, Velvetleaf, Jimsonweed, Coffee-weed, Common Ragweed, and Lambsquarters, use 1 gallon of Butoxone per 4 1/2 acres. Applications should be made when weeds are in the seedling stage and actively growing. Do not apply more than two applications per season; the second application should be made no later than the late bloom stage of peanuts (about 90-100 days after planting). Do not feed treated peanut vines and peanut hay to livestock. Do not apply to peanuts within 30 days of harvest. Do not apply to drought stressed peanuts.

### METHOD OF TOPICAL APPLICATION FOR SOYBEANS AND PEANUTS

**GROUND SPRAY APPLICATIONS:** Use a boom sprayer with flat fan-type nozzles. Adjust the height of the boom above the crop so the growing terminals of all weeds are sprayed. Use low pressure (about 20 to 40 lbs. per square inch). Do not use boom jet nozzles.

**AIRPLANE APPLICATION:** Butoxone has been successfully applied by airplane using 5 gallons of total solution per acre. The height of application should insure thorough coverage of the tops of the weeds. Best control has resulted from airplane applications with coarse spray when Cocklebur is at least crop high. Airplane application is not recommended in the vicinity of susceptible crops, such as cotton, tomatoes, and tobacco.

### SOYBEANS—TOPICAL (OVERHEAD) APPLICATIONS

Apply from 7 to 10 days before soybeans bloom through mid-bloom. A good indication that the beans are about to bloom is when the soybean plants have turned a dark green color. If application is made 7 to 10 days before bloom, apply 1 gallon of Butoxone per 10 acres; if application is made from early-bloom through mid-bloom, apply 1 gallon of Butoxone per 8 acres. Use sufficient water to obtain adequate coverage. The rates recommended are for the control of Cocklebur. These rates will also stunt or partially control certain other weeds including Annual Morningglory, Velvetleaf, and Jimsonweed. Caution—Do not apply if soybeans are suffering from lack of moisture; do not use on drought stressed beans.

### SOYBEANS—DIRECTED APPLICATIONS

**First Application:** Apply as a directed spray when soybeans are 8 to 12 inches tall and weeds have emerged.

**Second Application:** Apply as a directed spray no later than mid-bloom stage. For best results apply when weeds do not exceed 3 inches in height. Good coverage of the grow-

ing terminals of weeds is essential for effective control. Do not allow spray pattern to contact more than the lower one-third of the soybean plants. Do not apply if soybeans are drought stressed. Use 1 gallon of Butoxone per 8 acres for the control of Cocklebur. For control of weeds such as Annual Morningglory, Velvetleaf, Jimsonweed, Coffee-weed, Common Ragweed, and Lambsquarters, use 1 gallon of Butoxone per 4 1/2 acres. Do not apply more than two applications per season. Precise application is essential to prevent damage to the crop. In order to maintain the correct spraying height, nozzles must be mounted on oiling shoes, skid shoes, or on cultivators with gauge wheels. Do not use booms with drop nozzles.

### GENERAL CAUTIONS: SOYBEANS

While some temporary twisting of soybean plants may follow an application, this will have little or no permanent effect on the crop. Applications made under adverse growing conditions, such as periods of drought, will result in injury to the beans; under such conditions, the crop should not be sprayed. Do not spray Butoxone on soybeans showing a general infestation of Phytophthora. Do not apply more than the recommended amount. For information on sprayer calibration, consult your County Agent or dealer. Do not harvest soybeans within 60 days after application.

### DIRECTED BAND APPLICATIONS OF MIXTURES OF BUTOXONE AND LOROX 50W\*

For control of Cocklebur, Morningglory, Sesbania, Velvetleaf, Lambsquarters, Prickly Sida (teaweed), Jimsonweed, Ragweed, and Crabgrass (2 leaf), apply 1 pint of Butoxone plus 1 pound LoroX per broadcast acre (equivalent to 0.22 pounds active 2,4-DB and 1/2 pound linuron active per acre). Use a proportional amount of the two chemicals on the band (for example, on a 12 inch band in 36 inch rows use 1/2 pint of Butoxone and 1/2 lb. of LoroX per acre). Use an 8002 T-Jet (or equivalent) or larger with a minimum of 25 gals. per broadcast acre and spray pressure of 20 to 25 psi, to avoid spray drift. For each 25 gals. of spray mixture a pint of surfactant such as Surfactant WK may be added. Continuous agitation in the spray tank is required to keep the material in suspension. Agitate by mechanical or hydraulic means; if by-pass or return line is used, it should terminate at the bottom of the tank to minimize foaming. Openings in nozzle screens should be equal to or larger than 50 mesh.

Apply directed spray when beans are at least 8 inches tall and when weeds do not exceed 2 inches in height. Direct spray to cover weed foliage with minimum contact of the soybean plant; do not spray higher than 3 inches on the soybean stem or crop injury may result. Apply with sprayer nozzles mounted on skid shoes, oiling shoes, or on cultivators with gauge wheels. Do not mount on booms with drop nozzles or on cultivators without gauge wheels. If a new flush of weeds occur after initial treatment, make a second application but do not apply within 60 days of harvest or make more than 2 applications per growing season. Do not allow spray or spray drift to contact growing terminals of beans, as excessive crop injury will result. Do not feed soybean forage or hay to livestock from fields treated with this mixture. Harvested soybeans may be used for feed or oil purposes.

**NOTE:** Do not use on sands, loamy sands, gravelly soils, or on exposed sub-soils. Do not use on soils containing less than 1/2% organic matter as crop injury may result. Observe all cautions and limitations on labeling of all products used in mixtures.

\*LoroX 50W—registered trademark of E. I. DuPont de Nemours & Co. (Inc.)

### Do NOT Store with Foodstuffs—Keep from Freezing If Allowed to Freeze, Remix Before Using

Local conditions may affect the use of this chemical. Consult State Agricultural Experiment Station or Extension Service weed specialists for specific recommendations as to dosage and time of application and for control of other weeds.

A method of weed control in crop areas is covered by U. S. Patent 2,863,754, under which this Company is authorized to extend licenses to others at a royalty rate equal to Ten Cents per pound of active ingredient used. This royalty is included in the price of the product sold under this label. A license to practice the invention with material from any source at the same rate of royalty may be acquired upon written request of the Company.

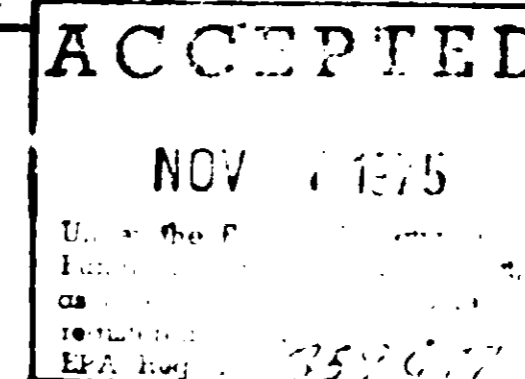
Follow directions carefully. Timing and method of application, weather and crop conditions, mixtures with other chemicals not specifically recommended, and other influencing factors in the use of this product are beyond the control of the seller. Buyer assumes all risks of use, storage, or handling of this material not in strict accordance with directions given herewith.

EPA Reg. NO. 359-677

EPA Est. 359-MO-1

PL-0975

Manufactured by  
**RHODIA INC.**  
AGRICULTURAL DIVISION  
SOMERSET, NEW JERSEY



LOT NO.