# ClariFly Larvicide Livestock Premix 0.67% Safety Data Sheet

## SECTION 1: Identification

### 1.1. Identification
- **Product form**: Mixture
- **Trade name**: ClariFly Larvicide Livestock Premix 0.67%
- **Synonyms**: EPA Reg. #: 89459-2, 100542561, 100542562

### 1.2. Recommended use and restrictions on use
- **Recommended use**: Insect growth regulator.
- **Restrictions on use**: Keep out of reach of children. Avoid contact with eyes, skin or clothing. Do not use or store near heat or open flame.

### 1.3. Supplier
- **Central Garden & Pet Company**
  - 1501 E. Woodfield Road, Suite 200W
  - Schaumburg, IL 60173 - United States
  - www.centralflycontrol.com

### 1.4. Emergency telephone number
- **Emergency number**: 1-800-347-8272
- **Emergency number**: 1-800-424-9300 - CHEMTREC
- **Emergency number**: 1-703-527-3887 - CHEMTREC - Outside North America - Collect Calls Accepted

## SECTION 2: Hazard(s) identification

### 2.1. Classification of the substance or mixture
- **GHS US classification**
  - Carcinogenicity Category 1A: May cause cancer
  - Combustible Dust: May form combustible dust concentrations in air

### 2.2. GHS Label elements, including precautionary statements
- **GHS US labeling**
  - **Hazard pictograms (GHS US)**: GHS08
  - **Signal word (GHS US)**: Danger
  - **Hazard statements (GHS US)**: May form combustible dust concentrations in air
  - **Precautionary statements (GHS US)**: Obtain special instructions before use.
  - **Precautionary statements (GHS US)**: Do not handle until all safety precautions have been read and understood.
  - **Precautionary statements (GHS US)**: Wear protective gloves/protective clothing/eye protection/face protection.
  - **Precautionary statements (GHS US)**: If exposed or concerned: Get medical advice/attention.
  - **Precautionary statements (GHS US)**: Store locked up.
  - **Precautionary statements (GHS US)**: Dispose of contents/container to in accordance with local/regional/national/international regulations.

### 2.3. Other hazards which do not result in classification
- **Other hazards not contributing to the classification**: This pesticide is toxic to aquatic invertebrates. Under United States Regulations (29 CFR 1910.1200 - Hazard Communication Standard), this product is considered hazardous.

### 2.4. Unknown acute toxicity (GHS US)
- **Not applicable**

## SECTION 3: Composition/Information on ingredients

### 3.1. Substances
- **Not applicable**
3.2. Mixtures

<table>
<thead>
<tr>
<th>Name</th>
<th>Product identifier</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Diflubenzuron</td>
<td>(CAS-No.) 35367-38-5</td>
<td>0.67</td>
</tr>
<tr>
<td>Calcium monocarbonate</td>
<td>(CAS-No.) 471-34-1</td>
<td>60</td>
</tr>
<tr>
<td>Silica, crystalline - quartz</td>
<td>(CAS-No.) 14808-60-7</td>
<td>≥ 0.1</td>
</tr>
<tr>
<td>Wheat Middlings</td>
<td>(CAS-No.) N/A</td>
<td>30 – 35</td>
</tr>
<tr>
<td>Non-hazardous and/or does not meet criteria for classification</td>
<td>(CAS-No.) N/A</td>
<td>Balance</td>
</tr>
</tbody>
</table>

**SECTION 4: First-aid measures**

4.1. Description of first aid measures

First-aid measures after inhalation: IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.

First-aid measures after skin contact: IF ON SKIN: Wash with plenty of soap and water. Wash skin with plenty of water. Take off contaminated clothing. If skin irritation or rash occurs: Get medical advice/attention.

First-aid measures after eye contact: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice and attention.

First-aid measures after ingestion: IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell. Rinse mouth. Do NOT induce vomiting unless directed to do so by medical personnel.

4.2. Most important symptoms and effects (acute and delayed)

Chronic symptoms: May cause cancer.

4.3. Immediate medical attention and special treatment, if necessary

Treat symptomatically.

**SECTION 5: Fire-fighting measures**

5.1. Suitable (and unsuitable) extinguishing media


Unsuitable extinguishing media: Avoid heavy hose streams.

