J. Miller

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

JUN 14 1996

OFFICE OF
PREVENTION, PESTICIDES, AND
TOXIC SUBSTANCES

MEMORANDUM

SUBJECT: PP# 6F04664. Isoxaflutole in/on Field Corn and Animal RACs. **Request for Petition Method Validation.** MRID#s 439048-32 and -33. Chemical 123000. Barcode D226920. CBTS# 17263.

FROM: G.F. Kramer, Ph.D., Chemist
Tolerance Petition Team I
Chemistry Branch I, Tolerance Support
Health Effects Division (7509C)

THRU: E. Zager, Acting Branch Chief
Chemistry Branch I, Tolerance Support
Health Effects Division (7509C)
R. Loranger for

TO: Donald A. Marlow, Chief
Analytical Chemistry Branch
Biological and Economics Analysis Division (7503W)

Rhone-Poulenc Ag Company has proposed permanent tolerances for the preemergent herbicide 5-cyclopropyl-4-isoxazolyl [2-(methylsulfonyl)-4-trifluoromethyl) phenyl] methanone (isoxaflutole, RPA 201772) and its metabolites, 1-(2-methylsulphonyl-4-trifluoromethylphenyl-2-cyano-3-cyclopropyl propane-1,3-dione (RPA 202248) and 2-methylsulphonyl-4-trifluoromethyl benzoic acid (RPA 203328) in/on the raw agricultural commodities as follows:

Field Corn, Grain	--	0.10 ppm	Field Corn, Fodder	--	0.40 ppm
Field Corn, Forage	--	0.40 ppm	Liver*	--	0.20 ppm
Hog, Liver	--	0.04 ppm	Eggs	--	0.05 ppm
Poultry Fat	--	0.05 ppm	Poultry Meat	--	0.05 ppm
Kidney*	--	0.03 ppm	Hog, Kidney	--	0.01 ppm

*of cattle, goat, poultry and sheep

The petitioner has submitted a copy of method EC-95-313 and an Independent Laboratory Validation (ILV) in the following two

volumes which are appended to this memorandum as Attachments 2 & 3:

"Method of Analysis for the Determination of Isoxaflutole (RPA 201772) and Its Metabolites (RPA 203328, RPA 202248, and RPA 205834) in Milk, Eggs, Liver, Kidney, Muscle and Fat Tissues." 12/20/95. RPA. Appendix B of MRID# 439048-32

"Independent Method Validation of the Rhone-Poulenc Methods Entitled, "Method of Analysis for the Determination of ..." 12/22/95. Horizon Labs. MRID# 439048-33

Note that these volumes contain two different methods: a common moiety method for eggs and tissues and a single analyte method for milk. CBTS has conducted a preliminary review of the ILV. Acceptable recoveries were obtained by the laboratory. A summary of the laboratory's findings may be found on page 34-37 of the ILV report.

CBTS requests that ACL review the method for acceptability as a tolerance enforcement method. The ILV should also be reviewed to determine if the method has been adequately validated. If the method and the ILV are satisfactory, CBTS requests that ACL conduct a Petition Method Validation (PMV) on the submitted analytical method.

Samples should be run in duplicate per the experimental design specified in Attachment 1. A validation is requested in milk as a preliminary examination of the cow feeding study indicates that a tolerance will be required for this commodity. Also note that validation of metabolite RPA 203328 is not requested for eggs and tissues as a preliminary examination of the cow feeding and ruminant metabolism studies indicates that this metabolite is not found in significant levels in these commodities. Please complete and return this attachment as part of your report. Also, please include with your report, copies of the standard curves, sample calculations, and representative chromatograms for controls and fortified samples. Any deficiencies in the method, <u>as written</u>, should also be noted and reported. Please comment on the length of time necessary to complete a set of samples.

One of the purposes of conducting a PMV is to determine whether all necessary instructions are included in the submitted method. For this reason, we are requesting that laboratory staff scientists have minimal contact with the petitioner during this PMV. Any problems encountered should be documented and included in your report. The petitioner will be informed of any deficiencies in the method and asked to resolve them.

Please obtain the necessary analytical reference standards from the EPA Repository. If the analytical reference standards of isoxaflutole and its metabolites RPA 202248 and RPA 203328 are not available from the Repository, then please contact the Registration

Specialist at RPA (Karen Shearer, 919-549-2365) directly requesting several hundred milligrams of each standard not available along with the required MSDS be provided directly to ACL to start the PMV. In your final report please note that all standards are or are not available from the Repository as of (date). Also confirm the Repository ordering codes for isoxaflutole and its metabolites RPA 202248 and RPA 203328.

The review is not in expedite status. The Registration Division Product Manager for isoxaflutole is JoAnne Miller. She should be contacted directly concerning the priority for completion of the PMV.

Please address your written reports to: E. Zager, Acting Chief, Chemistry Branch I, Tolerance Support, Health Effects Division (7509C)

Attachment 1- Experimental Design for PMV

Attachment 2- Proposed Enforcement Method, Appendix B of MRID# 439048-32

Attachment 3- ILV, MRID# 439048-33

cc (with Attachment 1 and 2): M. Clower (FDA, HFS-335)
cc (with Attachment 1 only): PP#6F04664, S.F., Kramer, Circ., R.F., H. Hundley (ACB/BEAD), F. Griffith (PAM-II File), J. Miller (PM22/RD)/D. Kenny, B. Madden (RCAB)
RDI: TPT1 (6/11/96), R.A. Loranger for E. Zager (6/12/96).
G.F. Kramer:804V:CM#2:(703)305-5079:7509C:CBTS

METHOD: Method of Analysis for the Determination of Isoxaflutole (RPA 201772) and Its Metabolites (RPA 203328, RPA 202248, and RPA 205834) in Milk, Eggs, Liver, Kidney, Muscle and Fat Tissues. Appendix B of MRID# 439048-32

Please: (i) Indicate the limit of detection and quantitation; (ii) Do not use control values for recovery calculations; and (iii) Do not report control values as zero; if less than the limit of detection, report as such.

Commodity	Chemical Added	ppm Added	ppm Found	Percent Recovery
Milk	Isoxaflutole	0.00		
		0.01		
		0.02		
	RPA 202248	0.00		
		0.01		
		0.02		
	RPA 203328	0.00		
		0.01		
		0.02		
Eggs	Isoxaflutole	0.00		
		0.01		
		0.025		
		0.05		
	RPA 202248	0.00		
		0.01		
		0.025		
		0.05		
Cattle Liver	Isoxaflutole	0.00		
		0.025		
		0.10		
		0.20		
	RPA 202248	0.00		
		0.025		
		0.10		
		0.20		

ATTACHMENT 1

Commodity	Chemical Added	ppm Added	ppm Found	Percent Recovery
Poultry Meat	Isoxaflutole	0.00		
		0.025		
		0.05		
	RPA 202248	0.00		
		0.025		
		0.05		