

**SAFETY DATA SHEET**  
**D-Force Insecticide**

**SDS # :** 7099-A  
**Revision date:** 2018-10-01  
**Format:** NA  
**Version** 1.05



**1. PRODUCT AND COMPANY IDENTIFICATION**

**Product Identifier**

**Product Name** D-Force Insecticide

**Other means of identification**

**Product Code(s)** 7099-A

**Synonyms** (1R,3R)-3(2,2-dibromovinyl)-2,2-dimethylcyclopropane carboxylic

**Active Ingredient(s)** Deltamethrin

**Chemical Family** Pyrethroid Ester Insecticide

**Recommended use of the chemical and restrictions on use**

**Recommended Use:** Insecticide

**Restrictions on Use:** Use as recommended by the label.

**Supplier Address**

FMC Corporation  
2929 Walnut Street  
Philadelphia, PA 19104  
(215) 299-6000 (General Information)  
msdsinfo@fmc.com (E-Mail General Information)

**Emergency telephone number**

For leak, fire, spill or accident emergencies, call:  
1 800 / 424-9300 (CHEMTREC - U.S.A.)  
1 703 / 741-5970 (CHEMTREC - International)  
1 703 / 527-3887 (CHEMTREC - Alternate)

Medical Emergencies:  
1 800 / 331-3148 (ProPharma Group - U.S.A. & Canada)  
1 651 / 632-6793 (ProPharma Group - All Other Countries - Collect)

**2. HAZARDS IDENTIFICATION**

**Classification**

**OSHA Regulatory Status**

This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200)

Acute toxicity - Oral	Category 4
Acute toxicity - Inhalation (Gases)	Category 4
Skin sensitization	Category 1B
Aspiration toxicity	Category 1
Flammable Aerosols	Category 1

**GHS Label elements, including precautionary statements**

**EMERGENCY OVERVIEW**

**Danger**

**Hazard Statements**

H302 - Harmful if swallowed  
H304 - May be fatal if swallowed and enters airways  
H317 - May cause an allergic skin reaction  
H332 - Harmful if inhaled

**Physical Hazards**

H222 - Extremely flammable aerosol  
H229 - Pressurized container: May burst if heated



**Precautionary Statements - Prevention**

P264 - Wash face, hands and any exposed skin thoroughly after handling  
P270 - Do not eat, drink or smoke when using this product  
P261 - Avoid breathing dust/fume/gas/mist/vapors/spray  
P272 - Contaminated work clothing should not be allowed out of the workplace  
P302 + P352 - IF ON SKIN: Wash with plenty of water and soap  
P333 + P313 - If skin irritation or rash occurs: Get medical advice/attention  
P363 - Wash contaminated clothing before reuse  
P304 + P340 - IF INHALED: Remove person to fresh air and keep comfortable for breathing  
P312 - Call a POISON CENTER or doctor if you feel unwell  
P301 + P310 - IF SWALLOWED: Immediately call a POISON CENTER or doctor  
P331 - Do NOT induce vomiting  
P330 - Rinse mouth

**Precautionary Statements - Storage**

P405 - Store locked up  
P410 + P403 - Protect from sunlight. Store in a well-ventilated place

**Precautionary Statements - Disposal**

P501 - Dispose of contents/container to an approved waste disposal plant

**Hazards not otherwise classified (HNOC)**

No hazards not otherwise classified were identified.

**Other Information**

Very toxic to aquatic life with long lasting effects.

**3. COMPOSITION/INFORMATION ON INGREDIENTS**

**Chemical Family**

Pyrethroid Ester Insecticide.

Chemical name	CAS-No	Weight %
Petroleum distillates, hydrotreated light	64742-47-8	>75
Naphtha (petroleum), light alkylate	64741-66-8	10-20
Carbon Dioxide	124-38-9	1-5
Deltamethrin	52918-63-5	0.06



Synonyms are provided in Section 1.

#### 4. FIRST AID MEASURES

<b>Eye Contact</b>	Hold eyes open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for further treatment advice.
<b>Skin Contact</b>	Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for further treatment advice.
<b>Inhalation</b>	Move to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth if possible. Call a poison control center or doctor for further treatment advice.
<b>Ingestion</b>	Immediately call a poison control center or doctor. Do not induce vomiting unless told to do so by a poison control center or doctor. Do not give any liquid to the person. Do not give anything by mouth to an unconscious person.
<b>Most important symptoms and effects, both acute and delayed</b>	None known.
<b>Indication of immediate medical attention and special treatment needed, if necessary</b>	Treat symptomatically. Contains petroleum distillate. Vomiting may cause aspiration pneumonia.

