



Safety Data Sheet

Section 1: Identification

Product identifier

- Product Name** • **Zodiac FleaTrol Carpet & Upholstery Aerosol Spray**
- Synonyms** • 100504139; 100504191; 60910B; 60920F; EPA Reg. No.: 2724-483; SANDOZ 9404 SPRAY
- Product Description** • Opaque liquid aerosol spray.

Relevant identified uses of the substance or mixture and uses advised against

- Recommended use** • Insect growth regulator. Insecticide.
- Restrictions on use** • Avoid inhalation of vapors or fumes. Do not take internally. Keep out of the reach of children. Avoid contact with skin, eyes and clothing. Keep away from heat, sparks and flame. Do not allow product to enter drain or any body of water.

Details of the supplier of the safety data sheet

- Manufacturer** • Wellmark International
1501 E. Woodfield Road, Suite 200W
Schaumburg, IL 60173
United States

Emergency telephone number

- Manufacturer** • 1-800-248-7763
- Manufacturer (Transportation)** • 1-800-424-9300 - CHEMTREC
- Manufacturer (Transportation)** • 1-703-527-3887 - CHEMTREC - Outside North America - Collect Calls Accepted

Section 2: Hazard Identification

United States (US)

According to: OSHA 29 CFR 1910.1200 HCS

Classification of the substance or mixture

- OSHA HCS 2012** • Aspiration 1
Specific Target Organ Toxicity Single Exposure 3: Narcotic Effects
Flammable Aerosols 2
Skin Irritation 2
Compressed Gas

Label elements

OSHA HCS 2012

DANGER



- Hazard statements** • Causes skin irritation
 May be fatal if swallowed and enters airways
 May cause drowsiness or dizziness
 Flammable aerosol
 Contains gas under pressure; may explode if heated

Precautionary statements

- Prevention** • Wash thoroughly after handling.
 Wear protective gloves.
 Avoid breathing dust, fume, gas, mist, vapors and/or spray.
 Use only outdoors or in a well-ventilated area.
 Keep away from heat, sparks, open flames and/or hot surfaces. - No smoking.
 Do not spray on an open flame or other ignition source.
 Pressurized container: Do not pierce or burn, even after use.

- Response** • IF ON SKIN: Wash with plenty of soap and water.
 If skin irritation or rash occurs: Get medical advice/attention.
 Take off contaminated clothing and wash before reuse.
 IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.
 Do NOT induce vomiting.
 IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a poison control center or doctor if you feel unwell.

- Storage/Disposal** • Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.
 Store locked up.
 Store in a well-ventilated place. Keep container tightly closed.
 Protect from sunlight. Do not expose to temperatures exceeding 50°C/122°F.

Other hazards

OSHA HCS 2012

- This product is toxic to fish. Under United States Regulations (29 CFR 1910.1200 - Hazard Communication Standard), this product is considered hazardous.

Section 3 - Composition/Information on Ingredients

Substances

- Material does not meet the criteria of a substance according to United Nations Globally Harmonized System of Classification and Labeling of Chemicals (GHS)

Mixtures

Composition		
Chemical Name	Identifiers	%
(s)-Methoprene	CAS:65733-16-6	0.09%
Permethrin	CAS:52645-53-1	0.5%
Distillates (petroleum), hydrotreated light	CAS:64742-47-8	13.54%
Propane	CAS:74-98-6	7.08%
Butane	CAS:106-97-8	6.92%
Other ingredients	NDA	71.87%

Section 4: First-Aid Measures

Description of first aid measures

- Inhalation**
- IF INHALED: Remove person to fresh air and keep at rest in a position comfortable for breathing. Call a poison control center or doctor if you feel unwell.
- Skin**
- IF ON SKIN: Wash with plenty of soap and water. If irritation or rash occurs, get medical advice/attention.
- Eye**
- IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if symptoms occur.
- Ingestion**
- IF SWALLOWED: Aspiration hazard - do NOT induce vomiting. Call a poison control center or doctor immediately for treatment advice.

