Evaluation Report for Category B, Subcategory 2.3, 2.4 Application

Application Number: 2009-1698
Application: New product chemistry: identity of formulants, proportion of formulants
Product: Cougar 120 EC
Registration Number: 30473
Active ingredients (a.i.): Fenoxaprop-P-ethyl
PMRA Document Number: 2149538

Background

All registered uses of the active ingredient fenoxaprop-P-ethyl were re-evaluated in 2011 and were recently proposed for continued registration (Proposed Re-evaluation Decision PRVD2011-04, *Fenoxaprop-P-ethyl*).

Purpose of Application

The purpose of this application was to register a new end-use product, Cougar 120 EC, for post-emergent control of annual grassy weeds in spring wheat, durum wheat, spring barley and seedling perennial ryegrass grown for seed, based on the precedent product Puma 120 Super (Registration Number 25864).

The precedent product Puma 120 Super was registered in 1999 as a post-emergent herbicide for control of annual grassy weeds in spring wheat, durum wheat, spring barley and certain minor use crops.

Chemistry Assessment

Cougar 120 EC is formulated as an emulsifiable concentrate containing fenoxaprop-P-ethyl at a nominal concentration of 120 g/L. This end-use product has a density of 1.042 g/mL and a pH of 4.76. The chemistry requirements for Cougar 120 EC are complete.

Health Assessment

Cougar 120 EC is of low acute toxicity via the oral and dermal routes of exposure, and was slightly acutely toxic via the inhalation route in rats. It is severely irritating to the eye (reversible within 21 days) and slightly irritating to the skin in rabbits. Cougar 120 EC is not a skin sensitizer in guinea pigs.

The use of Cougar 120 EC should not result in increased occupational or bystander exposure relative to other registered uses of fenoxaprop-P-ethyl. No unacceptable risk is expected when workers follow label directions and wear personal protective equipment as indicated on the label.

As the use directions and restrictions for Cougar 120 EC are similar to those of other registered end-use products containing fenoxaprop-P-ethyl, no increase in the magnitude of residues of fenoxaprop-P-ethyl are expected. Established MRLs are adequate to cover residues of fenoxaprop-P-ethyl. Dietary exposure to fenoxaprop-P-ethyl is not expected to increase and will not pose an unacceptable risk to any segment of the population, including infants, children, adults and seniors.

Environmental Assessment

The use of Cougar 120 EC is not expected to increase the environmental exposure to fenoxaprop-P-ethyl relative to other registered uses of fenoxaprop-P-ethyl. Therefore, the environmental risk of fenoxaprop-P-ethyl is not expected to increase. Risks to terrestrial plants, freshwater algae and amphibians have been identified. To mitigate the risks of Cougar 120 EC, a one-meter buffer zone is required for the protection of terrestrial habitats and shallow freshwater habitats (water depth <1 m) when Cougar 120 EC is applied with field sprayer equipment. When applied aerially, a 25-meter buffer zone is required for the protection of terrestrial habitats, and a one-meter buffer zone is required for the protection of shallow freshwater habitats.

Value Assessment

Data from 18 field research trials conducted in the Prairie Provinces in 2007 were submitted for review. The performance of Cougar 120 EC applied alone or in combination with 2,4-D Ester, Buctril M, Curtail M, or Refine Extra was directly compared to that of the precedent product Puma 120 Super applied alone or in combination with the same tank mix partners.

The submitted data demonstrated that the efficacy of Cougar 120 EC applied alone for control of labeled grass weeds can be expected to be similar to that of Puma 120 Super. The efficacy of Cougar 120 EC applied in labeled tank mixtures for control of a broader spectrum of weeds can also be expected to be similar to that of Puma 120 Super applied in combination with the same tank mix partner products.

Submitted data for crop injury (visually assessed as a percentage relative to the untreated check) and yield indicated that the tolerance of spring wheat, durum wheat and spring barley to an application of Cougar 120 EC alone or in tank mixtures in accordance with the label can be expected to be similar to that following an application of Puma 120 Super, alone or in combination with the same labeled tank mix partner products.

The performance of Cougar 120 EC was, therefore, concluded to be agronomically equivalent to that of Puma 120 Super.

Conclusion

The PMRA conducted an evaluation of the subject application and determined that use of Cougar 120 EC in accordance with the label has value and will not pose unacceptable health or environmental risk.

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