Bonide Total Release Flea Fogger
Safety Data Sheet
according to Federal Register / Vol. 77, No. 58 / Monday, March 26, 2012 / Rules and Regulations

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Product name: Bonide Total Release Flea Fogger
Product code: 102116234

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

Use of the substance/mixture: Insecticide

1.3. Details of the supplier of the safety data sheet

Bonide Products, Inc.
6301 Sutliff Road
Oriskany, NY 13424
T (315) 736-8231
www.bonide.com

1.4. Emergency telephone number

Emergency number: CHEMTREC - 1 (800) 424-9300 and/or 1 (703) 527-3887

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification (GHS-US)
Flam. Liq. 4 H227
Muta. 1B H340
Carc. 1A H350

2.2. Label elements

GHS-US labeling
Hazard pictograms (GHS-US):

![GHS08]

Signal word (GHS-US): Danger
Hazard statements (GHS-US):
H227 - Combustible liquid
H351 - Suspected of causing cancer.
H341 - Suspected of causing genetic defects.

Precautionary statements (GHS-US):
P201 - Obtain special instructions before use
P202 - Do not handle until all safety precautions have been read and understood
P210 - Keep away from sparks/open flames/hot surfaces. - No smoking
P280 - Wear protective gloves/eye protection
P308+P313 - IF exposed or concerned: Get medical advice/attention
P370+P378 - In case of fire: Use foam, carbon dioxide or dry chemical for extinction
P403+P235 - Store in a well-ventilated place. Keep cool
P405 - Store locked up
P501 - Dispose of contents/container to in accordance with local/regional regulations

2.3. Other hazards

No additional information available

2.4. Unknown acute toxicity (GHS-US)

No data available

SECTION 3: Composition/information on ingredients

<table>
<thead>
<tr>
<th>Name</th>
<th>Product identifier</th>
<th>%</th>
<th>Classification (GHS-US)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Petroleum gases, liquefied, sweetened</td>
<td>(CAS No) 68476-86-8</td>
<td>25 - 50</td>
<td>Flam. Gas 1, H220 Muta. 1B, H340 Carc. 1A, H350</td>
</tr>
<tr>
<td>Isopar-m</td>
<td>(CAS No) 64742-47-8</td>
<td>10</td>
<td>Flam. Liq. 4, H227</td>
</tr>
<tr>
<td>Permethrin</td>
<td>(CAS No) 52645-53-1</td>
<td>0.4</td>
<td>Not classified</td>
</tr>
</tbody>
</table>
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**Name** | **Product identifier** | **%** | **Classification (GHS-US)**
--- | --- | --- | ---
Ethylhexylbicycloheptene Dicarboximide (CAS No) 113-48-4 | 0.38 | Not classified
2-(1-methyl-2-(4-phenoxyphenoxy)ethoxy)pyridine (CAS No) 95737-88-1 | 0.1 | Aquatic Acute 1, H400 Aquatic Chronic 1, H410
Pyrethrins (CAS No) 8003-34-7 | 0.05 | Acute Tox. 3 (Oral), H301 Acute Tox. 3 (Inhalation: vapour), H331

**SECTION 4: First aid measures**

4.1. **Description of first aid measures**

First-aid measures general: Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).

First-aid measures after inhalation: Assure fresh air breathing. Allow the person to rest.

First-aid measures after skin contact: Remove affected clothing and wash all exposed skin area with mild soap and water, followed by warm water rinse. Consult a doctor/medical service if you feel unwell.

First-aid measures after eye contact: Rinse immediately with plenty of water. Obtain medical attention if pain, blinking or redness persist.

First-aid measures after ingestion: Rinse mouth. Do NOT induce vomiting. Obtain emergency medical attention.

4.2. **Most important symptoms and effects, both acute and delayed**

Symptoms/injuries: May cause genetic defects.

Symptoms/injuries after inhalation: May cause cancer by inhalation.

