BMSP/ISB 0366

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

OFFICE OF
PESTICIDES AND TOXIC SUBSTANCES

FEB 19 1986

SUBJECT: PP #5F3260. (RCB #503, 504) Chlorpyrifos in/on legume vegetables (except soybeans). Amendment of 2/10/86. No Accession Number

FROM: Cynthia Deyrup, Ph.D., Chemist
Tolerance Petition Section 2
Residue Chemistry Branch
Hazard Evaluation Division (TS-769)

THRU: John H. Onley, Section Head
Tolerance Petition Section 2
Residue Chemistry Branch
Hazard Evaluation Division (TS-769)

TO: Jay Ellenberger, Product Manager No. 12
Insecticide-Rodenticide Branch
Registration Division (TS-767)

and

Toxicology Branch
Hazard Evaluation Division (TS-769)

Background

Dow Chemical Co. had proposed the establishment of a tolerance for the combined residues of the insecticide chlorpyrifos [0,0-diethyl-0-(3,5,6-trichloro-2-pyridyl)-phosphorothioate] and its metabolite 3,5,6-trichloro-2-pyridinol (also known as TCP) at 0.1 ppm in/on legume vegetables (dried and succulent), except for soybeans.

Present Submission

The present consideration consists of a revised Section B/label in response to RCB's review of PP #5F3260 (memo of C. Deyrup, 7/15/85). The only deficiency discussed in that review will be restated below followed by the petitioner's response and RCB's Comments/Conclusions.

Deficiency 2

The use on seed and pod vegetables permits tank-mixing with captan, chloroneb, or thiram. Recommendations for tank mixtures of chlorpyrifos with other pesticides not having established tolerances on legume vegetables (i.e., captan, chloroneb, and thiram) should be removed from the label. For example, no thiram tolerances have been established on peas and beans (legume vegetables). Thus, the petitioner needs to submit a revised Section B that reflects the label change.

Petitioner's Response re: Deficiency 2

The petitioner has submitted a revised Section B/label in which he has deleted the section permitting tank-mixing with captan, chloroneb, or thiram.

RCB's Comments/Conclusions

Deficiency 2 is now resolved.

Other Considerations

An International Residue Status sheet is attached. Codex has established a MRL (maximum residue level) of 0.2 ppm chlorpyrifos per se on beans. Canada has established an MRL of 0.1 ppm chlorpyrifos per se on peas and beans. Mexico has established a tolerance of 0.05 ppm chlorpyrifos on string beans. The US tolerance is expressed in terms of chlorpyrifos plus TCP; so there is a compatibility problem with regard to the residues regulated. However, RCB would not object to raising the US tolerance to 0.2 ppm on legume vegetables, if it could be toxicologically supported.

Recommendations

TOX and EAB considerations permitting, RCB recommends for the establishment of a permanent tolerance for the combined residues of chlorpyrifos and its metabolite 3,5,6-trichloro-2-pyridinol in/on dried and succulent legume vegetables (except soybeans) at 0.1 ppm.

cc: Circu, EEB, EAB, TOX, Deyrup, 5F3260, R.F., PMSD/ISB, PM #12, FDA
RDI:JHOnley:2/14/86:RDSchmitt:2/14/86
TS-769:RCB:CM#2:RM810:X7484:CDeyrup:cd:2/18/86

F. Lutz 6/27/75

INTERNATIONAL RESIDUE LIMIT STATUS

CHEMICAL chlorpyrifos

CCPR NO. 17

PETITION NO. 5F2166

Reviewer: C. Deyrup

Codex Status

[ ] No Codex Proposal
Step 6 or above

Residue (if Step 9):

chlorpyrifos per se

Crop(s)	Limit (mg/kg)
beans	0.2 ppm

Proposed U.S. Tolerances

Residue: chloropyrifos + 3,5,6-trichloro-pyridin-2-ol

Crop(s)	Tol. (ppm)
legume veg (except soybean)	0.1 ppm

CANADIAN LIMIT

Residue:

chlorpyrifos 1/

Crop	Limit (ppm)
beans	0.1 2/
peas	0.1 2/

MEXICAN TOLERANCIA

Residue:

chlorpyrifos

Crop	Tolerancia (ppm)
beans, string	0.05 2/

NOTES:

1/ Canadian limits on animal products include the pyridinol

2/ Negligible residue type limit

3