Comments in Response to Follow-Up Questions on DCPA Use on Sweet Potatoes, Beans, Yam Bean, Eggplant, Cucumbers, Turnips

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To: Jill Bloom
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EPA

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Subject: Comments on Federal Register Notice (Docket# OPP-2005-0024)

Response to follow-up questions regarding: DCPA; Notice of Receipt of Request to Amend to Terminate Uses of Certain Pesticide Registrations, Federal Register Notice February 16, 2005 (Volume 70, Number 31, OPP-2005-0024)

Water Monitoring Data
There is not much data about DCPA contamination of groundwater in Hawaii. The Honolulu Board of Water Supply (HBWS) and Hawaii Department of Health (HDOH) Safe Drinking Water Branch do not monitor for DCPA contamination. The HBWS manages the municipal water resources and distribution system for the island of Oahu. HDOH monitors all of the State's public water systems and groundwater for contaminants. The U.S. Geological Survey National Water Quality Assessment (NAWQA) Program included DCPA as one of the pesticide chemical compounds for assessment. The NAWQA report, Water quality on the island of Oahu, Hawaii, 1999-2001: U.S. Geological Survey Circular 1239, 31 p. (http://hi.water.usgs.gov/nawqa/pubs.html) did not report detection of DCPA in any of their samples. (As the title of the report indicates, NAWQA assessments were confined to the island of Oahu.)

Growers who expressed the wish to retain DCPA uses are on the islands of Oahu and Molokaʻi (sweet potatoes). Molokaʻi's water is managed by the Maui County Department of Water Supply. HDOH has not detected any contaminants in any of the wells sampled since their testing began in 1989. (However, HDOH does not specifically test for DCPA.)

Importance and Impact of DCPA Use
According to the Hawaii Farm Bureau Federation (HFBF), "Dacthal is, in fact, a very effective pre-emergent herbicide for all labeled uses in Hawaii. . . growers who use Dacthal routinely and who would have great difficulty finding a pre-emergent herbicide which could replace Dacthal. . . . And, even though Dacthal is used by growers here, the amount of area treated with the herbicide is very small (less than 1,000 acres a year) thus the risk associated with any undesirable environmental impact is extremely small."

The 1,000 acres mentioned in the HFBF statement includes all DCPA use, not just the uses proposed for termination. (DCPA is an important herbicide for the production of lettuce, cole crops, onions and other crops in Hawaii.)
Sweet Potatoes
The spokesperson for the sweet potato growers remains firm in his “wish that the Agency reconsider total termination. I would suggest that DCPA be allowed at transplant preemergence, and if there is any termination occurring consider terminating layby application. It is important that the first generation weed population density be managed with preemergence. Layby is applied after several weeks of sweet potato growth following mechanical cultivation. Managing the initial high density weed growth improves the effectiveness layby and mechanical cultivation work.

“Yes, preemergence herbicide application is important cultural practice to reduce the first generation weed population density. Mechanical cultivation is effective between the row, but doesn't work for weeds in-row. Weeds in the row are hand weeded. . . .In-row is around 2 feet wide. Mechanical also works more effectively with lower weed population density than with high weed population density. DCPA lowers the weed population and makes hand weeding economically feasible, if not forget it.

“Therefore DCPA is not a end-all solution to weed management in sweet potato. It is an important management tool that lowers weed population density that makes other method, mechanical and hand cultivation, work.”

“I am afraid that just Devrinol will select for grasses.”

Possible alternatives to DCPA
Mechanical weed control is not economically feasible.

1. Sweet potatoes
   a. Current registrations
      • Napropamide (Devrinol). Concern expressed that napropamide alone will not provide sufficient control of broadleaf weeds.
      • Flumioxazin (Valor). There is a new (2004) supplemental label for Valor (59639-99) for sweet potatoes. However, this label restricts its use to the "Beauregard" variety. This is not the variety commonly grown on Moloka‘i. Efficacy for the problem weeds under Hawaii conditions is unknown.
      • Clomazone (Command) A number of states have a 24(c) label for use on sweet potatoes, but this product is not licensed for sale in Hawaii.

2. Beans
   a. Current registrations
      • Trifluralin (Treflan and Trust), pendimethalin (Prowl) and EPTC (Eptam) should cover most weeds that DCPA controls. The overall activity of either trifluralin or pendimethalin is better than DCPA.

3. Yam Bean
   No alternatives licensed.

4. Eggplant
   a. Current registrations
• Bensulide (Prefar) has a 120-day crop rotation restriction which could be a problem for growers who want to rotate to crops that are not on the Prefar label. However, the label does cover a lot of crops (crop groups).
• Trifluralin (Treflan HFP, supplemental label) may be a reasonable alternative. However, no information is available regarding suitability and the label has this precaution, "Eggplant tolerance to Treflan HFP is marginal."
• Devrinol 50DF (napropamide)

5. Cucumbers
There are acceptable alternatives available.

6. Turnips
We are not requesting continued support for DCPA on turnips.

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