4.3. **Indication of any immediate medical attention and special treatment needed**

No additional information available

**SECTION 5: Firefighting measures**

5.1. **Extinguishing media**


Unsuitable extinguishing media: Do not use a heavy water stream.

5.2. **Special hazards arising from the substance or mixture**

Fire hazard: Combustible liquid.

Explosion hazard: May form flammable/explosive vapor-air mixture.

5.3. **Advice for firefighters**

Firefighting instructions: Use water spray or fog for cooling exposed containers. Exercise caution when fighting any chemical fire. Avoid (reject) fire-fighting water to enter environment.

Protection during firefighting: Do not enter fire area without proper protective equipment, including respiratory protection.

**SECTION 6: Accidental release measures**

6.1. **Personal precautions, protective equipment and emergency procedures**

General measures: Remove ignition sources. Use special care to avoid static electric charges.

6.1.1. **For non-emergency personnel**

Emergency procedures: Evacuate unnecessary personnel.

6.1.2. **For emergency responders**

Protective equipment: Equip cleanup crew with proper protection.

Emergency procedures: Ventilate area.

6.2. **Environmental precautions**

Prevent entry to sewers and public waters.

6.3. **Methods and material for containment and cleaning up**

Methods for cleaning up: Soak up spills with inert solids, such as clay or diatomaceous earth as soon as possible. Collect spillage. Store away from other materials.

6.4. **Reference to other sections**

See Heading 8. Exposure controls and personal protection.
SECTION 7: Handling and storage

7.1 Precautions for safe handling

Additional hazards when processed: Handle empty containers with care because residual vapors are flammable. Keep away from ignition sources. No smoking.

Precautions for safe handling:
- Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapor. Do not handle until all safety precautions have been read and understood. Eliminate all ignition sources if safe to do so.

7.2 Conditions for safe storage, including any incompatibilities

Storage conditions: Store in original container. Keep container closed when not in use. Keep in fireproof place.

Incompatible products: Strong bases. Strong acids.

Incompatible materials: Sources of ignition.

7.3 Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Pyrethrins (8003-34-7)

<table>
<thead>
<tr>
<th>USA ACGIH</th>
<th>ACGIH TWA (mg/m³)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>5 mg/m³</td>
</tr>
</tbody>
</table>

8.2 Exposure controls

Personal protective equipment: Avoid all unnecessary exposure.

Hand protection: Wear protective gloves.

Eye protection: Chemical goggles or safety glasses.

Respiratory protection: Wear approved mask.

Other information: When using, do not eat, drink or smoke.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state: Liquid

Color: Milky emulsion.

Odor: Solvent odor.

Odor threshold: No data available

pH: 7.2

Relative evaporation rate (butyl acetate=1): No data available

Melting point: No data available

Freezing point: No data available

Boiling point: No data available

Flash point: No data available

Self ignition temperature: No data available

Decomposition temperature: No data available

Flammability (solid, gas): No data available

Vapor pressure: No data available

Relative vapor density at 20 °C: No data available

Relative density: 0.969

Solubility: Immiscible in water.

Log Pow: No data available

Log Kow: No data available

Viscosity, kinematic: No data available

Viscosity, dynamic: No data available

Explosive properties: No data available

Oxidizing properties: No data available

Explosive limits: No data available
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9.2. Other information
No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity
No additional information available

