

Control Solutions, Inc.
5903 Genoa Red Bluff
Pasadena, Texas USA 77507

In Case of Emergency, Call
Information: 1-281-892-2500
CHEMTREC: 1-800-424-9300

1. CHEMICAL IDENTIFICATION

Product Name: Permethrin SFR
Manufacturer: Control Solutions Inc.
5903 Genoa- Red Bluff
Pasadena, TX 77507
281-892-2500
EPA Registration #: 53883-90

2. HAZARDS IDENTIFICATION

Symptoms of
Toxicity: Permethrin may induce neurotoxic symptoms including diarrhea, salivation, tremors, convulsions, hyperactivity and hypersensitivity to touch or sound.

Hazardous Class: This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Danger: May cause an allergic skin reaction, genetic defects, cancer and may be fatal if swallowed and enters airways.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Material	% by weight	CAS#	OSHA PEL
Permethrin	36.80%	52645-53-1	None Established
Inert Ingredients	63.20%	-	None Established

4. FIRST AID MEASURES

General Advice: First aid providers should wear personal protective equipment to prevent exposure.

Eye Contact: Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after 5 minutes, then continue rinsing eye. Call a poison control center or doctor for further treatment advice if irritation persists.

Inhalation: Remove affected person to fresh air. If person is not breathing, call 911 and administer artificial respiration, preferably mouth-to-mouth. Call a poison control center or doctor for further treatment advice.

Ingestion: Call a poison control center immediately. Do not induce vomiting unless directed to do so by a physician. Never give anything by mouth to an unconscious person.

Dermal Contact: Wash promptly with plenty of soap and water for 15-20 minutes. Wash contaminated clothing.

Physician's Information: You may also contact SafetyCall[®] International (866) 897-8050 for emergency medical treatment information.

5. FIRE FIGHTING MEASURES

Flash Point: 44° C / 111° F

Extinguishing Media: CO₂, water fog, foam

Procedures: Use self-contained breathing apparatus. Cool the fire exposed areas and equipment.

Unusual Fire Hazards: May release irritating and toxic gases due to thermal decomposition or combustion.
Upper Flammability Limit: N/A
Lower Flammability limit: N/A

6. ACCIDENTAL RELEASE MEASURES

Absorbent Materials: Universal or oil-only absorbent pads, vermiculite, absorbent booms, or clay granules.
Containment: Do not discharge into municipal wastewater or public storm drains. Eliminate runoff as much as possible.
Waste Disposal: Dispose of waste material in municipal land fill or through licensed TSDF. Open dumping is prohibited.
Reporting: Report all major spills and uncontrolled releases to proper local, state, and federal agencies. RQ – as a mixture, 5 pounds or .5 gal.

7. HANDLING AND STORAGE

Storage Conditions: Do not store near feed, food, or within the reach of children. Containers should be stored in a cool, dry, well-ventilated area away from flammable materials and ignition sources. Keep away from oxidizing agents and alkaline material.
Special Handling: Exercise caution to prevent damage to or leakage from the containers. Workers should practice good hygiene to avoid accidental ingestion.
Container Disposal: Do not reuse empty containers. Triple rinse (or equivalent), then offer for recycling or render unusable and dispose of in municipal landfill or with licensed TSDF.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Routes of Exposure: Dermal, eye, inhalation
Ingestion: Permethrin is a neurotoxin. Ingestion may induce neurotoxic symptoms including diarrhea, salivation, tremors, convulsions, hyperactivity and hypersensitivity to touch or sound.
Other Comments: Avoid cross contamination. Always wash hands thoroughly after handling pesticides and before eating, drinking, or smoking.
Engineering Controls: Investigate engineering techniques to reduce exposures. Local mechanical exhaust ventilation is preferred. Consult ACGIH ventilation manual or NFPA Standard 91 for design of exhaust systems.
Eye Protection: ANSI approved goggles or safety glasses with side shields.
Respiratory Protection: Where airborne exposure is likely, use NIOSH approved respiratory protection equipment appropriate to the material and/or its components. Full facepiece equipment is recommended and, if used, replaces the need for face shield and/or chemical goggles. If exposures cannot be kept at a minimum with engineering controls, consult respirator manufacturer to determine appropriate type of equipment for given application. Observe respirator use limitations specified by NIOSH or the manufacturer. For emergency and other conditions where there may be a potential for significant exposure, use an approved full face positive-pressure, self-contained breathing apparatus. Respiratory protection programs must comply with 29 CFR 1910.134.
Dermal Protection: Chemical resistant gloves, long sleeves, pants, and shoes, plus socks.

