BIOADVANCED SCIENCE-BASED SOLUTIONS FIRE ANT KILLER READY-TO-USE DUST



Version 1.0 / USA

1/10 Revision Date: 01/31/2019

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

| BIOADVANCED SCIENCE-BASED SOLUTIONS FIRE ANT | | | |
|--|--|--|--|
| KILLER READY-TO-USE DUST | | | |
| | | | |
| 102000012235 | | | |
| 92564-14 | | | |
| f the substance or mixture and uses advised against | | | |
| Insecticide | | | |
| See product label for restrictions. | | | |
| Information on manufacturer | | | |
| SBM Life Science Corp 1001 Winstead, Ste 500 Cary, NC 27513 United States | | | |
| | | | |

Emergency Telephone
Number (24hr/ 7 days)1-877-229-3763 (24 hours/day)Product Information
Telephone Number1-877-229-3724

SDS Information or Request SDS@sbm-company.com

SECTION 2: HAZARDS IDENTIFICATION

Classification in accordance with regulation HCS 29CFR §1910.1200 Acute toxicity (Oral): Category 4



Signal word: Warning

Hazard statements Harmful if swallowed.

Precautionary statements Wash thoroughly after handling. Do not eat, drink or smoke when using this product.

IF SWALLOWED: Call a POISON CENTER/doctor/physician if you feel unwell.

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Rinse mouth. Dispose of contents/container in accordance with local regulation.

Other hazards

No other hazards known.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Hazardous Component Name Beta-Cyfluthrin **CAS-No.** 68359-37-5

Concentration % by weight 0.5

SECTION 4: FIRST AID MEASURES

Description of first aid measures

| General advice | When possible, have the product container or label with you when calling a poison control center or doctor or going for treatment. | |
|--|---|--|
| Inhalation | 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 physician or poison control center immediately. | |
| Skin contact | Take off contaminated clothing and shoes immediately. Wash off immediately with plenty of water for at least 15 minutes. Call a physician or poison control center immediately. | |
| Eye contact | 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 physician or poison control center immediately. | |
| Ingestion | Call a physician or poison control center immediately. Rinse out mouth and give water in small sips to drink. DO NOT induce vomiting unless directed to do so by a physician or poison control center. Never give anything by mouth to an unconscious person. Do not leave victim unattended. | |
| Most important symptoms and effects, both acute and delayed | | |
| Symptoms | To date no symptoms are known. | |
| Indication of any immediate medical attention and special treatment needed | | |
| Treatment | Appropriate supportive and symptomatic treatment as indicated by the patient's condition is recommended. There is no specific antidote. | |

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SECTION 5: FIREFIGHTING MEASURES

| Extinguishing media | |
|---|--|
| Suitable | Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide. |
| Unsuitable | High volume water jet |
| Special hazards arising from the substance or mixture | Dangerous gases are evolved in the event of a fire. |
| Advice for firefighters | |
| Special protective equipment for fire-fighters | Firefighters should wear NIOSH approved self-contained breathing apparatus and full protective clothing. |
| Further information | Keep out of smoke. Fight fire from upwind position. Cool closed containers exposed to fire with water spray. Do not allow run-off from fire fighting to enter drains or water courses. |
| Flash point | not applicable |
| Autoignition temperature | no data available |
| Lower explosion limit | not applicable |
| Upper explosion limit | not applicable |
| Explosivity | no data available |
| | |

SECTION 6: ACCIDENTAL RELEASE MEASURES

| Personal precautions, protective equipment and emergency procedures | | |
|---|---|--|
| Precautions | Keep unauthorized people away. Isolate hazard area. Avoid contact with spilled product or contaminated surfaces. | |
| Methods and materials for containment and cleaning up | | |
| Methods for cleaning up | Avoid dust formation. Sweep up or vacuum up spillage and collect in suitable container for disposal. Clean contaminated floors and objects thoroughly, observing environmental regulations. | |
| Additional advice | Use personal protective equipment. Do not allow to enter soil, waterways or waste water canal. | |
| Reference to other sections | Information regarding safe handling, see section 7. Information regarding personal protective equipment, see section 8. Information regarding waste disposal, see section 13. | |

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SECTION 7: HANDLING AND STORAGE

| Precautions for safe handling | | |
|--|---|--|
| Advice on safe handling | Handle and open container in a manner as to prevent spillage. | |
| Hygiene measures | Keep away from food, drink and animal feedingstuffs. Wash hands thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco, using the toilet or applying cosmetics. | |
| Conditions for safe storage, including any incompatibilities | | |
| Requirements for storage areas and containers | Keep containers tightly closed in a dry, cool and well-ventilated place. Store in original container and out of the reach of children, preferably in a locked storage area. | |

