


# Material Safety Data Sheet

DOT	HCS Risk Phrases	Protective Clothing
	Not an HCS controlled material in USA.	

## Section 1. Product Identification and Uses

Common/Trade name	<b>Annihilator™ Insecticide Premise Spray</b> (EPA Reg. No. 4691-164)	CI#	Not available.
Synonyms	Not available.	DSL	TSCA inventory: No products were found.
Chemical Name	(s)-cyano-3-phenoxybenzyl-(1R,3R)-3(2,2-dibromovinyl)-2,2-dimethyl-cyclopropane carboxylate	CAS #	Not available.
Chemical Formula	Not available.	Code	MSDS ID#: E01DE164
Chemical Family	Not available.	Molecular Weight	Not available.
Supplier	BOEHRINGER INGELHEIM VETMEDICA, INC. 2621 NORTH BELT HWY ST. JOSEPH MO 64506-2002	Manufacturer	BOEHRINGER INGELHEIM VETMEDICA, INC. 2621 NORTH BELT HWY ST. JOSEPH MO 64506-2002
Material Uses	Annihilator Insecticide Premise Spray is a ready-to-use insecticide for various indoor and outdoor pests.		

## Section 2. Hazardous Ingredients

Name	CAS #	% by Weight	Exposure Limits	LC <sub>50</sub> /LD <sub>50</sub>
1) Deltamethrin	52918-63-5	0.02	OSHA/ACGIH Limits: None established Manufacturer's Recommended Limits: TWA-TLV: 45 ug/m3 STEL (15 minutes): 100 ug/m3	None established

## Section 3. Physical Data

Physical State and Appearance	Clear liquid	Odor	Odorless.
pH (1% soln/water)	Not applicable	Taste	Not available.
Odor threshold	Odorless.	Color	Clear
Volatility	Not available.		
Melting/Sublimation point	32 ° F or 0° C		
Boiling/Condensation point	212° F or 100° C		
Specific gravity	> 1.00		
Vapor Density	Not available.		
Vapor pressure	Not available.		
LogK <sub>ow</sub>	Not available.		
Ionicity (surface active agent)	Not available.		
Critical temperature	Not available.		
Instability temperature	Not available.		
Conditions of instability	Not available.		
Dispersion properties	Not available.		
Solubility	Not applicable		

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### **Section 4. First Aid Measures**

<b>Eye contact</b>	Causes moderate eye irritation. Immediately flush eyes with plenty of 1% physiological saline for 5 minutes while holding eyelids open. If no saline is easily available, flush eyes with plenty of water. Call a physician if irritation persists.  <b>NOTE:</b> Product may be difficult to remove using only water.
<b>Skin contact</b>	May cause skin irritation. Wash with plenty of soap and water. Seek medical attention if irritation persists.
<b>Slight inhalation</b>	Remove person from contaminated area to fresh air. Apply artificial respiration if needed.
<b>Slight ingestion</b>	Call a physician or poison control center. Drink 1 or 2 glasses of water and induce vomiting by touching back of throat with finger. If person is unconscious, do not give anything by mouth and do not induce vomiting.

### **Section 5. Fire and Explosion Data**

<b>The product is:</b>	Not available.
<b>Auto-ignition temperature</b>	Not available.
<b>Fire degradation products</b>	Not available.
<b>Flash points</b>	>200° F or > 93° C
<b>Flammable limits</b>	Not available.
<b>Fire extinguishing procedures</b>	Carbon dioxide, dry chemical, foam, or water. SPECIAL FIRE FIGHTING PROCEDURES: Recommend pressure-demand, self-contained breathing apparatus, (MSHA/NIOSH) approved (or equivalent). Wear full protective equipment and isolate hazard area. Keep upwind. Avoid inhalation of smoke and fumes. Use water or foam to reduce fumes. Do not touch spilled material. If possible, move containers from area. Extinguish only if flow can be stopped. Use flooding amounts of water as a fog. Cool containers with flooding amounts of water from as far a distance as possible. Avoid breathing vapors.
<b>Flammability</b>	NFPA/OSHA Class: IIIB NFPA Rating (Fire): 1
<b>Risks of explosion</b>	Do not use this product on electrical equipment due to the possibility of shock hazard.

### **Section 6. Reactivity Data**

<b>Stability</b>	The product is stable.
<b>Hazardous Decomposition Products</b>	Not available.
<b>Degradability</b>	Not available.
<b>Products of degradation</b>	Not available. Not available
<b>Corrosivity</b>	Not available.
<b>Reactivity</b>	Not available.

