264-836

5/16/2005

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

NOTICE OF PESTICIDE:

(under FIFRA, as amended)

EPA Reg.

264-836

ite of Issuance

MAY 16 2005

Term of Issuance:

Conditional

Name of Pesticide Product:

Betamix B 0.75x Herbicide

Name and Address of Registrant (include ZIP Code):

Bayer CropScience

2 T.W. Alexander Drive

Research Triangle Park, NC 27709

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

- 1. Submit and/or cite all data required for registration/reregistration of your product when the Agency requires all registrants of similar products to submit such data.
 - 2. Submit the following data to EPA by the dates specified below:
 - a. A one year storage stability (guideline 830.6317) and corrosion characteristics (guideline 830.6320) must be submitted by May 15, 2006. For the storage stability study, it is recommended that samples be analyzed at 0, 3, 6, 9, and 12 months.
 - 3. Make the following changes to the label:
 - a. Change the registration number to 264-836.
 - b. In the "General Precautions and Restrictions" section, change "Do not exceed a total of 8 pints betamix B 0.75x Herbicide per acre per season." to "Do not exceed a total of 1 lb ai phenmedipham or 1 lb ai desmedipham (8 pints betamix B 0.75x Herbicide) per acre per season."
 - c. In the directions for use, add the spray drift advisory statements (enclosed).

Signature of Approving Official:	Date:
in anth	5-16-05

EPA Form 8570-6

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

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

If you have any questions about this letter, please contact Tobi Colvin-Snyder at 703-305-7801.

Jim Tompkins Product Manager (25) Herbicide Branch Registration Division (7505C)

AERIAL SPRAY DRIFT ADVISORY STATEMENTS TO ADD TO LABELS WITH AERIAL APPLICATION:

Avoiding spray drift at the application site is the responsibility of the applicator. The interaction of many equipment and weather related factors determine the potential for spray drift. The applicator and the grower are responsible for considering all these factors when making decisions.

The following drift management requirements must be followed to avoid off-target drift movement from aerial applications to agricultural crops.

- 1. The distance of the outer most nozzles on the boom must not exceed 3/4 the length of the wingspan or rotor.
- 2. Nozzles must always point backward parallel with the air stream and never be pointed downwards more than 45 degrees.

Where states have more stringent regulations, they shall be observed.

The applicator should be familiar with and take into account the information covered in the Aerial Drift Reduction Advisory Information.

INFORMATION ON DROPLET SIZE

The most effective way to reduce drift potential is to apply large droplets. The best drift management strategy is to apply the largest droplets that provide sufficient coverage and control. Applying larger droplets reduces drift potential, but will not prevent drift if applications are made improperly, or under unfavorable environmental conditions (see Wind, Temperature and Humidity, and Temperature Inversions).

CONTROLLING DROPLET SIZE

- Volume Use high flow rate nozzles to apply the highest practical spray volume. Nozzles with higher rated flows produce larger droplets.
- Pressure Do not exceed the nozzle manufacturer's recommended pressures. For many nozzle types lower pressure produces larger droplets. When higher flow rates are needed, use higher flow rate nozzles instead of increasing pressure.
- Number of nozzles Use the minimum number of nozzles that provide uniform coverage.
- Nozzle Orientation Orienting nozzles so that the spray is released parallel to the airstream produces larger droplets than other orientations and is the recommended practice. Significant deflection from horizontal will reduce droplet size and increase drift potential.
- Nozzle Type Use a nozzle type that is designed for the intended application. With most nozzle types, narrower spray angles produce larger droplets. Consider using low-drift nozzles. Solid stream nozzles oriented straight back produce the largest droplets and the lowest drift.

BOOM LENGTH

For some use patterns, reducing the effective boom length to less than 3/4 of the wingspan or rotor length may further reduce drift without reducing swath width.