5.2. Specific hazards arising from the chemical

Explosion hazard: Fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source is a potential dust explosion hazard.

Reactivity: This material is friable and can create small dust particles during any handling, processing, and transfer operations. This material can form explosive dust/air suspensions that are ignitable under some conditions.

5.3. Special protective equipment and precautions for fire-fighters

Firefighting instructions: Combustible dust - use low-pressure medium fog streams to avoid dust clouds. Ventilate closed spaces before entering. Eliminate ignition sources. Move containers away from the fire area if this can be done without risk.

Protection during firefighting: Do not attempt to take action without suitable protective equipment. Self-contained breathing apparatus. Complete protective clothing.

**SECTION 6: Accidental release measures**

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Protective equipment: Avoid contact with skin, eyes and clothing. Wear suitable protective equipment.


6.1.2. For emergency responders

Protective equipment: Do not attempt to take action without suitable protective equipment. For further information refer to section 8: Exposure controls/personal protection.

Emergency procedures: Contain spill and monitor for excessive dust accumulation. ELIMINATE all ignition sources (no smoking, flames, sparks or flames in immediate area). Ventilate closed spaces before entering. Turn off electric power to area. As an immediate precautionary measure, isolate spill or leak area for at least 100 meters (330 feet) in all directions. Evacuate area.

6.2. Environmental precautions

Avoid release to the environment.
6.3. Methods and material for containment and cleaning up

Methods for cleaning up: Sweep or scoop spills, dispose of any unusable material in approved landfill. Use appropriate PPE. Dust deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration. Non-sparking tools should be used.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Precautions for safe handling: Avoid dust formation. Take all necessary technical measures to avoid or minimize the release of the product on the workplace. Provide local exhaust or general room ventilation. Wear personal protective equipment. Avoid breathing dust/fume/gas/mist/vapours/spray. Avoid contact with skin and eyes.

Hygiene measures: Do not eat, drink or smoke when using this product. Always wash hands after handling the product. Contaminated work clothing should not be allowed out of the workplace. Wash contaminated clothing before reuse.

7.2. Conditions for safe storage, including any incompatibilities


SECTION 8: Exposure controls/personal protection

8.1. Control parameters

<table>
<thead>
<tr>
<th>Substance</th>
<th>NIOSH</th>
<th>ACGIH TWA (mg/m³)</th>
<th>OSHA PEL (TWA) (mg/m³)</th>
<th>IDLH (mg/m³)</th>
<th>NIOSH REL (TWA) (mg/m³)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Calcium moncarbonate (471-34-1)</td>
<td>NIOSH REL (TWA) (mg/m³)</td>
<td>10 mg/m³ (total dust)</td>
<td>5 mg/m³ (respirable dust)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Silica, crystalline - quartz (14808-60-7)</td>
<td>ACGIH TWA (mg/m³)</td>
<td>0.025 mg/m³ (respirable particulate matter)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>OSHA PEL (TWA) (mg/m³)</td>
<td>50 µg/m³</td>
<td></td>
<td></td>
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<tr>
<td></td>
<td>US IDLH (mg/m³)</td>
<td>50 mg/m³ (respirable dust)</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>NIOSH REL (TWA) (mg/m³)</td>
<td>0.05 mg/m³ (respirable dust)</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

8.2. Appropriate engineering controls

Appropriate engineering controls: It is recommended that dust control equipment such as local exhaust ventilation and material transport systems involved in handling of this product contain explosion relief vents or an explosion suppression system or an oxygen-deficient environment. Adequate ventilation systems as needed to control concentrations of airborne contaminants below applicable threshold limit values.

Environmental exposure controls: Avoid release to the environment.

8.3. Individual protection measures/Personal protective equipment

Hand protection:
Protective gloves

Eye protection:
Safety glasses

Skin and body protection:
It is recommended for handlers to wear appropriate clothing to prevent skin contact including long sleeves, long pants, socks and shoes.

