# (Label main area front panel)





# DEBUT<sup>®</sup> MAPP 07804

A water-dispersible granule formulation containing 50% w/w triflusulfuron methyl, a sulfonylurea, for the control of broad-leaved weeds in sugar beet and fodder beet.

The (COSHH) Control of Substances Hazardous to Health Regulations may apply to the use of this product at work.

#### **SAFETY PRECAUTIONS**

#### **Operator protection**

WASH CONCENTRATE from skin or eyes immediately
DO NOT BREATHE SPRAY
WASH HANDS AND EXPOSED SKIN before meals and after work

## **Environmental protection**

DO NOT CONTAMINATE SURFACE WATERS OR DITCHES with chemical or used container To protect aquatic organisms respect an unsprayed buffer zone to surface water bodies in line with LERAP requirements.

DO NOT ALLOW DIRECT SPRAY from horizontal boom sprayers to fall within 5m of the top of the bank of a static or flowing waterbody, unless a Local Environmental Risk Assessment for



Pesticides (LERAP) permits a narrower buffer zone, or within 1m of the top of a ditch which is dry at the time of application. DO NOT ALLOW DIRECT SPRAY from hand-held sprayers to fall within 1 m of the top of a bank of a static or flowing waterbody. Aim spray away from water.

This product qualifies for inclusion within the Local Environmental Risk Assessment for Pesticides (LERAP) scheme. Before each spraying operation from a horizontal boom sprayer, either a LERAP must be carried out in

accordance with CRD's published guidance or the statutory buffer zone must be maintained. The results of the LERAP must be recorded and kept available for three years.

# Storage and disposal

KEEP IN ORIGINAL CONTAINER, tightly closed, in a safe place EMPTY CONTAINER COMPLETELY and dispose of safely

Approval holder and marketing company:

Du Pont (UK) Limited, Crop Protection Products,4<sup>th</sup> Floor, Kings Court, London Road Stevenage, Herts. SG1 2NG

Tel: 01438 734450 or enquiry.agproducts@dupont.com

Emergency Tel: 0870 820 0418

National Poison Centre: 111 (England and Wales) or 08454 24 24 24 (Scotland)



# This label is compliant with the CPA Voluntary Initiative Guidance

<sup>®</sup>Trademark of E. I. du Pont de Nemours and Company

Contents: X litres **e**Batch No XXX
Manufactured in the E.U.

**Risk and Safety Information** 

Debut®

Herbicide

Contains 50% triflusulfuron-methyl

#### WARNING



# Very toxic to aquatic life with long lasting effects Suspected of causing cancer

Collect spillage.

Dispose of contents / container to a licensed hazardous-waste disposal contractor or collection site except for empty clean containers which can be disposed of as non-hazardous waste.

Do not contaminate water with the product or its container (Do not clean application equipment near surface water/Avoid contamination via drains from farmyards and roads).

To avoid risks to human health and the environment, comply with the instructions for use

# **IMPORTANT INFORMATION**

Field of Use: FOR USE ONLY AS A PROFESSIONAL HERBICIDE

Crops: Sugar beet and Fodder beet

Maximum individual dose: 30 g product/ha

Maximum number of treatments: 4 per crop

Latest time of application: Before the leaves of the crop meet between the rows

READ THE LABEL BEFORE USE. USING THIS PRODUCT IN A MANNER THAT IS INCONSISTENT WITH THE LABEL MAY BE AN OFFENCE. FOLLOW THE CODE OF PRACTICE FOR USING PLANT PROTECTION PRODUCTS.



# **DIRECTIONS FOR USE**

IMPORTANT: This information is approved as part of the Product Label. All instructions within this section must be read carefully in order to obtain safe and successful use of this product.