APPLICATION HEIGHT

Applications should not be made at a height greater than 10 feet above the top of the largest plants unless a greater height is required for aircraft safety. Making

applications at the lowest height that is safe reduces exposure of droplets to evaporation and wind.

SWATH ADJUSTMENT

When applications are made with a crosswind, the swath will be displaced downwind. Therefore, on the up and downwind edges of the field, the applicator must compensate for this displacement by adjusting the path of the aircraft upwind. Swath adjustment distance should increase, with increasing drift potential (higher wind, smaller drops, etc.)

WIND

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Drift potential is lowest between wind speeds of 2-10 mph. However, many factors, including droplet size and equipment type determine drift potential at any given speed. Application should be avoided below 2 mph due to variable wind direction and high inversion potential. NOTE: Local terrain can influence wind patterns. Every applicator should be familiar with local wind patterns and how they affect spray drift.

TEMPERATURE AND HUMIDITY

When making applications in low relative humidity, set up equipment to produce larger droplets to compensate for evaporation. Droplet evaporation is most severe when conditions are both hot and dry.

TEMPERATURE INVERSIONS

Applications should not occur during a temperature inversion because drift potential is high. Temperature inversions restrict vertical air mixing, which causes small suspended droplets to remain in a concentrated cloud. This cloud can move in unpredictable directions due to the light variable winds common during inversions. Temperature inversions are characterized by increasing temperatures with altitude and are common on nights with limited cloud cover and light to no wind. They begin to form as the sun sets and often continue into the morning. Their presence can be indicated by ground fog; however, if fog is not present, inversions can also be identified 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.

SENSITIVE AREAS

The pesticide should only be applied when the potential for drift to adjacent sensitive areas (e.g. residential areas, bodies of water, known habitat for threatened or endangered species, non-target crops) is minimal (e.g. when wind is blowing away from the sensitive areas).

Betamix® β 0.75x Herbicide

FOR AGRICULTURAL USE ONLY

ACTIVE INGREDIENT: Phenmedipham*		11.5.0%
Desmedipham**		
INERT INGREDIENTS***		
Contains 1.0 lb phenmedipham per gallon plus 1.0 lb desmedipham per gallon.	TOTAL	100.0%

^{* 3-}methoxycarbonylaminophenyl-3-methylcarbanilate

EPA File Symbol: 264-IGA

EPA Est. No.: xxx

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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.)

For <u>MEDICAL</u> And <u>TRANSPORTATION</u> Emergencies <u>ONLY</u> Call 24 Hours A Day 1-800-334-7577

For PRODUCT USE Information Call 1-866-99BAYER (1-866-992-2937)

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 SWALLOWED:	Immediately call a poison control center or doctor for treatment advice.
	Do not induce vomiting unless told to do so by a poison control center or doctor.
	Do not give any liquid to the person.
	Do not give anything by mouth to an unconscious person.
IF ON SKIN:	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.

For MEDICAL Emergencies Call 24 Hours A Day 1-800-334-7577.

Have the product container or label with you when calling a poison control center or doctor or going for treatment.

NOTE TO PHYSICIAN: May pose an aspiration pneumonia hazard. Contains petroleum distillate.

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS WARNING

Contains Petroleum Distillate. Causes substantial but temporary eye injury. Avoid contact with skin or clothing. Do not get in eyes or on clothing. Wear protective eyewear (goggles, face shield, or safety glasses). Wear long-sleeved shirt and long pants, socks, shoes, and chemical-resistant gloves such as Natural Rubber ≥ 14 mils (includes natural rubber blends and laminates).

PERSONAL PROTECTIVE EQUIPMENT

ome materials that are chemical-resistant to this product are listed below. If you want more options instructions for category A on an EPA chemical resistance category selection chart.

Under the Federal Insecticide, Fundicide, and Redentieide Act as amended, for the peaticide registered under EPA Reg. No. 264-836

^{**} Ethyl m-hydroxycarbanilate carbanilate (ester)

^{***} Contains Petroleum distillates

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Applicators and Other handlers must wear.