10.2. Chemical stability
Stable under normal conditions.

10.3. Possibility of hazardous reactions
Not established.

10.4. Conditions to avoid
Extremely high or low temperatures. Open flame. Sparks.

10.5. Incompatible materials
Strong acids. Strong bases.

10.6. Hazardous decomposition products
Carbon monoxide. Carbon dioxide. May release flammable gases.

SECTION 11: Toxicological information

11.1. Information on toxicological effects
Acute toxicity: Not classified

<table>
<thead>
<tr>
<th>Pyrethrins (8003-34-7)</th>
</tr>
</thead>
<tbody>
<tr>
<td>LD50 oral rat: 200 mg/kg (Rat)</td>
</tr>
<tr>
<td>LC50 inhalation rat (mg/l): 3.4 mg/l/4h (Rat)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Permethrin (52645-53-1)</th>
</tr>
</thead>
<tbody>
<tr>
<td>LD50 oral rat: &gt; 383 mg/kg (Rat)</td>
</tr>
<tr>
<td>LD50 dermal rat: 4000 mg/kg (Rat)</td>
</tr>
<tr>
<td>LD50 dermal rabbit: &gt; 2000 mg/kg (Rabbit)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Isopar-m (64742-47-8)</th>
</tr>
</thead>
<tbody>
<tr>
<td>LD50 dermal rabbit: &gt; 5000 mg/kg body weight (Rabbit; Literature)</td>
</tr>
</tbody>
</table>

- Skin corrosion/irritation: Not classified
  pH: 7.2
- Serious eye damage/irritation: Not classified
  pH: 7.2
- Respiratory or skin sensitization: Not classified
- Germ cell mutagenicity: May cause genetic defects.
- Carcinogenicity: May cause cancer.

<table>
<thead>
<tr>
<th>Permethrin (52645-53-1)</th>
</tr>
</thead>
<tbody>
<tr>
<td>IARC group: 3 - Not Classifiable</td>
</tr>
</tbody>
</table>

- Reproductive toxicity: Not classified
- Specific target organ toxicity (single exposure): Not classified
- Specific target organ toxicity (repeated exposure): Not classified
- Aspiration hazard: Not classified
- Potential Adverse human health effects and symptoms: Based on available data, the classification criteria are not met.
- Symptoms/injuries after inhalation: May cause cancer by inhalation.

SECTION 12: Ecological information

12.1. Toxicity

<table>
<thead>
<tr>
<th>Pyrethrins (8003-34-7)</th>
</tr>
</thead>
<tbody>
<tr>
<td>LC50 fish 1: 0.049 mg/l (96 h; Lepomis macrochirus)</td>
</tr>
<tr>
<td>Chemical</td>
</tr>
<tr>
<td>----------</td>
</tr>
<tr>
<td>Pyrethrins (8003-34-7)</td>
</tr>
<tr>
<td></td>
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### 12.2 Persistence and degradability

**Bonide Total Release Flea Fogger**

<table>
<thead>
<tr>
<th>Chemical</th>
<th>Persistence and degradability</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pyrethrins (8003-34-7)</td>
<td>Not established.</td>
</tr>
<tr>
<td>Permethrin (52645-53-1)</td>
<td>Readily biodegradable in water.</td>
</tr>
<tr>
<td>Isopar-m (64742-47-8)</td>
<td>Readily biodegradable in water. Adsorbs into the soil.</td>
</tr>
</tbody>
</table>

**Ethylhexylbicycloheptene Dicarboximide (113-48-4)**

<table>
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<tr>
<th>Chemical</th>
<th>Persistence and degradability</th>
</tr>
</thead>
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<td>Pyrethrins (8003-34-7)</td>
<td>Not established.</td>
</tr>
<tr>
<td>Permethrin (52645-53-1)</td>
<td>High potential for bioaccumulation (Log Kow &gt; 5).</td>
</tr>
<tr>
<td>Isopar-m (64742-47-8)</td>
<td>High potential for bioaccumulation (Log Kow &gt; 5).</td>
</tr>
</tbody>
</table>

### 12.3 Bioaccumulative potential

**Bonide Total Release Flea Fogger**

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<tr>
<th>Chemical</th>
<th>Bioaccumulative potential</th>
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</thead>
<tbody>
<tr>
<td>Pyrethrins (8003-34-7)</td>
<td>Not established.</td>
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<tr>
<td>Permethrin (52645-53-1)</td>
<td>High potential for bioaccumulation (Log Kow &gt; 5).</td>
</tr>
<tr>
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<td>High potential for bioaccumulation (Log Kow &gt; 5).</td>
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**Ethylhexylbicycloheptene Dicarboximide (113-48-4)**