Most important symptoms and effects, both acute and delayed

- Causes skin irritation, aspiration hazard, may cause dizziness or drowsiness if inhaled. Refer to Section 11 - Toxicological Information.

Indication of any immediate medical attention and special treatment needed

- Notes to Physician**
- Contains petroleum distillate vomiting may cause aspiration pneumonia. Treat symptomatically and supportively.

Section 5: Fire-Fighting Measures

Extinguishing media

- Suitable Extinguishing Media**
- LARGE FIRE: Water spray, fog or regular foam.
 - SMALL FIRES: Dry chemical, CO₂, water spray or regular foam.
- Unsuitable Extinguishing Media**
- Avoid heavy hose streams.
- Firefighting Procedures**
- Flammable aerosols exposed to high temperatures may rupture, rocket and cause secondary hazards. As an immediate precautionary measure, isolate spill or leak area for at least 50 meters (150 feet) in all directions.

Special hazards arising from the substance or mixture

- Unusual Fire and Explosion Hazards**
- At temperatures above 130°F, container may rupture. Flammable aerosols exposed to high temperatures may rupture, rocket and cause secondary hazards.
- Hazardous Combustion Products**
- Thermal degradation may produce oxides of carbon, oxides of nitrogen and/or volatile hydrocarbon vapors.

Advice for firefighters

- Wear positive pressure self-contained breathing apparatus (SCBA).

Section 6 - Accidental Release Measures

Personal precautions, protective equipment and emergency procedures

- Personal Precautions**
- Approach leaking or punctured pressurized containers cautiously. Isolate leaking container from all sources of ignition. Avoid breathing fumes. Ventilate enclosed areas.
- Emergency Procedures**
- ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area). Avoid unnecessary personnel and equipment traffic in the spill area. Turn off electric power to area. Stay upwind. Ventilate closed spaces before entering. Do not allow runoff into water, storm drains or drainage ditches.

Environmental precautions

- Avoid run off to waterways and sewers.

Methods and material for containment and cleaning up

Containment/Clean-up Measures

- Keep away from fire, sparks and heated surfaces.
SMALL SPILLS: Take up with sand or other non-combustible absorbent material and place into containers for later disposal.

Section 7 - Handling and Storage**Precautions for safe handling****Handling**

- Do not use or store near heat or open flame. Do not smoke while using this product. Contents under pressure, do not crush, puncture or incinerate. Avoid breathing fumes.

Conditions for safe storage, including any incompatibilities**Storage**

- Store in a cool, dry place. Keep out of reach of children. Keep away from sources of ignition – No Smoking. Store locked up. Store in a well-ventilated place. Keep container tightly closed. Keep at a temperature not exceeding 122°F (50°C). Do not store at a temperature below 32°F. Keep away from fire, sparks and heated surfaces. NFPA Aerosol Classification: Level 1. Protect from sunlight.

Incompatible Materials or Ignition Sources

- Heat, sparks, open flame. Oxidizing agents.

Section 8 - Exposure Controls/Personal Protection**Control parameters**

Exposure Limits/Guidelines				
	Result	ACGIH	NIOSH	OSHA
Butane (106-97-8)	STELs	1000 ppm STEL	Not established	Not established
	TWAs	Not established	800 ppm TWA; 1900 mg/m3 TWA	Not established
Propane (74-98-6)	TWAs	1000 ppm TWA (listed under Aliphatic hydrocarbon gases: Alkane C1-4)	1000 ppm TWA; 1800 mg/m3 TWA	1000 ppm TWA; 1800 mg/m3 TWA

Exposure controls**Engineering Measures/Controls**

- Use adequate ventilation to remove vapors (fumes, dust etc)

Personal Protective Equipment**Pictograms****Respiratory**

- In case of insufficient ventilation, wear suitable NIOSH approved respiratory protection.