- · Long-sleeved shirt and long pants
- Chemical-resistant gloves such as Natural Rubber ≥ 14 mils (includes natural rubber blends and laminates)
- Shoes plus socks
 - Protective eyewear (such as goggles, face shield, or safety glasses)

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.

USER SAFETY RECOMMENDATIONS

Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum or using tobacco.

Remove and wash contaminated clothing before reuse.

Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.

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.

ENGINEERING CONTROLS STATEMENT

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.

ENVIRONMENTAL HAZARDS

This pesticide is toxic to fish and aquatic organisms. Do not apply directly to water, or to areas where surface water is present, or to intertidal areas below the mean high water mark. Drift and runoff from treated areas may be hazardous to fish and aquatic organisms in adjacent aquatic sites. Do not contaminate water when cleaning equipment or disposing of equipment washwaters.

PHYSICAL OR CHEMICAL HAZARDS

COMBUSTIBLE: DO NOT USE OR STORE NEAR HEAT OR OPEN FLAME.

STORAGE AND DISPOSAL

Jo not contaminate water, food, or feed by storage and disposal.

PESTICIDE STORAGE: Store in original container and keep closed. Store in a cool, dry place. Do not use or store near heat or open flame.

PESTICIDE DISPOSAL: Pesticide wastes are toxic. Improper disposal of excess pesticide, spray mixture, or rinsate is a violation of Federal law. If these wastes cannot be disposed of by use according to label instructions, contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

When packaged in Plastic containers:

Container Disposal: Triple rinse (or equivalent), then offer for recycling or reconditioning; or puncture and dispose of in a sanitary landfill; or by other procedures approved by State and local authorities.

DO NOT REUSE THIS CONTAINER.

DESTROY WHEN EMPTY.

[These statements are deleted when SVR packaging is used.]

When packaged in SVR containers:

ECHO SYSTEM® SVR Return Procedure: Return the ECHO SYSTEM SVR container clean (outside only) and empty to the place of business from which the Betamix® β 0.75x Herbicide was purchased.

This ECHO SYSTEM SVR container is the sole property of Bayer CropScience.

DIRECTIONS FOR USE

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

Read the entire Directions for Use 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 nesticides. It contains requirements for training, decontamination, notification, and emergency assistance. It also contains specific structions 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 24 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
- Chemical-resistant gloves such as Natural Rubber > 14 mils (includes natural rubber blends and laminates)
- Shoes plus socks
- Protective evewear (such as goggles, face shield, or safety glasses)

GENERAL INFORMATION

When used as directed, Betamix® β 0.75x Herbicide is selective against weeds in sugar beets. Follow label directions carefully to avoid severe injury to sugar beets. For best results, spray weeds in the cotyledon stage which are actively growing and are not under water or heat stress. Betamix® β 0.75x will control the following weeds:

Annual sowthistle	Sonchus oleraceus
Black nightshade	Solanum nigrum
Coast fiddleneck	Amsinckia intermedia
Common chickweed	. Stellaria media
Common lambsquarters	. Chenopodium album
Common ragweed	. Ambrosia artemisiifolia
Green foxtail	. Setaria viridis
Groundcherry	. Physalis lanceifolia
эiry nightshade	. Solanum sarrachoides
Nochia	. Kochia scoparia
London rocket	. Sisymbrium irio
Nettieleaf goosefoot	. Chenopodium murale
Yellow foxtail (pigeon grass)	. Setaria glauca
Prostrate pigweed*	. Amaranthus gracizans
Pursiane	. Portulaca oleraceus
Redroot pigweed*	. Amaranthus retroflexus
Shepherdspurse	. Capsella bursa-pastoris
Wild buckwheat	Polygonum convolvulus
Wild mustard	Brassica kaber

*Redroot pigweed and prostrate pigweed control will be improved with a tank mix of Betamix® β 0.75x and Betanex® Herbicide in Eastern North Dakota and Minnesota (see Chart 4).