#### 5. FIRE-FIGHTING MEASURES

<b>Suitable Extinguishing Media</b>	Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
<b>Specific Hazards Arising from the Chemical</b>	Contents under pressure. Non-flammable aerosol.
<b><u>Explosion data</u></b>	
<b>Sensitivity to Mechanical Impact</b>	No information available.
<b>Sensitivity to Static Discharge</b>	No information available.
<b>Protective equipment and precautions for firefighters</b>	As in any fire, wear self-contained breathing apparatus and full protective gear. Isolate fire area. Evaluate upwind.

#### 6. ACCIDENTAL RELEASE MEASURES

<b>Personal Precautions</b>	Isolate and post spill area. Remove all sources of ignition. Ventilate the area. Wear suitable protective clothing, gloves and eye/face protection. For personal protection see section 8. If ventilation is not possible wear full protection suit and chemical protective equipment.
<b>Other</b>	For further clean-up instructions, call FMC Emergency Hotline number listed in Section 1 "Product and Company Identification" above.
<b>Environmental Precautions</b>	Keep people and animals away from and upwind of spill/leak. Keep material out of lakes, streams, ponds, and sewer drains.
<b>Methods for Containment</b>	Prevent further leakage or spillage if safe to do so.
<b>Methods for cleaning up</b>	Transfer damaged cartridges or cans to containers for later disposal. Clean and neutralize spill area, tools and equipment by washing with water and soap. Waste must be classified and labeled prior to recycling or disposal. Dispose of waste as indicated in Section 13. Rinsate may be disposed at a waste water treatment plant.

#### 7. HANDLING AND STORAGE

<b>Handling</b>	Do not contaminate other pesticides, fertilizers, water, food, or feed by storage or disposal.
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**Storage** Keep in a dry, cool and well-ventilated place. Keep away from open flames, hot surfaces and sources of ignition. Keep out of reach of children and animals. Keep/store only in original container.

**Incompatible products** None known

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### Control parameters

Chemical name	ACGIH TLV	OSHA PEL	NIOSH	Mexico
Carbon Dioxide (124-38-9)	STEL: 30000 ppm TWA: 5000 ppm	TWA: 5000 ppm TWA: 9000 mg/m <sup>3</sup>	IDLH: 40000 ppm TWA: 5000 ppm TWA: 9000 mg/m <sup>3</sup> STEL: 30000 ppm STEL: 54000 mg/m <sup>3</sup>	Mexico: TWA 5000 ppm Mexico: TWA 9000 mg/m <sup>3</sup> Mexico: STEL 15000 ppm Mexico: STEL 27000 mg/m <sup>3</sup>
Chemical name	British Columbia	Quebec	Ontario TWAEV	Alberta
Petroleum distillates, hydrotreated light (64742-47-8)	TWA: 200 mg/m <sup>3</sup> Skin	-	-	-
Carbon Dioxide (124-38-9)	TWA: 5000 ppm STEL: 15000 ppm	TWA: 5000 ppm TWA: 9000 mg/m <sup>3</sup> STEL: 30000 ppm STEL: 54000 mg/m <sup>3</sup>	TWA: 5000 ppm  STEL: 30000 ppm	TWA: 5000 ppm TWA: 9000 mg/m <sup>3</sup> STEL: 30000 ppm STEL: 54000 mg/m <sup>3</sup>

### Appropriate engineering controls

**Engineering measures** Apply technical measures to comply with the occupational exposure limits. When working in confined spaces (tanks, containers, etc.), ensure that there is a supply of air suitable for breathing and wear the recommended equipment.

### Individual protection measures, such as personal protective equipment

**Eye/Face Protection** If there is a potential for exposure to particles which could cause eye discomfort, wear chemical goggles.

**Skin and Body Protection** Wear suitable protective clothing. Protective shoes or boots.

**Hand Protection** Use protective gloves made of chemical materials such as nitrile or neoprene. Wash the outside of gloves with soap and water before reuse. Check regularly for leaks.

**Respiratory Protection** If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Respiratory protection must be provided in accordance with current local regulations.

**Hygiene measures** Clean water should be available for washing in case of eye or skin contamination. Wash skin prior to eating, drinking, chewing gum or using tobacco. Shower or bathe at the end of working. Remove and wash contaminated clothing before re-use. Launder work clothing separately from regular household laundry.