Eye/Face

- Wear safety glasses.

Hands

- Wear protective gloves.

Skin/Body

- If prolonged exposure is anticipated, it is recommended for handlers to wear appropriate clothing to prevent skin contact.

Environmental Exposure Controls

- Controls should be engineered to prevent release to the environment, including procedures to prevent spills, atmospheric release and release to waterways.

Section 9 - Physical and Chemical Properties**Information on Physical and Chemical Properties**

Material Description			
Physical Form	Aerosol	Appearance/Description	Opaque liquid aerosol spray.
Color	Opaque	Odor	No data available.

Aerosol Type	Spray	Odor Threshold	No data available
General Properties			
Boiling Point	No data available	Melting Point/Freezing Point	No data available
Decomposition Temperature	No data available	Heat of Decomposition	No data available
pH	No data available	Specific Gravity/Relative Density	= 0.82 @ 70 F(21.1111 C) Water=1
Water Solubility	No data available	Viscosity	No data available
Volatility			
Vapor Pressure	No data available	Vapor Density	No data available
Evaporation Rate	No data available	VOC (Vol.)	14 %
Flammability			
Flash Point	Not relevant	UEL	No data available
LEL	No data available	Heat of Combustion (ΔH_c)	6.96 kJ/g
Flame Extension	0 in	Flammability (solid, gas)	Flammable aerosol.
Environmental			
Octanol/Water Partition coefficient	No data available		

Section 10: Stability and Reactivity

Reactivity

- Non-reactive under normal handling and storage conditions.

Chemical stability

- Stable under normal temperatures and pressures.

Possibility of hazardous reactions

- Flammable, aerosols exposed to high temperatures may rupture, rocket and cause secondary hazards.

Conditions to avoid

- Heat, sparks, open flame. Excess heat.

Incompatible materials

- Heat, strong acids, strong bases and oxidizing agents.

Hazardous decomposition products

- Hazardous decomposition may occur when heated producing oxides of carbon and nitrogen, volatile hydrocarbon vapors.

Section 11 - Toxicological Information

Information on toxicological effects

	CAS	
Zodiac FleaTrol Carpet & Upholstery Aerosol Spray	NDA	Acute Toxicity: Ingestion/Oral-Rat LD50 • >5100 mg/kg 14 Day(s); Inhalation-Rat LC50 • >2.7 mg/L 4 Hour(s); Skin-Rabbit LD50 • >2100 mg/kg; Irritation: Eye-Rabbit • Essentially non-irritating; Skin-Rabbit • Mild irritation

GHS Properties	Classification
Respiratory sensitization	OSHA HCS 2012 • Classification criteria not met
Serious eye damage/Irritation	OSHA HCS 2012 • Classification criteria not met
	OSHA HCS 2012 • Acute Toxicity - Dermal - Classification criteria not met; Acute

Acute toxicity	Toxicity - Inhalation - Classification criteria not met; Acute Toxicity - Oral - Classification criteria not met
Aspiration Hazard	OSHA HCS 2012 • Aspiration 1
Carcinogenicity	OSHA HCS 2012 • Classification criteria not met
Skin corrosion/Irritation	OSHA HCS 2012 • Skin Irritation 2
Skin sensitization	OSHA HCS 2012 • Classification criteria not met
STOT-RE	OSHA HCS 2012 • Classification criteria not met
STOT-SE	OSHA HCS 2012 • Specific Target Organ Toxicity Single Exposure 3: Narcotic Effects
Toxicity for Reproduction	OSHA HCS 2012 • Classification criteria not met
Germ Cell Mutagenicity	OSHA HCS 2012 • Classification criteria not met

Potential Health Effects

Inhalation

- Acute (Immediate)**
 - May cause drowsiness and dizziness.
- Chronic (Delayed)**
 - No data available

Skin

- Acute (Immediate)**
 - Causes skin irritation.
- Chronic (Delayed)**
 - No data available.