GENERAL PRECAUTIONS AND RESTRICTIONS

DO NOT APPLY BETAMIX® β 0.75x HERBICIDE TO SUGAR BEETS LATER THAN 75 DAYS PRIOR TO HARVEST.

DO NOT EXCEED A TOTAL OF 8 PINTS BETAMIX® β 0.75x HERBICIDE PER ACRE PER SEASON.

DO NOT APPLY THIS PRODUCT THROUGH ANY TYPE OF IRRIGATION SYSTEM.

DO NOT ROTATE WITH CEREAL GRAIN CROPS FOR 120 DAYS FOLLOWING POSTEMERGENCE APPLICATION OF BETAMIX® β 0.75x HERBICIDE.

BETAMIX® β 0.75x HERBICIDE MAY CAUSE BEET INJURY IF THE CROP IS UNDER STRESS FROM ONE OR MORE OF THE FOLLOWING CONDITIONS:

Rapid climatic changes from cool, overcast days, to hot (80°F or over) bright days. When the air temperature is, or is likely to be, above 80°F on the day of spraying, application should be made in the late afternoon when the temperature is decreasing.

- Frost within 3 days prior to application or 7 days following treatment could cause beet injury.
- · Windy conditions or drought

8 7 12

- Use of a preplant or preemergence herbicide or other chemicals
- Insect or disease injury
- Close cultivation

If stress conditions are present, delay application in order to give plants a chance to recover.

MPORTANT: Betamix® β 0.75x Herbicide may cause temporary growth retardation and/or chlorosis or tipburn on sugar beets. Sugar beets usually resume normal growth within 10 days.

DO NOT OVERTREAT:

The use of higher than recommended rates may cause beet injury and/or carry over problems when tank mixed with Nortron® SC Herbicide.

Do not spray while dew is present.

Rainfall or sprinkler irrigation within 6 hours of spraying may reduce weed kill.

Do not allow spray drift to contact adjacent crops which may be injured by spray drift.

MIXING THE SPRAY:

Make sure the sprayer is CLEAN.

Betamix® β 0.75x emulsifiable concentrate formulation contains sufficient wetting agents for optimum coverage. Do not add additional wetting agents or other spray adjuvants except as specified for "Micro-Rate Applications". Add sufficient water to fill the lines. Then add the desired amount of Betamix® β 0.75x Herbicide and the remaining quantity of water with the bypass agitator running. Bypass agitation is sufficient. Mechanical agitation is not necessary. Only use freshly prepared spray emulsions.

Always spray immediately after preparing the spray solution. Prepare only enough spray solution to last less than four hours.

APPLICATION INSTRUCTIONS

MULTIPLE (LOW RATE) APPLICATIONS:

Multiple (low rate) applications of Betamix® β 0.75x Herbicide may be applied by air or ground to sugar beets to control early germinating weeds. The first application must be applied when the earliest emerging weeds have reached cotyledon size. See Chart 1 for broadcast rates. For broadcast applications with ground equipment, apply in 10 to 20 gallons of water per acre. Use 5 to 15 gallons of water per acre with aerial application. See Chart 2 for equivalent band rates. Any weeds which are not completely controlled by the first treatment will usually be checked and controlled by repeat applications. The repeat application should be made 5 to 7 days after repreceding application or when another flush of weeds germinates. If the second application is delayed, conventional treatment as described below will be necessary.

To avoid excessive phytotoxicity to fall-planted sugar beets south of the Tehachapi Mountains in California when temperatures are above 85°F, apply Betamix® β 0.75x Herbicide at the rate of 0.67 pint per acre (broadcast equivalent). Evening applications are recommended.

