

Conversion to Full Registration Evaluation Report for Category B, Subcategory 4.1 Application

Application Number: 2005-0021
Application: Conversion to full registration without consultation
Product: Option 2.25 OD Liquid Herbicide
Registration Number: 27424
Active ingredients (a.i.): Foramsulfuron (FMS)
PMRA Document Number: 1637357

Background

Option Liquid 2.25 OD Herbicide is an end-use product for post-emergent use on field corn in Eastern Canada, containing the registered TGAI foramsulfuron (PCP# 27423). It was first registered June 6, 2003.

Purpose of Application

The purpose of this application is to convert the conditional registration of Option Liquid 2.25 OD Herbicide (PCP# 27424) to full registration. The registrant was required to submit a study on the toxicity of Option 2.25 OD to duckweed, *Lemna gibba*.

Chemistry Assessment

A chemistry assessment was not required for this application.

Health Assessments

A health risk assessment was not required for this application.

Environmental Assessment

For the conversion from conditional to full registration, the PMRA requested that the registrant submit a study on the toxicity of Option 2.25 OD Liquid Herbicide to the aquatic vascular plant *Lemna gibba* (PRD2008-05: *Foramsulfuron Technical Herbicide*). Concerns regarding the risk of Option 2.25 OD Liquid Herbicide to aquatic vascular plants were addressed by the registrant. For Option 2.25 OD Liquid Herbicide, the toxicity was found to be 32.05 µg EP/L and the no observed effect concentration (NOEC) was < 4.27 µg EP/L. This makes aquatic vascular plants the most sensitive aquatic species.

Refer to Regulatory Document PRD2008-05: *Foramsulfuron Technical Herbicide*, for a detailed description of the environmental risk of foramsulfuron and its end-use products on terrestrial and aquatic organisms.

Because the risk of Option 2.25 OD Liquid Herbicide to aquatic vascular plants was unknown in PRD2008-05, a general one-metre buffer zone for aquatic habitats was determined based on toxicity data to other non-target aquatic organisms less sensitive than *Lemna gibba*, with a three-metre buffer zone for the protection of terrestrial habitats.

Based on the new data on the toxicity of Option 2.25 OD to *Lemna gibba*, aquatic buffer zones were calculated for Option 2.25 OD. To reduce exposure of aquatic organisms to Option 2.25 OD Liquid Herbicide, buffer zones of one metre were determined for water bodies of depth less than 1 metre and greater than 1 metre, and a three-metre buffer zone was determined for the protection of terrestrial habitats.

Foramsulfuron end-use products present a risk to terrestrial and aquatic plants. Therefore, mitigative buffer zones have been added to the label.

All of the additional information requirements pertaining to environmental protection have been addressed. A complete evaluation of current scientific data from the applicant has resulted in the determination that, under the proposed conditions of use, the end-use product does not present an unacceptable risk to the environment.

Value Assessment

A value assessment was not required for this application.

Conclusion

The PMRA, under the authority of the *Pest Control Products Act*, has granted full registration for the sale and use of the end-use product Option 2.25 OD Liquid Herbicide to control certain broadleaf and grassy weeds in field corn.

References

4.0 Impact on the Environment

PMRA 1541222 2008, Toxicity of Foramsulfuron + Isoxadifen-Ethyl OD 22.5 + 22.5 g/L F130360 01 1K05 A9) to Duckweed (*Lemna gibba* G3) Under Static Rene EBFSX011, DACO: 9.8, 9.8.5

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