**General information** If the product is used in mixtures, it is recommended that you contact the appropriate protective equipment suppliers. These recommendations apply to the product as supplied

## 9. PHYSICAL AND CHEMICAL PROPERTIES

### Information on basic physical and chemical properties

**Appearance** Clear, Colorless Aerosolized liquid  
**Physical State** Aerosol



Color	Clear, Colorless
Odor	No information available
Odor threshold	No information available
pH	No information available
Melting point/freezing point	Not applicable
Boiling Point/Range	No information available
Flash point	Non-flammable per flame projection test.
Evaporation Rate	No information available
Flammability (solid, gas)	No information available
Flammability Limit in Air	
Upper flammability limit:	No information available
Lower flammability limit:	No information available
Vapor pressure	No information available
Vapor density	No information available
Relative density	6.69 lb/gal
Specific gravity	No information available
Water solubility	No information available
Solubility in other solvents	No information available
Partition coefficient	No information available
Autoignition temperature	No information available
Decomposition temperature	No information available
Viscosity, kinematic	No information available
Viscosity, dynamic	No information available
Explosive properties	No information available
Oxidizing properties	No information available
Molecular weight	No information available
Bulk density	No information available

## 10. STABILITY AND REACTIVITY

Reactivity	Not applicable
Chemical Stability	Stable under recommended storage conditions.
Possibility of Hazardous Reactions	None under normal processing.
Hazardous polymerization	Hazardous polymerization does not occur.
Conditions to avoid	Heat, flames and sparks.
Incompatible materials	None known.
Hazardous Decomposition Products	None known based on information supplied.

## 11. TOXICOLOGICAL INFORMATION

### Product Information

LD50 Oral	> 2000 mg/kg (rat)
LD50 Dermal	> 2000 mg/kg (rat)
LC50 Inhalation	> 2.2 mg/L (rat) 4 hr
Serious eye damage/eye irritation	Mildly irritating.
Skin corrosion/irritation	Irritating to skin.
Sensitization	May cause sensitization by skin contact

### Information on toxicological effects

Symptoms	Symptoms of overexposure may be headache, dizziness, tiredness, nausea and vomiting.
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### Delayed and immediate effects as well as chronic effects from short and long-term exposure

Chronic toxicity	Deltamethrin: Repeated or prolonged exposure may cause central nervous system effects (decrease motor activity, tremor, difficulty breathing, impaired gait and choreoathetosis).
Mutagenicity	Deltamethrin: Not genotoxic in laboratory studies.

<b>Carcinogenicity</b>	Deltamethrin: No evidence of carcinogenicity from animal studies.
<b>Neurological effects</b>	Deltamethrin: Neurobehavioral effects (tremors) were observed in studies with animals.
<b>Reproductive toxicity</b>	Deltamethrin: No toxicity to reproduction in animal studies.
<b>Developmental toxicity</b>	Deltamethrin: Not teratogenic in animal studies.
<b>STOT - single exposure</b>	Not classified.
<b>STOT - repeated exposure</b>	Not classified.
<b>Target organ effects</b>	Nervous system.
<b>Neurological effects</b>	Deltamethrin: Neurobehavioral effects (tremors) were observed in studies with animals.
<b>Aspiration hazard</b>	Potential for aspiration if swallowed.

Chemical name	ACGIH	IARC	NTP	OSHA
Deltamethrin 52918-63-5		Group 3		

**Legend:**

IARC (International Agency for Research on Cancer)

Group 3 - Not classifiable as to its carcinogenicity to humans

## 12. ECOLOGICAL INFORMATION

**Ecotoxicity**

Deltamethrin (52918-63-5)				
Active Ingredient(s)	Duration	Species	Value	Units
Deltamethrin	96 h LC50	Fish	0.26	µg/L
	48 h EC50	Crustacea	0.56	µg/L
	72 h EC50	Algae	9.1	mg/L
	21 d NOEC	Fish	0.032	µg/L
	21 d NOEC	Crustacea	0.0041	µg/L

<b>Persistence and degradability</b>	Deltamethrin: Non-persistent. Does not readily hydrolyze at pH 7 and 8. Readily hydrolyzed at pH 9. Not readily biodegradable.
<b>Bioaccumulation</b>	Deltamethrin: The substance has a potential for bioconcentration.
<b>Mobility</b>	Deltamethrin: Immobile; Not expected to reach groundwater.

## 13. DISPOSAL CONSIDERATIONS

<b>Waste disposal methods</b>	Improper disposal of excess pesticide, spray mixture, or rinsate is prohibited. If these wastes cannot be disposed of by use according to label instructions, contact appropriate disposal authorities for guidance. Proper personal protective equipment, as described in Sections 7 and 8, must be worn while handling materials for waste disposal.
<b>Contaminated Packaging</b>	Containers must be disposed of in accordance with local, state and federal regulations. Refer to the product label for container disposal instructions.

