Case No: 0092 PC Code: 34401 Date: 7-29-03 Analyst: Roger Clark

Based on available pesticide usage information mainly for 1992 through 2001, average domestic usage of naled is about 1,000,000 pounds active ingredient (a.i.) per year. In terms of pounds a.i., total usage is allocated mainly to mosquito abatement (71%) and cotton (12%). Other sites with significant usage include alfalfa, livestock, dogs and cats, safflower and broccoli (10%). The crop with highest average percent of crop treated with naled is safflower at 9%. No other crop has more than 7% of its acreage treated with naled. Application rates per acre on these sites are generally less than 3 pounds active ingredient per acre.

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naled__3.wpd Modified by Analyst: Roger Clark Data years: 1992-2001 Modified date: 29-Jul-03

Site	Acres Grown	Acres Treated (000)		% of Crop Treated		LB AI Applied (000)		Avera	ge Appli Rate	cation	States of Most Usage
	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Tangerines	24	0	1	1%	4%	0	1	1.0	1.0	1.0	CA 100%
Grapefruit	194	0	0	0%	0%	0	0	0.5	3.0	0.2	AZ CA FL TX 100%
Lemons	63	0	0	0%	0%	0	0	1.1	1.0	1.1	CA 100%
Oranges	770	8	18	1%	2%	2	4	0.3	1.3	0.2	CA AZ 100%
Quinces	-	-	1	-	-	-	-	-	-	-	-

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	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Peaches	212	1	2	1%	1%	3	6	3.1	1.0	3.1	CA 94%
Strawberries	50	3	8	7%	16%	6	15	1.8	2.2	0.8	CA 85%
Grapes	795	20	43	1%	2%	3	6	0.2	1.2	0.1	CA 100%
Almonds	429	2	8	1%	2%	5	21	2.3	1.2	1.9	CA 100%
Walnuts	205	3	8	3%	4%	8	23	0.8	1.1	0.7	CA 100%

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	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Celery	34	2	6	7%	18%	1	7	0.4	1.8	0.2	CA MI 100%
Kale	4	0	0	4%	8%	0	1	3.1	1.9	1.6	CA OH SC 90%
Lettuce	268	1	2	0%	1%	4	17	5.2	2.9	1.8	CA 100%
Spinach	36	0*	0*	0*	0*	0*	0*	ı	-	_	-
Broccoli	107	7	11	6%	10%	10	18	1.5	1.0	1.5	CA 100%
Brussels Sprouts	4	1	3	5%	10%	1	6	1.0	3.4	0.3	CA 100%
Cabbage	84	5	9	6%	11%	4	9	0.7	1.0	0.7	FL CA 87%
Cauliflower	57	2	15	4%	10%	5	30	1.4	1.1	1.3	CA 100%

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	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Collards	15	1	1	1%	2%	0	0	0.0	1.0	0.0	CA NC SC 91%
Swiss Chard	-	-	-	-	-	ı	ı	-	ı	ı	-
Cucumbers	151	0	0	0%	0%	0	0	ı	1	ı	-
Pumpkins	41	0	0	0%	0%	1	0	ı	ı	ı	-
Squash	69	0	0	0%	0%	1	0	ı	ı	ı	-
Melons	368	0	2	0%	0%	1	5	2.9	1.5	2.0	CA 100%
Eggplant	3	0	0	6%	12%	0	1	1.0	1.2	0.8	NJ FL 100%
Peppers	48	0	0	3%	6%	3	6	1.9	1.2	1.6	CA MI 90%

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	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Tomatoes	500	0	1	0%	0%	0	1	1.0	1.3	0.8	CA FL 83%
Beans/Peas-Green	723	0	4	0%	1%	0	1	1.4	1.4	1.0	FL CA 100%
Beans/Peas-Dry	2,181	1	2	0%	0%	1	4	1.1	1.4	0.8	CA 86%
Pasture/Rangeland	-	ı	-	-	ı	ı	ı	-	1	-	-
Alfalfa	23,949	23	41	0%	0%	32	67	1.4	1.6	0.9	ID OR 90%
Peanuts	1,824	0*	0*	0*	0*	0*	0*	ı	1	-	-
Safflower	243	22	33	9%	14%	17	25	0.8	1.2	0.7	CA 100%
Soybeans	59,288	0*	0*	0*	0*	0*	0*	-	-	-	-

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	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Rice	2,991	0*	0*	0*	0*	0*	0*	-	-	-	-
Cotton	12,689	90	176	1%	1%	120	250	1.3	1.2	1.1	CA LA 100%
Sugar Beets	1,434	4	8	0%	1%	4	8	0.9	1.0	0.9	CA 88%
Tobacco	839	0	0	0%	0%	0	0	-	-	-	
Hops	-	-	-	-	ı	ı	ı	-	ı	-	-
Mushrooms	-	-	1	-	ı	ı	ı	-	1	-	-
Livestock	-	-	-	-	-	23	46	-	ı	-	-
Total of above:		198	301			260	393				

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EPA's QUANTITATIVE USAGE ANALYSIS

Site	Acres Grown	Acres Treated (000)		% of Crop Treated		LB AI Applied (000)		Average Application Rate			States of Most Usage
	(000)	Wtd Avg	Est Max	Wtd Avg	Est Max	Wtd Avg	Est Max	lb ai/ acre/y r	#appl / yr	lb ai/ A/appl	(% of total lb ai used on this site)
Mosquito Abatement Districts (MADS)	-	-	-	-	-	700	1,200	-	-	0	
Dogs & Cats	-	-	-	-	-	20	30	-	-	-	
Grand Total						980	1252				

COLUMN HEADINGS

Wtd Avg = Weighted average--the most recent years and more reliable data are weighted more heavily.

Est Max = Estimated maximum, which is estimated from available data.

Average application rates are calculated from the weighted averages.

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EPA's QUANTITATIVE USAGE ANALYSIS

NOTES ON TABLE DATA

Usage data covers 1992- 2001 for agriculture, and up to 1997 for nonag. Calculations of the above numbers may not appear to agree because they are displayed as rounded:

to the nearest 1000 for acres treated or lb. a.i. (Therefore 0 = < 500)

to the nearest whole percentage point for % of crop treated. (Therefore 0% = < 0.5%)

0* = Available EPA sources indicate that no usage is observed in the reported data for this site, which implies that there is little or no usage.

A dash (-) indicates that information on this site is NOT available within EPA or is insufficient to provide an estimate.

SOURCES: EPA data (1987-97), USDA (1992-2001), and National Center for Food and Agricultural Policy (1992 data).