Eye

- Acute (Immediate)**
 - Under normal conditions of use, no health effects are expected.
- Chronic (Delayed)**
 - No data available

Ingestion

- Acute (Immediate)**
 - Aspiration Hazard - may be fatal if swallowed and enters airways.
- Chronic (Delayed)**
 - No data available

Mutagenic Effects

- Permethrin did not produce any mutagenic effects when tested in the Ames assay. Methoprene has been tested and found negative for mutagenicity potential.

Carcinogenic Effects

- Permethrin is not classified as carcinogen by NTP, IARC and OSHA. Methoprene is not classified as carcinogen by NTP, IARC and OSHA.

Reproductive Effects

- Permethrin did not cause developmental toxicity in rats and rabbits. Methoprene is not a teratogenic compound. The NOEL for maternal and embryotoxicity in rabbits was 200 mg/kg/day. The NOEL for reproductive effects in rats was 500 ppm.

Section 12 - Ecological Information

Toxicity

Components		
(s)-Methoprene (0.09%)	65733-16-6	Aquatic Toxicity-Fish: 96 Hour(s) LC50 <i>Rainbow Trout</i> 0.76 mg/L [Acute] 96 Hour(s) LC50 <i>Blue Gill</i> >0.37 mg/L [Acute] NOEC <i>Fathead minnow</i> 0.048 mg/L [Chronic] Aquatic Toxicity-Crustacea: NOEC <i>Mysid shrimp</i> 0.014 mg/L [Chronic] 96 Hour(s) LC50 <i>Mysid shrimp</i> 0.11 mg/L [Acute] 48 Hour(s) LC50 <i>Daphnia magna</i> 0.36 mg/L [Acute]
Permethrin (0.5%)	52645-53-1	Aquatic Toxicity-Fish: 96 Hour(s) LC50 <i>Blue gill</i> 0.00079 mg/L [Acute] 96 Hour(s) LC50 <i>Atlantic silverside</i> 0.0022 mg/L [Acute] NOEC <i>Fathead minnow</i> 0.0003 mg/L [Chronic] NOEC <i>Sheepshead minnow</i> 0.00083 mg/L [Chronic] Aquatic Toxicity-Crustacea: NOEC <i>Daphnia magna</i> 0.000039 mg/L [Chronic] NOEC <i>Mysid shrimp</i> 0.000011 mg/L [Chronic]

LC50 *Hexagenia bilineata* 0.0001 mg/L [Acute]
 96 Hour(s) LC50 *Mysid shrimp* 0.000019 mg/L [Acute]

Persistence and degradability

- Methoprene degrades rapidly in sunlight, both in water and on inert surfaces. The pesticide also is metabolized rapidly in soil and does not leach. Thus, it should not persist in soil or contaminate ground water. Permethrin has a moderate rate of degradation in soil and half-life is related to soil type, microbial population, concentration in the soil and the aerobic condition of the soil.

Bioaccumulative potential

- Permethrin has a Log Pow of 6.1, but because of the ease with which biological systems degrade the molecule, the potential for bioconcentration and accumulation in the environment is low (BCF = 500).

Mobility in Soil

- (s)-Methoprene: 10-14 days, rapidly hydrolyzed in soil. Permethrin has a high affinity for organic matter (Koc = 86,000), there is little potential for movement in soil or entry into groundwater.

Other adverse effects

Potential Environmental Effects

- This product is toxic to fish.

Section 13 - Disposal Considerations

Waste treatment methods

Product waste

- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations. Do not allow entry into storm drains, drainage ditches, gutters or surface waters.

Packaging waste

- Dispose of content and/or container in accordance with local, regional, national, and/or international regulations. Do not puncture or incinerate.

