

Evaluation Report for Category B, Subcategory 1.1 Application

Application Number: 2023-2526
Application: Changes to Technical Grade Active Ingredient (TGAI) Product Chemistry-New Source (site) same registrant
Applicant: UPL AgroSolutions Canada Inc.
Product: Sodium Acifluorfen Technical
Registration Number: 23314
Active ingredient (a.i.): Acifluorfen (present as sodium salt)
PMRA Document Number: 3601814

Purpose of Application

The purpose of this application was to register a new source of acifluorfen (present as sodium salt) for Sodium Acifluorfen Technical.

Chemistry Assessment

Common Name: acifluorfen (present as sodium salt)
English IUPAC* Chemical Name: sodium 5-[(2-chloro- α,α,α -trifluoro-p-tolyl)oxy]-2-nitrobenzoate
CAS† Chemical Name: sodium 5-[2-chloro-4-(trifluoromethyl)phenoxy]-2-nitrobenzoate

* International Union of Pure and Applied Chemistry

† Chemical Abstracts Service

Sodium Acifluorfen Technical has the following properties:

Property	Result
Colour and physical state	Light brown liquid
Nominal concentration	42.25%
Odour	Mild, antiseptic odour
Density	1.27 g/mL at 20°C
Vapour pressure	<0.01 mPa at 20°C
pH	8.22 –8.32
Solubility in water	608 g/L

Property	Result
n-Octanol/water partition coefficient	log K_{ow} = 1.19 (pH 5)

The required chemistry data for Sodium Acifluorfen Technical have been provided, reviewed, and found to be acceptable.

Health, Environmental and Value Assessments

Health, environmental and value assessments were not required for this application.

Conclusion

The Pest Management Regulatory Agency has completed an assessment of the information provided, and has found the information acceptable to support the registration of a new source for Sodium Acifluorfen Technical.

References

PMRA

Document

Number	Reference
3472827	2021, The Manufacturing Process of Aqueous Acifluorfen-sodium, DACO: 2.11.1,2.11.2,2.11.3,2.11.4,2.12.1,2.2 CBI
3472829	2018, Preliminary Analyses of Five Representative Production Batches of Acifluorfen Sodium Active Ingredient to Determine % Acifluorfen and to Quantify Its Associated Impurities, DACO: 2.13.1,2.13.2,2.13.3,2.13.4 CBI

© His Majesty the King in Right of Canada, as represented by the Minister of Health Canada, 2024

All rights reserved. No part of this information (publication or product) may be reproduced or transmitted in any form or by any means, electronic, mechanical, photocopying, recording or otherwise, or stored in a retrieval system, without prior written permission of Health Canada, Ottawa, Ontario K1A 0K9.