Respiratory protection:
In case of insufficient ventilation, use NIOSH approved respiratory protection.
SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
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</thead>
<tbody>
<tr>
<td>Physical state</td>
<td>Solid</td>
</tr>
<tr>
<td>Appearance</td>
<td>Variable colored granules</td>
</tr>
<tr>
<td>Color</td>
<td>Variable</td>
</tr>
<tr>
<td>Odor</td>
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</tr>
<tr>
<td>Odor threshold</td>
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</tr>
<tr>
<td>pH</td>
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</tr>
<tr>
<td>Melting point</td>
<td>No data available</td>
</tr>
<tr>
<td>Freezing point</td>
<td>Not applicable</td>
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<tr>
<td>Boiling point</td>
<td>No data available</td>
</tr>
<tr>
<td>Flash point</td>
<td>Not applicable</td>
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<tr>
<td>Relative evaporation rate (butyl acetate=1)</td>
<td>No data available</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>Non-flammable</td>
</tr>
<tr>
<td>Vapor pressure</td>
<td>No data available</td>
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<tr>
<td>Relative vapor density at 20 °C</td>
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</tr>
<tr>
<td>Relative density</td>
<td>1.97 g/ml</td>
</tr>
<tr>
<td>Solubility</td>
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<td>Partition coefficient n-octanol/water (Log Pow)</td>
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<tr>
<td>Auto-ignition temperature</td>
<td>Not applicable</td>
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<tr>
<td>Decomposition temperature</td>
<td>No data available</td>
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<tr>
<td>Viscosity, kinematic</td>
<td>Not applicable</td>
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<tr>
<td>Viscosity, dynamic</td>
<td>No data available</td>
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<tr>
<td>Explosion limits</td>
<td>Not applicable</td>
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<tr>
<td>Explosive properties</td>
<td>Combustible dust</td>
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<tr>
<td>Oxidizing properties</td>
<td>Not applicable</td>
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</tbody>
</table>

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

This material is friable and can create small dust particles during any handling, processing, and transfer operations. This material can form explosive dust/air suspensions that are ignitable under some conditions.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

May form combustible dust concentrations in the air. Hazardous polymerization will not occur.

10.4. Conditions to avoid

Avoid dust formation. No flames, no sparks. Eliminate all sources of ignition.

10.5. Incompatible materials

Strong oxidizing agents. Heat, sparks, open flame.

10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Diffubenzuron (35367-38-5)
Diflubenzuron (35367-38-5)

LD50 oral rat  > 4640 mg/kg (Rat, Oral)
LD50 dermal rabbit > 2000 mg/kg (Rabbit, Dermal)
LC50 inhalation rat (mg/l)  > 2.88 mg/l 6 h

Silica, crystalline - quartz (14808-60-7)

Listed on IARC (International Agency for Research on Cancer), Listed as carcinogen on NTP (National Toxicology Program)

IARC group  1 - Carcinogenic to humans
National Toxicity Program (NTP) Status  Known Human Carcinogens
In OSHA Hazard Communication Carcinogen list?  Yes

GHS-US Properties

<table>
<thead>
<tr>
<th>Classification</th>
<th>Acute toxicity (oral)</th>
<th>Acute toxicity (dermal)</th>
<th>Acute toxicity (inhalation)</th>
<th>Skin corrosion/irritation</th>
<th>Serious eye damage/irritation</th>
<th>Respiratory or skin sensitization</th>
<th>Germ cell mutagenicity</th>
<th>Carcinogenicity</th>
<th>Reproductive toxicity</th>
<th>Specific target organ toxicity (single exposure)</th>
<th>Specific target organ toxicity (repeated exposure)</th>
<th>Aspiration hazard</th>
</tr>
</thead>
<tbody>
<tr>
<td>Classification</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
<td>May cause cancer</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
<td>Not classified</td>
</tr>
</tbody>
</table>

Potential health effects

**Inhalation**

- **Acute**: Acute Silicosis can occur with exposures to very high concentrations of respirable crystalline silica over a very short time period, sometimes as short as a few months. The symptoms of acute silicosis include progressive shortness of breath, fever, cough and weight loss.

- **Chronic**: Repeated and prolonged exposure to crystalline silica containing materials may cause irritation and/or lung damage silicosis, fibrosis, inflammation, cancer.

**Skin**

- **Acute**: Exposure to dust may cause mechanical irritation.

**Eye**

- **Acute**: Exposure to dust may cause mechanical irritation.

**Ingestion**

- **Acute**: Under normal conditions of use, no health effects are expected.

**Mutagenicity**

- Diflubenzuron is not a mutagen.

