



Evaluation Report for Category B, Subcategory 3.12 Application

Application Number: 2017-1736
Application: Changes to Product Labels-New Site or Host
Product: Beleaf 50SG Insecticide
Registration Number: 29796
Active ingredient (a.i.): Flonicamid
PMRA Document Number : 2951681

Purpose of Application

The purpose of this application was to expand the label of Beleaf 50SG Insecticide to include control of aphids on flax and control of aphids and reduction in numbers of *Lygus* bugs on dried shelled peas.

Chemistry Assessment

A chemistry assessment was not required for this application.

Health Assessments

A toxicology assessment was not required for this application.

The occupational exposure and risk from the addition of the use on flax and dried shelled peas to the Beleaf 50SG label was assessed. No risks of concern are expected from the new use, provided that workers follow the label directions and wear the personal protective equipment identified on the label.

Residue data from field trials conducted in Canada and the United States were submitted to support the domestic use of Beleaf 50SG Insecticide on flax and dried shelled peas. Flonicamid was applied to canola and dry peas at rates equivalent or slightly higher than the proposed rates, and harvested according to label directions. In addition, a processing study in treated canola was reviewed to determine the potential for concentration of residues of flonicamid into processed commodities.

Maximum Residue Limits

The recommendation for maximum residue limits (MRLs) for flonicamid was based upon the submitted field trial data, and the guidance provided in the [OECD MRL Calculator](#). MRLs to cover residues of flonicamid and metabolites TFNA, TFNA-AM and TFNG, expressed as parent equivalents in/on crops and processed commodities are proposed as shown in Table 1. Residues in processed commodities not listed in Table 1 are covered under the proposed MRLs for the raw agricultural commodities (RACs).

TABLE 1. Summary of Field Trial and Processing Data Used to Support Maximum Residue Limit(s) (MRLs)

Commodity	Application Method/ Total Application Rate (g a.i./ha)	PHI (days)	Residues (ppm)		Experimental Processing Factor	Currently Established MRL (ppm)	Recommended MRL (ppm)
			LAF T	HAF T			
Canola	Foliar broadcast/ 293-305	6-8	<0.8	1.044	Flonicamid: 0.09x oil	None	1.5 Flaxseeds
Dry peas	Foliar broadcast/ 295-308	6-8	<0.04	1.065	-	None	3.0 in/on dry lentils, dry field pea and dry pigeon peas

LAF T = Lowest Average Field Trial; HAF T = Highest Average Field Trial

Based on the dietary burden and residue data, MRLs of 0.15 ppm in eggs and 0.07 ppm in meat and meat by-products of poultry to cover residues of flonicamid and metabolites TFNA and TFNA-AM, expressed as parent equivalents, are also proposed.

Following the review of all available data, MRLs as proposed in Table 1 and in poultry matrices are recommended to cover residues of flonicamid. Residues in these crop/livestock commodities at the proposed MRLs will not pose an unacceptable risk to any segment of the population, including infants, children, adults and seniors.

Environmental Assessment

The uses on flax and dried shelled peas are within the registered use pattern of Beleaf 50SG Insecticide, and therefore, no additional risk is expected from these uses. The label includes the required environmental precautions and hazards statements, including the buffer zones information, which adequately mitigates risks to the environment.

Value Assessment

Extrapolation from the registered use pattern of Beleaf 50G Insecticide supported control of aphids on flax, and control of aphids and reduction in numbers of *Lygus* bugs on dried shelled peas. Flonicamid is a new mode of action for these crop pest combinations and will aid in resistance management.

Conclusion

The Pest Management Regulatory Agency has completed an assessment of the information provided, and has found it sufficient to support the expansion of the label of Beleaf 50SG Insecticide to include control of aphids on flax and control of aphids and reduction in numbers in *Lygus* bugs in dried shelled peas.

References

PMRA Document Number	Reference
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1913109	AHETF, 2009. Agricultural Handler Exposure Scenario Monograph: Open Cab Groundboom Application of Liquid Sprays. Report Number AHE1004. December 23, 2009.
2572744	AHETF, 2015. Agricultural Handler Exposure Scenario Monograph: Open Pour Mixing and Loading Dry Flowable Formulations. Report Number AHE1001-1. March 31, 2015.
2748592	2017, Magnitude of Residues of Flonicamid on Dry Peas - Canada in 2016, DACO: 7.1,7.2.1,7.4.1
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