174277
RECORD NO.

109702
SHAUGHNESSEY NO. REVIEW NO.

EEB REVIEW

DATE: IN 5-30-86 OUT 18 JUN 1986

FILE OR REG. NO 10182-645

PETITION OR EXP. NO.

DATE OF SUBMISSION 5-20-86

DATE RECEIVED BY HED 5-28-86

RD REQUESTED COMPLETION DATE 6-30-86

EEB ESTIMATED COMPLETION DATE 6-30-86

RD ACTION CODE/TYPE OF REVIEW 117

TYPE PRODUCT(S) : I, D, H, F, N, R, S Synthetic Pyrethroid

DATA ACCESSION NO(S).

PRODUCT MANAGER NO. G. LaRocca (15)

PRODUCT NAME(S) Cypermethrin

COMPANY NAME ICI Americas, Inc.

SUBMISSION PURPOSE Submission of honeybee (toxicity of residues on foliage) protocol for review in response to Data Call-In Notice of 10-25-85.

SHAUGHNESSEY NO.	CHEMICAL, & FORMULATION	% A.I.
109702	Cypermethrin	

MEMORANDUM

SUBJECT: Review of protocol for toxicity testing on honey bees

FROM: Allen W. Vaughan, Entomologist
Ecological Effects Branch
Hazard Evaluation Division (TS-769-C)

THRU: Norman J. Cook, Head-Section 2
Ecological Effects Branch
Hazard Evaluation Division (TS-769-C)

THRU: Michael W. Slimak, Chief
Ecological Effects Branch
Hazard Evaluation Division (TS-769-C)

TO: George LaRocca, PMT-15
Insecticide/Rodenticide Branch
Registration Division (TS-767-C)

The Ecological Effects Branch (EEB) has reviewed the attached protocol for testing the toxicity of foliar residues to honey bees. As the submitted protocol is based on the methods developed at Washington State University, it is in line with what EEB considers as standard methodology. In order to enhance the quality of the study, however, we would recommend the following:

- As it stands, samples will be harvested at 3 and 24 hours posttreatment. Addition of one more weathering interval (e.g., 8 hours posttreatment) is advisable, as this would more clearly show any decrease in residual toxicity over time. Also, if the chemical is still causing substantial mortality (e.g., >50%) 24 hours posttreatment, it may be advisable to extend the test to include bee exposure to 36- or 48-hour old residues.

- Under Experimental Procedure, Sec. 5.6, Observations, the protocol indicates that mortality will be assessed at 3 or 24 hours after exposure began. Mortality should be evaluated after 24 hours of bee exposure to treated foliage, regardless of the weathering period.

- Weather conditions during and after application should be reported.

- The test should be replicated over time to reduce variability due to weather conditions.

If the registrant has any questions about this memo, we would be happy to discuss this matter further.

Attachment