Section 14 - Transport Information

	UN number	UN proper shipping name	Transport hazard class (es)	Packing group	Environmental hazards
DOT	UN1950	Aerosols	2.1	Not Applicable	Marine Pollutant
IMO/IMDG	UN1950	Aerosols	2.1	Not Applicable	Marine Pollutant
IATA/ICAO	UN1950	Aerosols, flammable	2.1	Not Applicable	Acute Aquatic Toxicity

Special precautions for user • None specified.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code • No data available

Other information

IMO/IMDG • No data available

IATA/ICAO • No data available

Section 15 - Regulatory Information

Safety, health and environmental regulations/legislation specific for the substance or mixture

SARA Hazard Classifications • Acute, SARA Title III Section 313

FIFRA – Pesticide Labeling

This chemical is a pesticide product registered by the United States 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 (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

CAUTION

- Precautionary Statements** • KEEP OUT OF THE REACH OF CHILDREN.
- Hazards to Humans and Domestic Animals** • HAZARDS TO HUMANS AND DOMESTIC ANIMAL - CAUTION: Harmful if absorbed through skin. Avoid contact with skin, eyes, or clothing. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum using tobacco, or using the toilet . Remove and wash contaminated clothing before reuse. Consult a veterinarian before using this product on debilitated, aged, pregnant, animals on medication, or nursing animals. Sensitivities may occur after using ANY pesticide product for pets. If signs of sensitivity occur, bathe your pet with mild soap and rinse with large amounts of water. If signs continue, consult a veterinarian immediately.
- First Aid** • IF SWALLOWED: Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by a poison control center or a doctor. Do not give anything by mouth to an unconscious person. IF INHALED: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. IF IN EYES: Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. IF ON SKIN OR CLOTHING: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes.
- Environmental Hazards** • FOR OCCUPATIONAL USE: ENVIRONMENTAL HAZARDS: This product is extremely toxic to aquatic organisms, including fish and invertebrates. Do not apply directly to water, or to areas where surface water is present or to intertidal areas below the mean water mark. Do not apply when weather conditions favor drift from treated areas. This pesticide is highly toxic to bees exposed to direct treatment on blooming crops or weeds. Do not apply this product or allow it to drift to blooming crops or weeds while bees are actively visiting the treatment area. FOR CONSUMER USE: ENVIRONMENTAL HAZARDS: This product is extremely toxic to aquatic organisms, including fish and invertebrates. Do not apply directly to or near water. Drift and runoff may be hazardous to fish in water adjacent to treated areas. See Directions for Use for additional precautions and requirements.
- Physical or Chemical Hazards** • Contents under pressure. Do not use or store near open flame. Do not puncture or incinerate container. Exposure to temperatures above 130°F may cause bursting.

Inventory		
Component	CAS	TSCA
(s)-Methoprene	65733-16-6	No
Butane	106-97-8	Yes
Distillates (petroleum), hydrotreated light	64742-47-8	Yes
Permethrin	52645-53-1	No
Propane	74-98-6	Yes

United States

Environment

U.S. - CERCLA/SARA - Section 313 - Emission Reporting

• Propane	74-98-6	Not Listed
• Butane	106-97-8	Not Listed
• (s)-Methoprene	65733-16-6	Not Listed

• Permethrin	52645-53-1	1.0 % de minimis concentration
• Distillates (petroleum), hydrotreated light	64742-47-8	Not Listed

Section 16 - Other Information

Revision Date	<ul style="list-style-type: none">• 14/October/2015
Last Revision Date	<ul style="list-style-type: none">• 14/October/2015
Preparation Date	<ul style="list-style-type: none">• 14/October/2015
Disclaimer/Statement of Liability	<ul style="list-style-type: none">• The information and statements herein are believed to be reliable but are not to be construed as a warranty or representation for which we assume legal responsibility. Users should undertake sufficient verification and testing to determine the suitability for their own particular purpose of any information or products referred to herein. NO WARRANTY OF FITNESS FOR A PARTICULAR PURPOSE IS MADE.