Betamix® β 0.75x Herbicide applied postemergence in a tank mix with Nortron® SC Herbicide (see Chart 3) broadens and enhances the control of troublesome weeds, in addition, provides control of Ladysthumb (*Polygonum persicaria*), Pennsylvania smartweed (*Polygonum pennsylvanicum*), Annual bluegrass (*Poa annua*) and Canarygrass (*Phalaris canariensis*).

For further information, contact your County Agricultural Agent, Farm Advisor, or Bayer CropScience.

CHART 1 DOSAGE CHART FOR MULTIPLE (LOW RATE) BROADCAST APPLICATIONS

	Pints/	Acre Broadcast		
Weed Stage*	BETAMIX® β 0.75x ALONE	BETAMIX®	3 0.75x +	NORTRON® SC
Cotyledon	1.0 – 2.0	1.0	+	0.25
2 leaf	1.3 – 2.0	1.3	+	0.33
4 leaf	2.0 – 3.0	2.0	+	0.5

^{*}Applications should begin at the cotyledon stage of the weeds.

^{*}Higher dosage rates could be required, depending on the advancement of the weed stage.

^{*}Do not exceed 1.0 pt./acre when sugarbeets are at the cotyledon stage.

^{*}Early two true-leaf sugar beets tend to be the most susceptible to phytotoxicity.

CHART 2 BETAMIX® β 0.75x HERBICIDE DOSAGE CHART FOR BAND APPLICATION

Broadcast Equivalent	Band Width	Band Rate - Row Spacing (fluid ounces)			
		22"	24"	28"	30"
1.0 pints/acre	5"	3.7	3.3	2.8	2.7
	7"	5.1_	4.7	4.0	3.7
1.33 pints/acre	5"	4.8	4.4	3.7	3.5
		6.8	6.1	5.3	5.0
2.0 pints/acre	5"	7.2	6.7	5.7	5.3
	7"	10.1	9.3	8.0_	7.5_
3.0 pints/acre	5"	10.9	10.0	8.5	8.0
·	7"	15.2	14.0	12.0	11.2
4.0 pints/acre	5"	14.5	13.3	11.3	10.7
·	7"	20.3	18.7	16.0	15.0
5.0 pints/acre	5"	18.1	16.7	14.3	13.3
-	7"	25.5	23.3	20.0	18.7

CHART 3 NORTRON® SC DOSAGE CHART FOR MULTIPLE (LOW RATE) BAND APPLICATIONS

		Band Rate - Row Spacing (fluid ounces)			
Broadcast Equivalent	Band Width	22"	24"	28"	30"
0.25 pints/acre	5"	0.9	0.8	0.7	0.7
	7"	1.3	1.2	1.0	0.9
0.33 pints/acre	5"	1.2	1.1	0.9	0.9
	7"	1.7	1.5	1.3	1.2
0.5 pints/acre	5"	1.8	1.7	1.4	1.3
	7"	2.5	2.3_	2.0	1.9

CONVENTIONAL APPLICATIONS

By Ground: Apply Betamix® β 0.75x Herbicide at the rate of 3.0 to 5.0 pints per acre in 20 to 50 gallons of water broadcast basis. For band application, see Dosage Chart 2.

By Air: Apply Betamix® β 0.75x Herbicide at the rate of 3.0 to 5.0 pints per acre using 5 to 15 gallons of spray per acre.

Apply the 3.0 to 5.0-pint rates only to sugar beets past the two true-leaf stage. Use the 5.0-pint rate only on well-established sugar beets which are not under stress. The stage of growth of the weeds is very important for satisfactory control. For best results, spray when the weeds are at the two true-leaf stage or smaller, are actively growing and are not under water or heat stress.

In order to avoid phytotoxic spray drift to nontarget crops during application of Betamix® β 0.75x Herbicide, the following buffer zones should be observed:

DO NOT APPLY WHEN WIND SPEED IS OVER 10 MILES PER HOUR. AVOID APPLICATIONS WHEN CONDITIONS FAVOR RIFT.