**Carcinogenicity**

- Diflubenzuron is not classified as a carcinogen by NTP, IARC and OSHA. Crystalline silica (quartz) inhaled from occupational sources is classified as carcinogenic to humans.

**Reproductive Effects**

- Diflubenzuron is not a reproductive toxicant.

SECTION 12: Ecological information

**12.1. Toxicity**

Diflubenzuron (35367-38-5)

- LC50 Acute fish 1: 140 mg/l Exposure time: 96h Rainbow trout
- LC50 Acute fish 2: 135 mg/l Exposure time: 96h Blue gill
- EC50 Acute crustacea 1: 0.002 mg/l Exposure time: 96h Mysis shrimp
- EC50 Acute crustacea 2: 0.0037 mg/l Exposure time: 48h Water flea Daphnia magna
- NOEC Chronic fish 1: 0.1 mg/l Fathead minnow
- NOEC Chronic crustacea 1: 0.000045 mg/l Mysis shrimp
- NOEC Chronic crustacea 2: 0.00004 mg/l Water flea Daphnia magna

**12.2. Persistence and degradability**

No additional information available
12.3. Bioaccumulative potential
No additional information available

12.4. Mobility in soil
No additional information available

12.5. Other adverse effects

<table>
<thead>
<tr>
<th>ClariFly Larvicide Livestock Premix 0.67%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ecological Fate</td>
</tr>
</tbody>
</table>

SECTION 13: Disposal considerations

13.1. Disposal methods
Product/Packaging disposal recommendations: Dispose of content and/or container in accordance with local, regional, national, and/or international regulations.

SECTION 14: Transport information

<table>
<thead>
<tr>
<th>UN number</th>
<th>Proper Shipping Name</th>
<th>Transport hazard class(es)</th>
<th>Packing group</th>
<th>Environmental hazards</th>
</tr>
</thead>
<tbody>
<tr>
<td>DOT</td>
<td>Not regulated</td>
<td>Not regulated</td>
<td>Not regulated</td>
<td>Not applicable</td>
</tr>
<tr>
<td>IMDG</td>
<td>UN3077</td>
<td>Packaging greater than 5 kg: Environmentally hazardous substance, solid, n.o.s (Diflubenzuron)</td>
<td>9</td>
<td>III</td>
</tr>
<tr>
<td>IATA</td>
<td>UN3077</td>
<td>Packaging greater than 5 kg: Environmentally hazardous substance, solid, n.o.s (Diflubenzuron)</td>
<td>9</td>
<td>III</td>
</tr>
</tbody>
</table>

SECTION 15: Regulatory information

15.1. US Federal regulations

Diflubenzuron (35367-38-5)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Subject to reporting requirements of United States SARA Section 313
SARA Section 313 - Emission Reporting 1 %

Calcium monocarbonate (471-34-1)
Listed on the United States TSCA (Toxic Substances Control Act) inventory

Silica, crystalline - quartz (14808-60-7)
Listed on the United States TSCA (Toxic Substances Control Act) inventory

FIFRA Labelling

| EPA Registration Number | 89459-2 |
| Caution |
| KEEP OUT OF REACH OF CHILDREN. |
| Causes moderate eye irritation. Avoid contact with eyes or clothing. Wear protective eyewear. Wash hands thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco or using the toilet. |
| 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. Call a poison control center or doctor for treatment advice. |
| This pesticide is toxic to aquatic invertebrates. Do not contaminate water when disposing of equipment washwaters. |

15.2. US State regulations
### Silica, crystalline - quartz (14808-60-7)

<table>
<thead>
<tr>
<th>U.S. - California - Proposition 65 - Carcinogens List</th>
<th>U.S. - California - Proposition 65 - Developmental Toxicity</th>
<th>U.S. - California - Proposition 65 - Reproductive Toxicity - Female</th>
<th>U.S. - California - Proposition 65 - Reproductive Toxicity - Male</th>
<th>No significant risk level (NSRL)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes</td>
<td>No</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
</tbody>
</table>

### SECTION 16: Other information

- **Date of issue**: 06 November 2014
- **Revision date**: 24 March 2020
- **Supersedes**: 06 May 2016

Indication of changes:
- Revised Sec. 3: Formulation change.

SDS US (GHS HazCom 2012) - CGP

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.