## 14. TRANSPORT INFORMATION

<b>DOT</b>	USDOT is requiring that products formerly classified as "Consumer Commodity, ORM-D" transition to "Limited Quantity" by 12/31/2020. During the transition period the 49CFR carton shipping marks may be Consumer Commodity (old) or Limited Quantity Diamond
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(new). Please prepare shipping documents to match the carton mark.

<b>UN/ID no</b>	UN1950
<b>Proper Shipping Name</b>	Consumer commodity
<b>Hazard class</b>	ORM-D

**TDG**

<b>UN/ID no</b>	UN1950
<b>Proper Shipping Name</b>	Aerosols
<b>Hazard class</b>	2.2
<b>Marine Pollutant</b>	Deltamethrin.
<b>Description</b>	UN1950, Aerosols, 2.2, Marine pollutant (Deltamethrin)
<b>Marine Pollutant</b>	Np

**ICAO/IATA**

Carton Marks: Limited quantity air, orientation arrows, Class 9 Diamond, Consumer Commodity, ID8000

<b>UN/ID no</b>	ID8000
<b>Proper Shipping Name</b>	Consumer commodity
<b>Hazard class</b>	9

**IMDG/IMO**

<b>UN/ID no</b>	UN1950
<b>Proper Shipping Name</b>	Aerosols
<b>Hazard class</b>	2.2
<b>EmS No.</b>	F-D, S-U
<b>Description</b>	UN1950, Aerosols, 2.2, Marine pollutant (Deltamethrin)

**15. REGULATORY INFORMATION****U.S. Federal Regulations****SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

**SARA 311/312 Hazard Categories**

<b>Acute health hazard</b>	Yes
<b>Chronic health hazard</b>	Yes
<b>Fire hazard</b>	No
<b>Sudden release of pressure hazard</b>	No
<b>Reactive Hazard</b>	No

**Clean Water Act**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

**FIFRA Information**

*This chemical is a pesticide product registered by the Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets, and for workplace labels of non-pesticide chemicals. Following is the hazard information as*

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*required on the pesticide label:*

**CAUTION**

*Harmful if swallowed or absorbed through the skin. Prolonged or frequently repeated skin contact may cause allergic reactions in some individuals.*

*This product is toxic to fish.*

**US State Regulations****California Proposition 65**

This product does not contain any Proposition 65 chemicals.

**U.S. State Right-to-Know Regulations**

Chemical name	New Jersey	Massachusetts	Pennsylvania
Carbon Dioxide 124-38-9	X	X	X

**International Inventories**

Chemical name	TSCA (United States)	DSL (Canada)	EINECS/ELINCS (Europe)	ENCS (Japan)	China (IECSC)	KECL (Korea)	PICCS (Philippines)	AICS (Australia)
Petroleum distillates, hydrotreated light 64742-47-8	X	X	X		X	X	X	X
Naphtha (petroleum), light alkylate 64741-66-8	X	X	X		X	X	X	X
Carbon Dioxide 124-38-9	X	X	X	X	X	X	X	X
Deltamethrin 52918-63-5			X		X	X	X	X

**Mexico - Grade**

Moderate risk, Grade 2

Chemical name	Carcinogen Status	Mexico
Carbon Dioxide		Mexico: TWA 5000 ppm Mexico: TWA 9000 mg/m <sup>3</sup> Mexico: STEL 15000 ppm Mexico: STEL 27000 mg/m <sup>3</sup>

Chemical name	Mexico - Pollutant Release and Transfer Register - Reporting Emissions for Fabrication, Process or Use -Threshold Quantities	Pollutant Release and Transfer Register - Reporting Emissions - Threshold Quantities
Carbon Dioxide	100000	100000 kg/yr

**WHMIS Statement**

This product has been classified in accordance with the Hazardous Products Regulations (HPR) and the SDS contains all the information required by the HPR.

**WHMIS Hazard Class**

A - Compressed gases  
D2B - Toxic materials



**16. OTHER INFORMATION**

NFPA	Health Hazards 2	Flammability 1	Instability 0	Special Hazards -
HMIS	Health Hazards 2*	Flammability 1	Physical hazard 0	Personal Protection X

\*Indicates a chronic health hazard.

**NFPA/HMIS Ratings Legend**

Severe = 4; Serious = 3; Moderate = 2; Slight = 1; Minimal = 0

Revision date: 2018-10-01  
Reason for revision: (M)SDS sections updated

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FMC Corporation

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**End of Safety Data Sheet**