REPEAT APPLICATION OF BETAMIX® β 0.75x HERBICIDE: For control of later germinating weeds, make a second application of Betamix® B Herbicide. Use 3.0 to 4.0 pints of Betamix® B. Allow at least 7 days between first and second applications. Apply when sugar beets have at least 4 leaves. For best results, use the higher rate and spray when weeds are at the two true-leaf stage. Apply lower rates when the sugar beets are under stress as explained in the *General Precautions And Restrictions* section.

10 3 12

TANK MIX COMBINATIONS

When tank mixing, read and follow the label for each tank mix product used for precautionary statements, directions for use, weeds controlled, geographic and other restrictions. Use in accordance with the most restrictive of label limitations and precautions. No label dosage should be exceeded. This product cannot be mixed with any product containing a label prohibition against such mixing.

= stamix® β 0.75x Herbicide can be tank mixed with the following broadleaf herbicides for improved broadleaf weed control if application uming is correct for the tank mix products.

HerbicideUse Rate (pt./A)Stinger®*0.25–0.50Betanex®See Chart 4Betanex® βSee Chart 5

Chart 4

Dosage Chart for Tank Mixes of Betamix® β 0.75x Herbicide and Betanex® Herbicide

Equivalent Betamix® β 0.75x Desired Rate (Pints/acre Broadcast)	Betamix® β 0.75x + Betanex® (Pints/acre Broadcast)		
0.75	0.32	+	0.57
0.84	0.43	+	0.63
0.9	0.45	+	0.67
1.0	0.5	+	0.75
1.16	0.59	+	0.88
1.5	0.76	+	1.13
2.2	1.16	+	1.63
3.3	1.67	+	2.50

Chart 5

Dosage Chart for Tank Mixes of Betamix® β 0.75x Herbicide and Betanex® β Herbicide

Equivalent Betamix® β 0.75x Desired Rate (Pints/acre Broadcast)	Betamix® β 0.75x + Betanex® β (Pints/acre Broadcast)		
0.75	0.32	+	0.28
0.84	0.43	+	0.32
0.9	0.45	+	ũ.33
1.0	0.5	+	0.37
1.16	0.59	+	0.44
1.5	0.76	+	0.57
2.2	1.16	+	0.81
3.3	1.76	+	1.25

MICRO-RATE APPLICATIONS (EXCEPT CALIFORNIA)

Multiple Micro-rate applications of Betamix® β 0.75x Herbicide in tank mixtures with reduced rates of UpBeet®, Stinger®, and modified seed oils may be applied by air or ground equipment to sugar beets to control early germinating weeds.

When adding spray adjuvants to Betamix® β 0.75x Herbicide the rate **must not exceed 0.08 lb a.i./A** (see Dosage Chart 6 below) when sugar beets are in the cotyledon to 4-true-leaf stage. When the smallest sugar beet plants in the field are in the 4-true-leaf stage, the rate can be increased to **0.12 lb a.i./A** (see Dosage Chart 6 below). The use of wetting agents or spray adjuvants with conventional rates (0.73 to 1.22 lb a.i./acre) or multiple low rate (0.24 to 0.73 lb a.i./acre) applications of Betamix® β 0.75x is prohibited.

Favorable climatic conditions (good conditions for plant growth and development) are essential for adequate weed control.

^{*}The Betamix® β 0.75x + Stinger® tank mix should be applied when sugar beets are in the two true-leaf stage or larger.

DOSAGE CHART 6 DOSAGE CHART FOR MULTIPLE MICRO-RATE BROADCAST APPLICATIONS

Sugar Beet Stage	Betamix® β 0.75x Herbicide Fluid Ounces/Acre Broadcast
Cotyledon to 4-leaf	5.33 (equivalent to 0.08 lb. ai/A)
4-Leaf*	5.33 – 8.0 (equivalent to 0.08 – 0.12 lb. ai/A)

^{*} Rate can be increased when the smallest sugar beet plants in the field are in the 4-true leaf stage or larger.

