



August 25, 2003

Jill Bloom
7508C USEPA Headquarters
Ariel Rios Building
1200 Pennsylvania Avenue, N. W.
Washington, DC 20460

The following information is provided to you from the Western Region Pest Management Center regarding the use of DCPA (Dacthal) in the six-state Pacific Northwest region comprised of Alaska, Idaho, Oregon, Montana, Utah, and Washington. This information is being sent to you in response to a request that was sent out by USDA's Harold Coble.

In our region, the primary use for DCPA is in onions. Onions are grown in four of the six states: Idaho, Oregon, Utah, and Washington. A total of 46,400 acres of onions were grown in the four states in 2001: Idaho 8,000 acres, Oregon 19,600 acres, Utah 2,000 acres, and Washington 16,800 acres. The vast majority of the acreage is planted to yellow storage-type onions; however, approximately 2% of the overall acreage is planted to specialty storage-type onions, either red or white. In addition 800 acres of dry bulb non-storage onions (Walla Walla Sweet Onions) and 300 to 500 acres of bunching onions are grown in our region as well. Onion seed (hybrid, open pollinated, and bunching) is also produced in Washington, Oregon, and Idaho. As you are aware, seed crops are grown on relatively small acreage; as an example, in Washington, onion seed acreage is variable and ranges from 300 to 1,000 acres per year.

In Idaho, Oregon, and Washington onion and onion seed crops, DCPA is applied pre-emergence for broadleaf weed and grass control. In Utah, the use pattern is somewhat different. Here, DCPA use is primarily limited to the 10% of the onion acreage that is grown from transplants. Utah's seeded onions are typically planted earlier than in the other states, at a time when there is some natural moisture. Weeds emerge before the onions and are typically controlled using pendimethalin (Prowl) and glyphosate (Roundup).

Adequate weed control is important in onions. Onions are slow to germinate, taking up to two weeks to emerge. In that time weed growth can be substantial. Once onions do emerge and are actively growing they don't provide much competition for weeds as the foliage does not produce much shade. All weeds that are not controlled with a pre-emergence herbicide must be controlled by additional post-emergence herbicide applications and hand weeding. Mechanical cultivation for weed control is not used in onions because of the potential for crop damage. Further, mechanical cultivation is not practical in acreage that is drip irrigated (30% Idaho, 10% Oregon, 20% Washington, and 5% Utah) because cultivation equipment would destroy irrigation systems. Even with the use of existing herbicides, onion acreage must be hand weeded. Fields typically receive one to three weedings per season. If DCPA is lost, our

Washington State Pest Management Resource Service • <http://wsprs.wsu.edu>
2710 University Drive, Richland, WA 99352-1671
509-372-7492 • Fax 509-372-7491

region's onion producers will have to resort to using more post-emergence herbicides as well as more hand weeding. Growers will not be able to tolerate this additional expense (it has been reported that organic producers spend between \$6,000 and \$7,000 per acre on hand weeding onions).

Currently there are no practical alternatives to DCPA for pre-emergent broadleaf weed and grass control in onions, therefore the loss of this compound would be detrimental to onion production in our region. Efforts are underway to register ethofumesate (Nortron). This chemical has been through IR-4 testing but it is not yet labeled for use on onions. Growers have also tried using both pendimethalin (Prowl) and bensulide (Prefar); however, there are significant problems associated with both compounds. Pendimethalin works best when applied by chemigation and thus is only usable in onions under center pivot irrigation. (None of the Oregon or Idaho acreage is sprinkler irrigated, while only 10% of Utah's onion acreage and 60% of Washington's acreage are under center pivot irrigation.) Bensulide is only effective controlling grasses and has a relatively long replant interval that doesn't fit regional crop rotations. In addition, it has been reported that both compounds cause stand reduction.

DCPA is also reported to be used on approximately 35% of Utah's dry bean acreage, where it is used either preplant or at planting. Although they do have alternatives, growers would like to retain this use because DCPA is a relatively inexpensive herbicide.

Additionally, DCPA is used on approximately 1,000 acres of cucurbits grown in Utah. Here it is applied as a post-emergent spray. According to a Utah State University Extension Vegetable Specialist, growers don't have many choices for post-emergent broadleaf sprays and they would like to retain this use.

Finally, DCPA is also used on approximately 300 acres of cabbage in Utah where it is applied either before or after transplant. Growers do have alternatives but would prefer to retain the use of DCPA.

I hope that you find this information useful. Feel free to contact me if I can be of further assistance.

Sincerely,



Jane M. Thomas
Pacific Northwest Coalition Comment Coordinator
Washington State Pest Management Resource Service
Washington State University Tri-Cities
2710 University Drive
Richland, WA 99352
phone: 509-372-7493; fax: 509-372-7491
e-mail: jmthomas@tricity.wsu.edu

DCPA Contact List

Crop	Last Name	First Name	Organization	State	Work Phone
bean, dry	Brune	Monte	Plant Foods	Idaho	(208) 733-4072
onion, dry bulb	Brune	Monte	Plant Foods	Idaho	(208) 733-4072
bean, dry	Bullwinkle	Barry	ADM/ASI	Idaho	(208) 423-5531
bean, dry	Drost	Dan	Utah State University	Utah	(435) 797-2258
cabbage	Drost	Dan	Utah State University	Utah	(435) 797-2258
cucurbit	Drost	Dan	Utah State University	Utah	(435) 797-2258
onion, dry bulb	Drost	Dan	Utah State University	Utah	(435) 797-2258
bean, succulent	Knudson	Chris	Twin City Foods	Washington	(509) 962-9806
bean, dry	Larsen	Lou	Columbia Bean	Washington	(509) 750-1944
bean, dry	Metsker	Ron	Kelly Bean Co	Idaho	(208) 436-3611
onion, dry bulb	Miller	Tim	Washington State University	Washington	(360) 848-6138
bean, dry	Muller	Royal	Cenex Supply & Marketing/Harvest States	Washington	(509) 488-9681
onion	Parker	Bob	Washington State University	Washington	(509) 786-9234
onion seed	Pelter	Gary	Washington State University	Washington	(509) 754-2011
onion, dry bulb	Pelter	Gary	Washington State University	Washington	(509) 754-2011
bean, dry	Piercey	Lloyd	Golden Canyon Ranch	Oregon	(541) 561-4642
bean, succulent	Piercey	Lloyd	Golden Canyon Ranch	Oregon	(541) 561-4642
onion seed	Thompson	Mack	University of Idaho	Idaho	(208) 722-6701
onion, dry bulb	Thompson	Mack	University of Idaho	Idaho	(208) 722-6701
onion, dry bulb	Thompson	Mack	University of Idaho	Idaho	(208) 722-6701
n/a - Western Region IPM Center State Liaisons/Representatives	Blodgett	Sue	Montana State University	Montana	(406) 994-2402
	Daniels	Catherine	Washington State University	Washington	(509) 372-7495
	Deer	Howard	Utah State University	Utah	(435) 797-1602
	Hirnyck	Ronda	University of Idaho	Idaho	(208) 364-4046
	Jahns	Tom	University of Alaska Fairbanks	Alaska	(907) 262-5824
	Jenkins	Jeff	Oregon State University	Oregon	(541) 737-5993