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Health Effects of 40 Commonly Used Toxic Pesticides in Schools

A Beyond Pesticides Fact Sheet

Pesticide	Cancer	Endocrine Disruption	Reproductive Effects	Neurotoxicity	Kidney / Liver Damage	Sensitizer / Irritant	Birth / Devel. Defects
Insecticides							
Acephate	Possible(6)		X(1)	X(7)		X(1)	
Allethrins	Suggestive(6)	X(18)		X(1)	X(1)	X(1)	
Avermectin/ Abamectin			X(1)	X(1)		X(4)	X(7)
Carbaryl	Likely(6)	Suspected(2)	X(8)	X(5)	X(1)	X(1)	X(3)
Cyfluthrin			X(1)	X(1)	X(1)	X(1, 8)	
Cypermethrin	Possible(6)	Suspected†(2)	X(8)	X(1)	X(1)	X(3)	X(3)
Dichlorvos	Suggestive(6)		X(13)	X(1)	X(1)	X(1)	
Fenoxycarb	Likely(6)				X(7)		X(7)
Fipronil	Possible(6)	X(18)		X(4)	X(4)	X(4)	
Hydramethylnon	Possible(6)		X(4)		X(4)	X(4)	X(7)
Lamda-Cyhalothrin				X(1)		X(1)	
Malathion	Suggestive(6)	Suspected(2)	X(8)	X(7)	X(1)	X(3)	X(4)
Permethrin	Likely(6)	Suspected(2)	X(8)	X(7)	X(7)	X(1)	
Phenothrin				X(17)	X(7)		
Piperonyl butoxide	Possible(6)		X(3)	X(3)	X(4)	X(4)	
Propetamphos				X(7)	X(7)		
Propoxur	Probable(6)			X(1)	X(1)		
Pyrethrins	Suggestive(6)			X(3, 5)		X(1)	
Tetramethrin	Possible(6)			X(7)			
Trichlorfon	Likely in High Doses(6)		X(1)	X(13)	X(1)	X(1)	X(1)
Pesticide	**Cancer**	**Endocrine Disruption**	**Reproductive Effects**	**Neurotoxicity**	**Kidney / Liver Damage**	**Sensitizer / Irritant**	**Birth / Devel. Defects**
Herbicides							
Atrazine	X(7)	Known(2)	X(4)	X(1)	X(1)	X(1)	X(4)
Benfluralin (Benefin)	Suggestive (6)	X(5)	X(5)		X(7)	X(5)	
2,4-D	X(1)	Probable(2)	X(3)	X(4)	X(4)	X(1)	X(1)
Dacthal (DCPA)	Possible(6)				X(3)	X(11)	
Dicamba			X(3)	X(3)	X(1)	X(1)	X(7)
Diquat Dibromide			X(10)		X(1)	X(5)	
Glyphosate	X(3)		X(5, 8)	X(4)	X(4)	X(5)	
Isoxaben	Possible(6)				X(15)		
MCPA			X(1)	X(5)	X(1)	X(5)	
MCPP	Suggestive(6)		X(3)		X(7)	X(1)	X(1)

Pendimethalin	Possible(6)	X(18)	X(5)		X(7)	X(16)	
Prometon						X(16)	
Pronamide	Probable(6)	X(1, 5)	X(1)		X(7)	X(1)	
Siduron						X(11)	
Triclopyr			X(3)		X(7)	X(5)	X(3)
Trifluralin	Possible(6)	Probable(2)	X(5)		X(1)	X(5)	
Fungicides							
Chlorothalonil	Likely(6)		X(3)	X(9)	X(1)	X(5)	
Sulfur						X(5)	
Triadimefon	Possible(6)	X(18)	X(7)	X(1)	X(7)		X(7, 12)
Ziram	Suggestive(6)	Suspected(2)	X(1)	X(11)	X(16)	X(1)	
	Cancer	**Endocrine Disruption**	**Reproduc-tive Effects**	**Neuro-toxicity**	**Kidney / Liver Damage**	**Sensitizer / Irritant**	**Birth / Devel. Defects**
TOTAL	28	14	26	26	32	37	13

X = Adverse effects demonstrated.

Likely = "Likely to be Carcinogenic to Humans", 2005 U.S. EPA weight-of-evidence category.

Likely in High Doses = "Likely to be Carcinogenic to Humans at High Doses, Not Likely to be Carcinogenic to Humans at Low Doses", U.S. EPA classification.

Probable = "Group B2 – Probable Human Carcinogen", 1986 U.S. EPA weight-of-evidence category. Sufficient evidence in animals and inadequate or no evidence in humans,.

Suggestive = "Suggestive Evidence of Human Carcinogenicity, but Not Sufficient to Assess Human Carcinogenic Potential", 2005 U.S. EPA weight-of-evidence category.

Possible = "Possible Human Carcinogen", 1986 U.S. EPA weight-of-evidence category. Limited evidence of carcinogenicity in animals and no human data.

Unknown = "Not Classifiable as to Human Carcinogenicity", 2005 U.S. EPA weight-of-evidence category. Inadequate evidence of carcinogenicity or no available data.

* A known metabolite of monosodium methanearsonate (MSMA), cacodylic acid, is a probable human carcinogen (Group B2). EPA believes it reasonable to assume that MSMA and disodium methanearsonate (DSMA) may be potential human carcinogens.

† Zeta-cypermethrin, an enriched enantiomer of cypermethrin, is a suspected endocrine disruptor.

Sources: This list is a compilation analysis by Beyond Pesticides with data collected through surveys on pesticide use and pest management practices from around the country. Surveys include:

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