Application of Betamix® β 0.75x Herbicide in broadcast applications is strongly recommended. If band applications are used, do not use less than 11-inch bands.

For broadcast applications of Betamix® β 0.75x with selected tank mix partners, apply in 10 to 20 gallons of water per acre for ground application, or 5 to 15 gallons of water per acre for aerial application. Use the minimum rate recommended on the tank mix partner label, or a reduced rate of the tank mix partner(s), at the discretion of the grower or applicator, as permitted under FIFRA. [Minimum label rate for UpBeet® is 0.5 oz/acre; for Stinger®, 4.0 fl oz/acre.]

Use modified seed oils at a finished spray concentration of 1.5% v/v or a minimum of 1 pt/acre. A minimum of three sequential applications should be used. Accurate timing is essential; make initial application immediately after weeds emerge, and make repeat applications on 5- to 7-day intervals. If weed control is not adequate due to climatic conditions, spray coverage or other factors, return to multiple (low rate) applications.

Betamix® β 0.75x Herbicide can be mixed with UpBeet®, Stinger®, and modified seed oils for use on sugar beets in accordance with the most restrictive label limitations and precautions. No label dosage rates should be exceeded. Betamix® β 0.75x Herbicide cannot be mixed with any product containing a label prohibition against such mixing.

Fungicides or insecticides can be tank mixed with Betamix® β 0.75x plus UpBeet® plus Stinger® plus methylated seed oils, however, do not combine both fungicides and insecticides with micro-rate mixtures.

MIXING INSTRUCTIONS FOR MICRO-RATE MULTIPLE APPLICATIONS OF BETAMIX® β 0.75x HERBICIDE

- Start with a clean spray tank.
- 2. Fill spray tank with one-third of the total amount of clean water needed for application and start gentle agitation.
- Slurry UpBeet® in water before adding to spray tank, then add slurried UpBeet® to spray tank.
- 4. Fill spray tank to two-thirds of the total amount of clean water needed for the application.
- 5. Add Betamix® β 0.75x Herbicide followed by Stinger®, then modified seed oil.
- Add remaining amount of water while continuing gentle agitation. Spray immediately. Spray mixture should not remain in spray tank overnight.

USE PRECAUTIONS FOR MICRO-RATE APPLICATIONS

Not all weeds will be adequately controlled, even with favorable climatic conditions. Micro-rate applications of Betamix® β 0.75x mixed with UpBeet® and Stinger® will not control ALS-resistant kochia. Multiple low rates of Betamix® β 0.75x and/or hand labor may be required if multiple micro-rate applications do not adequately control weeds.

Modified seed oils must not be added if the Betamix® β 0.75x rates exceed the rates listed in Dosage Chart 6 above, as the addition of modified seed oils could increase the possibility of crop injury at dosage rates greater than those listed in Dosage Chart 6.

Multiple micro-rate applications may injure sugar beets if climatic conditions rapidly change from cool, wet, overcast days to bright sunny days. Plugging of spray nozzles may be encountered due to the potential formation of a precipitate in the spray solution that is often associated with micro-rate applications. To minimize potential formation of precipitate, start with a clean spray system, use warm spray water for mixing, completely empty spray solution from each tank load, flush tank and lines between loads with fresh water, never leave diluted spray solution in tank overnight, and/or add ammonia (2% household) at 1% v/v or a basic blend additive (as referenced in the most recent North Dakota State University Weed Control Guide) at 1% v/v. DO NOT apply micro-rate treatments when conditions are favorable for drift to nontarget species.

12 8 12

IMPORTANT: READ BEFORE USE

Read the entire Directions for Use, Conditions, Disclaimer of Warranties and Limitations of Liability before using this product. If terms are not acceptable, return the unopened product container at once.

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etamix β 0.75x Herbicide (PENDING) Submitted 09/14/04; Resubmitted on 11/23/04.