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<th>Chemical</th>
<th>Bioaccumulative potential</th>
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<td>Pyrethrins (8003-34-7)</td>
<td>Not established.</td>
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<td></td>
</tr>
<tr>
<td>Isopar-m (64742-47-8)</td>
<td></td>
</tr>
</tbody>
</table>

### 12.4 Mobility in soil

**Bonide Total Release Flea Fogger**

<table>
<thead>
<tr>
<th>Chemical</th>
<th>Ecology - soil</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pyrethrins (8003-34-7)</td>
<td>Not toxic to plants. Toxic to bees.</td>
</tr>
<tr>
<td>Permethrin (52645-53-1)</td>
<td>Toxic to bees.</td>
</tr>
<tr>
<td>Isopar-m (64742-47-8)</td>
<td></td>
</tr>
</tbody>
</table>

### 12.5 Other adverse effects

**Bonide Total Release Flea Fogger**

Other information: Avoid release to the environment.
SECTION 13: Disposal considerations

13.1. Waste treatment methods
Waste disposal recommendations: Dispose in a safe manner in accordance with local/national regulations.
Ecology - waste materials: Avoid release to the environment.

SECTION 14: Transport information

DOT (Department of Transportation)
UN/ID Number: UN1950
Proper Shipping Name: Aerosols, non-flammable
Hazard Class: 2.2

Additional information
Other information: No supplementary information available.

SECTION 15: Regulatory 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 required on the pesticide label:

CAUTION
Breathing spray mist may be harmful.
Harmful if absorbed through the skin.
Causes moderate eye irritation.

15.1. US Federal regulations
No additional information available

15.2. International regulations
No additional information available

15.3. US State regulations
pyrethrins (8003-34-7)
U.S. - Massachusetts - Right To Know List
U.S. - New Jersey - Right to Know Hazardous Substance List
U.S. - Pennsylvania - RTK (Right to Know) List

SECTION 16: Other information

Other information: None.

Full text of H-phrases: see section 16:

<table>
<thead>
<tr>
<th>H-phrases</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acute Tox. 3 (Inhalation: vapour)</td>
<td>Acute toxicity (inhalation: vapour) Category 3</td>
</tr>
<tr>
<td>Acute Tox. 3 (Oral)</td>
<td>Acute toxicity (oral) Category 3</td>
</tr>
<tr>
<td>Aquatic Acute 1</td>
<td>Hazardous to the aquatic environment - Acute Hazard Category 1</td>
</tr>
<tr>
<td>Aquatic Chronic 1</td>
<td>Hazardous to the aquatic environment - Chronic Hazard Category 1</td>
</tr>
<tr>
<td>Carc. 1A</td>
<td>Carcinogenicity Category 1A</td>
</tr>
<tr>
<td>Flam. Gas 1</td>
<td>Flammable gases Category 1</td>
</tr>
<tr>
<td>Flam. Liq. 4</td>
<td>Flammable liquids Category 4</td>
</tr>
<tr>
<td>Muta. 1B</td>
<td>Germ cell mutagenicity Category 1B</td>
</tr>
<tr>
<td>H220</td>
<td>Extremely flammable gas</td>
</tr>
<tr>
<td>H227</td>
<td>Combustible liquid</td>
</tr>
<tr>
<td>H301</td>
<td>Toxic if swallowed</td>
</tr>
<tr>
<td>H331</td>
<td>Toxic if inhaled</td>
</tr>
<tr>
<td>H340</td>
<td>May cause genetic defects</td>
</tr>
<tr>
<td>H350</td>
<td>May cause cancer</td>
</tr>
<tr>
<td>H400</td>
<td>Very toxic to aquatic life</td>
</tr>
<tr>
<td>H410</td>
<td>Very toxic to aquatic life with long lasting effects</td>
</tr>
</tbody>
</table>

SDS US (GHS HazCom 2012) - Pesticides
This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.