9. PHYSICAL AND CHEMICAL PROPERTIES

Odor: Mild (petroleum)
Physical State: Liquid
Color: Amber.
Vapor Pressure: N/A

Bulk Density:	N/A
Viscosity:	N/A
Melting Point:	N/A
Flash Point:	44° C / 111° F
Specific Gravity:	1.039 @ 20°C
pH:	6.1
Water solubility:	Disperses in water.
Refractive Index:	N/A

10. STABILITY AND REACTIVITY

Chemical Stability:	Stable under normal conditions.
Hazardous Polymerization:	Will not occur.
Decomposition Products:	Carbon Oxides.

11. TOXICOLOGICAL DATA

EPA Toxicity Category:	Signal word "Caution"
Oral:	(Permethrin) LD ₅₀ >5000 mg/kg/kg
Dermal:	LD ₅₀ >20,000 mg/kg
Inhalation:	LC ₅₀ >20 mg/L
NFPA Classifications:	Fire – 0 Health – 1 Reactivity – 0
Other Comments:	Avoid cross-contamination.

12. ECOLOGICAL DATA

Aquatic:	LC ₅₀ (96h) for rainbow trout: 2.5 µg/L
(Permethrin)	LC ₅₀ (96h) for Bluegill: 1.8 µg/L
Avian:	LD ₅₀ Bobwhite quail: >10,000 mg/kg
(Permethrin)	
Bioaccumulation:	Potentially but unlikely to bioaccumulate due to high acute toxicity.
Summary:	Permethrin in soil is stable over a wide range of pH values when applied at agricultural use rates. Permethrin has a moderate rate of degradation in soil. At termiticidal use rates, permethrin degrades at a slower rate which is governed by soil characteristics such as soil type, microbial population concentration in soil and aerobic conditions of the soil. Due to its high affinity for organic matter, bioconcentrate (BCF=50) due to the ease with which it is metabolized. This product is extremely toxic to fish and aquatic arthropods. Marine species are often more sensitive than freshwater species. Bacteria, algae, mollusks and amphibians are much more tolerant of permethrin than the fish and arthropods. Care should be taken to avoid contamination of the aquatic environment. Permethrin is slightly toxic to birds and oral L ₅₀ values are greater than 3,600 mg/kg. Longer dietary studies showed that concentrations of up to 500 ppm in the diet had no effect on bird reproduction. Permethrin is extremely toxic to fish, aquatic invertebrates and honey bees.

13. DISPOSAL CONSIDERATION

Note:	Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide or rinsate is a violation of Federal law.
Pesticide Disposal:	Must be disposed of at or by an approved waste disposal facility.
Container Disposal:	Non-refillable container. Do not reuse or refill this container. then dispose of container in a sanitary landfill or, if allowed by the State and local authorities, by burning. If burned, stay out of smoke. If empty: Place in trash or offer for recycling if available.

If partly filled: Call your local solid waste agency for disposal instructions. Unless otherwise instructed, place in trash. Never place unused product down any indoor or outdoor drain.

14. TRANSPORTION DATA

DOT: Not Regulated.
IATA: Flammable liquid, n.o.s. (Hydrocarbon), UN1993, Class 3, PG III, marine pollutant.
IMDG: Flammable liquid, n.o.s. (Hydrocarbon), UN1993, Class 3, PG III, marine pollutant.

15. REGULATORY DATA

Section 302/TPQ: Not regulated under section 302.
(emergency planning)
Section 304/EHS RQ: Not regulated under section 304.
(release notification)
CERCLA RQ: Not regulated by CERCLA.
(release notification)
Section 311/Tier II: Acute health hazard.
(SDS submission)
Section 313/TR Chemicals: This product contains a chemical or chemicals which are subject to the reporting requirements of the Act and Title 40n of the Code of Federal Regulations, Part 372.
RCRA Haz-Waste Code(s): Not a RCRA hazardous waste.
CAA TQ: Not regulated under the CAA.
(air emissions)

16. OTHER INFORMATION

Date of Last Revision: August 10, 2015

NFPA and HMIS ratings assigned to this product are based on the hazards of its ingredient (s). Because the customer is most aware of the application of the product, he must ensure that the proper personal protective equipment (PPE) is provided consistent with information contained in the product SDS.

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