#### Restrictions

- DEBUT must not be applied to any crop suffering from stress as a result of drought, waterlogging, low temperatures, pest or disease attack, nutrient or lime deficiency or other factors reducing crop growth.
- Due to the high level of activity of the herbicide, special care must be taken to avoid damage by drift onto plants outside the target area, or onto surface waters or ditches. Thorough cleansing of equipment is also very important see below.
- Following Crops After applying DEBUT to a beet crop, only winter cereals should be sown in the same calendar year. Any crop may be sown or planted in the following spring (next calendar year) after a beet crop treated with DEBUT.
- Crop Failure In the event of crop failure for any reason, sow only spring barley, linseed or beet within four months of application of DEBUT, provided this agrees with the recommendations of any partner product. After four months from application, refer to "Following Crops" section.
- Do not use on crops grown for seed

#### **Weed Control**

DEBUT works mainly by foliar action. Tank-mixed with a herbicide partner it controls a wide range of broad-leaved weeds. It is most effective if applied when the weeds are small and actively growing. Good spray cover of weeds must be obtained. Susceptible plants cease growth almost immediately after application and symptoms can be seen about 5 to 10 days after application. Best results are achieved when DEBUT plus approved tank-mix partner are applied in a programme of up to four sequential sprays. It is important to identify the weeds occurring in the crop and refer to the weed table to ensure that the weeds present are those susceptible to DEBUT plus appropriate tank-mix partner.

The susceptibility ratings of weeds in the following table refer to good spray cover and good growing conditions, with weed size of up to 2 true leaves.

Weed Species	DEBUT + 1.1 L/ha phenmedipham(1)	DEBUT + 1.1 L/ha phenmedipham(1) + 0.5 kg/ha metamitron(2)
Black-bindweed	S	S
Charlock	S	S
Chickweed	S	S
Cleavers	S	S
Fat-hen	S	S
Field Pansy	MS*	S
Fool's Parsley	S	S
Fumitory	S	S
Knotgrass	S	S
Mayweed, Scentless	S	S
Red Dead-nettle	S	S
Redshank	S	S

Small Nettle	S	S
Volunteer Oilseed Rape	S	S

S = Fully susceptible MS = Moderately susceptible

- (1) Containing 160g/l phenmedipham
- (2) Containing 700 g/kg metamitron

#### Dose

Apply DEBUT at 30 g/ha in tank-mix with suitable herbicide tank-mix partner(s).

#### Crops

DEBUT can be used on all varieties of sugar beet and fodder beet at the growth stages given below

#### **Timing**

DEBUT can be applied from the early cotyledon stage of sugar beet or fodder beet as part of a planned programme. The first application should be made when the first weeds have emerged. Subsequent applications should be made every 7 - 14 days when new flushes of weeds are at or just past the cotyledon stage.

## Resistance

DEBUT contains triflusulfuron methyl, a sulfonylurea, which is an ALS inhibitor. Do not apply DEBUT in sequence or in tank-mixture with any other product containing ALS herbicides.

When herbicides with the same mode of action are used repeatedly over several years in the same field, selection of resistant biotypes can take place. These can propagate and may become dominating. A weed species is considered resistant to a herbicide if it survives a correctly applied treatment at the recommended dose. Development of resistance with a weed species can be avoided or delayed by alternating (or tank mixing) with suitable products having a different mode of action.

# **Volume and Application**

BEFORE USING DEBUT, SPRAYING EQUIPMENT MUST BE CLEAN AND FREE FROM CONTAMINATION WITH OTHER PESTICIDES.

# **OVERALL APPLICATION**

DEBUT should be applied overall in 80 - 150 litres of water per hectare, using suitable equipment to give a FINE spray, as defined by BCPC. Good, even spray cover of the weeds is essential for best results. Care should be taken not to overlap spray swaths.

# **BAND APPLICATION**

Similar doses, water volumes and spray quality should be used as in overall application, but the area covered will be dependent upon the row spacing and band width. Careful calibration is essential to achieve best results.

#### **Mixing**

DEBUT mixes easily with water, but the following mixing procedure should be followed: Quarter fill the spray tank with water, start the agitation and add the required quantity of DEBUT directly to the tank or via an induction bowl when fitted, without prior creaming. Continue agitation while topping up the tank and while spraying. Use the tank the same day

<sup>\*</sup> For the control of field pansy, increase the dose rate of phenmedipham to 2l/ha

as mixing. For mixing instructions with phenmedipham as a tank-mix partner, see Compatibility Section.

