

New York State Department of Environmental Conservation

Division of Solid & Hazardous Materials

50 Wolf Road, Albany, New York 12233-7250

Phone 518-457-6934 FAX 518-457-0629



John P. Cahill
Commissioner

JUL 21 1998

CERTIFIED MAIL
RETURN RECEIPT REQUESTED

Mr. Julius C. Prinzo
Ecoval Technologies, Inc.
c/o J.C. Prinzo Consulting Services
6678 Springdale Drive
Middleburg Heights, OH 44130

Dear Mr. Prinzo:

Re: Registration of ECO-1000 (EPA Reg. No. 69836-1) and Withdrawal of the Application to Register Nature's Glory™ Ready To Use Weed and Grass Killer (EPA Reg. No. 69836-2) Containing the New Active Ingredient Acetic Acid

The New York State Department of Environmental Conservation ("the Department") has completed review of the applications, received on January 6, 1998 and March 6, 1998, together with all of the supporting supplemental information supplied to date, regarding registration of the referenced pesticide products in New York State. ECO-1000 (EPA Reg. No. 69836-1) and Nature's Glory™ Ready To Use Weed and Grass Killer (EPA Reg. No. 69836-2) contain the new active ingredient **acetic acid**.

ECO-1000 (25% acetic acid) is labeled for non-selective control of herbaceous broadleaf and grassy weeds on non-cropland areas, such as railroad rights-of way, power stations, industrial sites and driveways; around farm buildings, storage areas and tank farms; greenhouses, plant nurseries, golf courses; and in fence rows and vacant lots. Following dilution with water, ECO-1000 is labeled for broadcast application at a volume of 75-125 gallons per acre. Retreatment is required for control of established perennial weeds.

The Department's review of acetic acid and ECO-1000 addressed potential human health, nontarget organism, and groundwater/drinking water impacts.

Acetic acid occurs naturally in animals and plants and is formed during metabolism of food substances. According to the United States Environmental Protection Agency (USEPA) Reregistration Eligibility Decision (RED), the Food and Drug Administration lists acetic acid as a substance generally recognized as safe for use in food. The listing includes uses for curing and pickling at levels up to nine percent acetic acid in condiments and relishes. ECO-1000 is applied at approximately the same acetic acid concentration (6.3 - 7.7 percent) as household vinegar (3.3 - 8.0 percent acetic acid).

The USEPA waived the requirement to conduct acute toxicity testing for acetic acid and the formulated product. Nevertheless, Ecoval Technologies, Inc. conducted the battery of acute toxicity studies with the ECO-1000 product. These studies indicate that the product is not very toxic following oral, dermal or inhalation exposures and that it was slightly irritating to skin and not a sensitizer. The product was, however, a severe eye irritant.

There are no data on the toxicity of acetic acid following chronic exposures. The USEPA RED for sodium diacetate reports that rats given acetic acid at a dose of 390 milligrams per kilogram body weight per day (mg/kg/day) in drinking water for a period of nine to 15 weeks experienced an immediate and progressive reduction in body weight gain, loss of appetite and a reduction in food consumption. No developmental effects were reported in studies of pregnant rats, rabbits or mice administered apple cider vinegar at doses of acetic acid up to 1,600 mg/kg/day.

There are no federal or State drinking water/groundwater standards for acetic acid. Based on its chemical structure, acetic acid falls under the 50 microgram per liter general New York State drinking water standard for "unspecified organic contaminants" (10 NYCRR Part 5, Public Water Systems).

The available information on acetic acid and the ECO-1000 product indicate that they are not very toxic. However, ECO-1000 caused severe eye irritation and irreversible eye damage in laboratory animals. Accordingly, the product label for ECO-1000 requires that handlers wear goggles or a faceshield, which mitigates the risk of eye damage.

USEPA waived most of the ecological data requirements and all of the environmental fate data requirements. When used as labeled, ECO-1000 should not adversely impact nontarget organisms or groundwater resources.

The Department hereby accepts ECO-1000 (EPA Reg. No. 69836-1) for general use registration in New York State. Enclosed for your files are the Certificate of Pesticide Registration and New York State stamped-"ACCEPTED" label for ECO-1000.

Pursuant to your correspondence dated July 15, 1998, the Department acknowledges your request to withdraw the application to register Nature's Glory™ Ready To Use Weed and Grass Killer (EPA Reg. No. 69836-2). If Ecoval Technologies, Inc. elects to re-submit an application to register Nature's Glory™, the application must be accompanied by a new application fee and meet the requirements outlined in Appendix 1 of "New York State Pesticide Product Registration Procedures" (August 1996).

Mr. Julius C. Prinzo

3.

Please contact Maureen Serafini, Chief of our Pesticide Product Registration Section, at (518) 457-7446, if you have any questions.

Sincerely,



Stephen Hammond, P.E.
Director
Division of Solid & Hazardous Materials

Enclosures

cc: w/enc. - N. Kim/D. Luttinger, NYS Dept. of Health
E. Biel/R. Mungari, NYS Dept. of Ag. & Markets
D. Rutz/W. Smith, Cornell PMEP