## Section 7. Toxicological Properties

Routes of entry	Absorbed through skin. Dermal contact. Eye contact. Inhalation. Ingestion.
TLV	Not available.
Toxicity to animals	<p><b>Acute Studies</b> The following Data were developed with: deltamethrin, the active ingredient</p> <p><b>CHRONIC TOXICITY AND CARCINOGENICITY</b> General neurological symptoms were exhibited in studies with rats, mice and dogs. These symptoms included unsteadiness, abnormal gait, tremors and liquid feces. No histopathologic findings were observed except some signs of slight hepatotoxicity in mice. No Observable Effect Levels (NOEL's) were 1 mg/kg/day in the 2-year rat and dog studies. The NOEL for the 2-year mouse study was approximately 12 mg/kg/day. Deltamethrin was not carcinogenic in rats or mice.</p> <p><b>REPRODUCTIVE AND DEVELOPMENTAL TOXICITY</b> No developmental effects were observed in studies with rabbits in the absence of maternal toxicity. The development NOEL for the rat study was 11mg/kg/day (highest dose tested). The developmental NOEL in rabbits was 25 mg/kg/day. A 2-generation reproductive study with rats produced clinical signs of toxicity, reduced body weight gain and mortality in both parents and offspring. The parental and reproductive (offspring) NOEL's were 80 ppm which is equivalent to approximately 4 mg/kg/day for adults and 18 mg/kg/day for the offspring.</p> <p><b>NEUROTOXICITY</b> Deltamethrin does not inhibit acetylcholinesterase. Neurobehavioral effects including unsteadiness, excessive salivation, vomiting, liquid feces, uncoordinated movement, tremors, spasmodic convulsions which are typically related to Central Nervous System (CNS) stimulation, were observed in some studies. The NOEL for these studies was 1 mg/kg/day or higher.</p> <p><b>MUTAGENICITY (GENETIC EFFECTS)</b> No evidence of genotoxicity was observed in a battery of in vitro and in vivo studies.</p>
Chronic effects on humans	Not available.
Acute effects on humans	Not available.

## Section 8. Preventive Measures

Waste information	Do not reuse empty container. Wrap container in several layers of newspaper and discard in trash. Ensure that the disposal is in compliance with all Federal, State/Provincial, and local regulations.
Waste stream	This product is extremely toxic to fish and aquatic invertebrates. Do not apply directly to water, to areas where surface water is present or to intertidal areas below the mean high water mark. Use with care when applying in areas adjacent to any body of water. Do not contaminate water when disposing of equipment washwater.
Storage	Keep only in the original container in a cool, dry, locked place away from reach of children. Protect from freezing.
Precautions	Avoid skin contact. This product is extremely toxic to fish and aquatic invertebrates. Do not apply directly to water. Do not contaminate water when disposing of washwater or rinsate. This product is highly toxic to bees exposed to direct treatment or residues on blooming crops or weeds. Do not apply this product or allow it to drift to blooming crops or weeds if bees are visiting the treatment area. Do not apply this product in or on electrical equipment due to possibility of shock hazard.
Small spill and leak	Absorb with an inert absorbent material such as granular clay, saw dust, or pet litter. Sweep up carefully while avoiding the formation of a dust cloud. Place in an approved chemical waste container for disposal. Rinse spill area with small amount of soapy water. Contain and absorb the rinsate with inert absorbents and place into the same disposal container. Area can be washed with water to remove the last trace residue. Do not allow water to contaminate water supplies or sewers.
Large spill and leak	Eliminate all sources of ignition. Stop leak if you can do so without coming into contact with spilled material. Dike far ahead of liquid spill for later disposal. All equipment used to clean up spill should be grounded. Prevent entry into waterways, sewers, basements or confined areas. Inform appropriate authorities immediately if contamination occurs.
Protective Clothing	Eye protection and chemically resistant gloves, a long-sleeved shirt and long-legged pants or coveralls are recommended. To avoid breathing spray mist during application in confined areas, wear a mask or respirator of a type recommended by NIOSH for filtering spray mists.

**Section 9. Classification**

DOT	Not a DOT controlled material (United States).	
	No additional information	
Maritime transportation	Not available.	
HCS	Not an HCS controlled material in USA.	
Federal and State Regulations	Not applicable	

HMIS (U.S.A.)	Health	1	National Fire Protection Association (U.S.A.)	
	Flammability	1		
	Reactivity	0		
	Personal Protection	B		

**Section 10. Protective Measures**

Protective Clothing	Eye protection and chemically resistant gloves, a long-sleeved shirt and long-legged pants or coveralls are recommended. To avoid breathing spray mist during application in confined areas, wear a mask or respirator of a type recommended by NIOSH for filtering spray mists.	
Engineering controls	Ensure that eyewash stations and safety showers are proximal to the work-station location. Control airborne concentrations below the appropriate exposure guideline. Local exhaust ventilation may be necessary.	

**Section 11. Other Information**

References	Not available.

Validated by Company on 08/07/2002.	Verified by Company.
	Printed 09/04/2002.

**CALL 1(800) 821-7467**  
**Emergency Medical: (816) 232-2525 or (800)530-5432**  
**Chemtrec: (800)424-9300**

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