#### Weather

Avoid high light intensity (full sunlight) and high temperatures (above 21°C) on the day of spraying. Avoid periods of substantial day to night temperature changes or when frost is expected.

## Compatibility

Products should only be tank-mixed if each product can be applied within the label recommendations for its use. For further information contact your DuPont distributor.

Add DEBUT to the spray tank first and ensure it is fully dispersed before adding the partner product(s). If a partner product contains phenmedipham, follow the manufacturer's recommendations for mixing that product before adding DEBUT.

To widen the spectrum of activity, DEBUT should be tank-mixed with other herbicides. DEBUT can be tank-mixed with VENZAR FLOWABLE, approved formulations of phenmedipham or metamitron. Products should only be tank-mixed if each product can be applied within the manufacturer's label recommendation for its use.

When DEBUT tank-mixes are used in sequence with graminicides, the minimum time interval should be observed between applications in accordance with the manufacturer's recommendations.

## **WARNING**

EXTREME CARE SHOULD BE TAKEN TO AVOID DAMAGE BY DRIFT TO BROAD-LEAVED PLANTS OUTSIDE THE TARGET AREA OR ONTO PONDS, WATERWAYS OR DITCHES OR LAND INTENDED FOR CROPPING. SPRAYING EQUIPMENT SHOULD NOT BE DRAINED OR FLUSHED ONTO LAND PLANTED WITH OR INTENDED FOR PLANTING WITH TREES OR CROPS OTHER THAN SUGAR BEET OR FODDER BEET.

#### Spray tank clean-out

TO AVOID SUBSEQUENT DAMAGE TO CROPS OTHER THAN SUGAR BEET, IMMEDIATELY AFTER SPRAYING DEBUT THOROUGHLY CLEAN ALL SPRAY EQUIPMENT INCLUDING INSIDE AND OUTSIDE OF LID USING ALL CLEAR® EXTRA SPRAYER CLEANER ACCORDING TO THE LABEL INSTRUCTIONS. ALTERNATIVELY USE THE FOLLOWING PROCEDURE:

- 1. Immediately after spraying, drain tank completely. Any contamination on the outside of the spraying equipment should be removed by washing with clean water.
- 2. Rinse inside of tank with clean water and flush through boom and hoses using at least one-tenth of the spray tank volume. Drain tank completely.
- 3. Half fill tank with clean water and add 1/3 litre household ammonia (contains 9.5% ammonia) for each 100 litres of tank volume. (Equivalent amounts of alternate strength ammonia solutions can be used providing the final concentration in the full tank is 0.03%). Agitate and then flush the boom and hoses with the cleaning solution. Top up with water making sure the tank is completely full and allow to stand for 15 minutes with agitation. Again flush the boom and hoses and drain tank completely.

- 4. Nozzles and filters should be removed and cleaned separately with ammonia solution at the same concentration as used for the sprayer.
- 5. Rinse the tank with clean water and flush through the boom and hoses using at least one-tenth of the spray tank volume. Drain tank completely.
- 6. For disposal of washings, follow the 'Code of Practice for Using Plant Protection Products (DEFRA Publications 2006). Do not spray onto sensitive crop or land intended for cropping with sensitive crop.

## NOTE:

- If it is not possible to drain the tank completely, step 3 must be repeated before going on to step 4.
- Follow washout instructions and only use recommended tank-mixtures
- Failure to thoroughly clean your sprayer after use can result in damage to sensitive crops sprayed later.
- DEBUT is non-corrosive to equipment, non-flammable and non-volatile.

# **NOTICE TO BUYER**

All goods supplied by us are of a high grade and we believe them to be suitable for any purpose for which we expressly supply them, but as we cannot exercise control over their mixing or use, all conditions and warranties statutory or otherwise, as to the quality or fitness for any purpose of our goods are excluded and no responsibility will be accepted by us for any damage or injury whatsoever arising from their storage, handling, application or use

<sup>®</sup> DEBUT, ALL CLEAR and VENZAR are registered trademarks of E. I. du Pont de Nemours and Company.

# **Safety Data Sheet**

[insert QR code and wording]

To access the Safety Data Sheet for this product scan the code