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

| Components | CAS-No. | Control parameters | Update | Basis |
|---|------------|---------------------|---------|----------|
| Beta-Cyfluthrin (Particulate.) | 68359-37-5 | 5ug/m3 (AN ESL) | 02 2013 | TX ESL |
| Beta-Cyfluthrin (Particulate.) | 68359-37-5 | 50ug/m3 (ST ESL) | 02 2013 | TX ESL |
| Calcium sulfate (Inhalable fraction.) | 13397-24-5 | 10 mg/m3 (TWA) | 02 2012 | ACGIH |
| Calcium sulfate (Total) | 13397-24-5 | 10 mg/m3 (REL) | 2010 | NIOSH |
| Calcium sulfate (Respirable.) | 13397-24-5 | 5 mg/m3 (REL) | 2010 | NIOSH |
| Calcium sulfate (Total dust.) | 13397-24-5 | 15 mg/m3 (PEL) | 02 2006 | OSHA Z1 |
| Calcium sulfate (Respirable fraction.) | 13397-24-5 | 5 mg/m3 (PEL) | 02 2006 | OSHA Z1 |
| Calcium sulfate (Total dust.) | 13397-24-5 | 15 mg/m3 (TWA) | 1989 | OSHA Z1A |
| Calcium sulfate (Respirable fraction.) | 13397-24-5 | 5 mg/m3 (TWA) | 1989 | OSHA Z1A |
| Calcium sulfate (Total dust.) | 13397-24-5 | 15 mg/m3 (TWA) | 06 2008 | TN OEL |
| Calcium sulfate (Respirable fraction.) | 13397-24-5 | 5 mg/m3 (TWA) | 06 2008 | TN OEL |
| Calcium sulfate (Particulate.) | 13397-24-5 | 5ug/m3 (AN ESL) | 02 2013 | TX ESL |
| Calcium sulfate (Particulate.) | 13397-24-5 | 50ug/m3 (ST ESL) | 02 2013 | TX ESL |

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Exposure controls

Personal protective equipment

In normal use and handling conditions please refer to the label and/or leaflet. In all other cases the following recommendations would apply.

| Respiratory protection | When respirators are required, select NIOSH approved equipment based on actual or potential airborne concentrations and in accordance with the appropriate regulatory standards and/or industry recommendations. |
|-----------------------------|---|
| Hand protection | Chemical resistant nitrile rubber gloves |
| Eye protection | Safety glasses with side-shields |
| Skin and body protection | Wear long-sleeved shirt and long pants and shoes plus socks. |
| General protective measures | Do not allow children or pets to enter the treated area until granules have been watered into the soil and the grass or soil is dry. |

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

| Appearance | white to light beige |
|--|---|
| Physical State | powder |
| Odor | weak earthy |
| Odour Threshold | no data available |
| рН | 7.8 - 8.2 at (25 °C) (as aqueous solution) |
| Vapor Pressure | no data available |
| Vapor Density (Air = 1) | no data available |
| Bulk density | 30 - 50 lb/ft ³ |
| Evapouration rate | no data available |
| Boiling Point Melting / Freezing Point | not applicable not applicable |
| Water solubility | insoluble |
| Minimum Ignition Energy | no data available |
| Decomposition temperature | no data available |
| Partition coefficient: n- octanol/water | not applicable |
| Viscosity | |
| | not applicable |
| Flash point | not applicable |

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| Autoignition temperature | no data available |
|--------------------------|-------------------|
| Lower explosion limit | not applicable |
| Upper explosion limit | not applicable |
| Explosivity | no data available |

SECTION 10: STABILITY AND REACTIVITY

| Reactivity | |
|-------------------------------------|--|
| Thermal decomposition | no data available |
| Chemical stability | Stable under normal conditions. |
| Possibility of hazardous reactions | No dangerous reaction known under conditions of normal use. |
| Conditions to avoid | no data available |
| Incompatible materials | no data available |
| Hazardous decomposition products | No decomposition products expected under normal conditions of use. |

SECTION 11: TOXICOLOGICAL INFORMATION

| Exposure routes | Skin contact, Eye contact, Ingestion, Inhalation | |
|--------------------------------------|---|--|
| Immediate Effects Eye | Causes eye irritation. | |
| Skin | May cause slight irritation. | |
| Ingestion | Harmful if swallowed. | |
| Inhalation | Harmful if inhaled. | |
| Information on toxicological effects | | |
| Acute oral toxicity | LD50 (male rat) 3,084 mg/kg LD50 (female rat) 1,733 mg/kg | |
| Acute inhalation toxicity | LC50 (male/female combined rat) > 1.18 mg/l Exposure time: 4 h Determined in the form of dust. (actual) Highest attainable concentration. | |
| | LC50 (male/female combined rat) > 4.72 mg/l Exposure time: 1 h Determined in the form of dust. | |

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| | Extrapolated from the 4 hr LC50. (actual) |
|-----------------------|---|
| Acute dermal toxicity | LD50 (male/female combined rat) > 2,000 mg/kg |
| Skin irritation | Slight irritation (rabbit) |
| Eye irritation | Mild eye irritation. (rabbit) |
| Sensitisation | Non-sensitizing. (guinea pig) |

Assessment repeated dose toxicity

The toxic effects of Beta-Cyfluthrin are related to transient hyperactivity typical for pyrethroid neurotoxicity.

Assessment mutagenicity

Beta-Cyfluthrin was not mutagenic or genotoxic in a battery of in vitro and in vivo tests.

Assessment carcinogenicity

Beta-Cyfluthrin was not carcinogenic in lifetime feeding studies in rats and mice.

ACGIH

| Crystalline quartz (respirable) | 14808-60-7 | Group A2 |
|---|---------------------------|--|
| NTP | | |
| Crystalline quartz (respirable) | 14808-60-7 | 2000 |
| IARC | | |
| Pyrogenic (fumed) amorphous silica Crystalline quartz (respirable) | 112945-52-5 14808-60-7 | Overall evaluation: 3 Overall evaluation: 1 |

OSHA

None.

Assessment toxicity to reproduction

Beta-Cyfluthrin caused reproduction toxicity in a two-generation study in rats only at dose levels also toxic to the parent animals. The reproduction toxicity seen with Beta-Cyfluthrin is related to parental toxicity.

Assessment developmental toxicity

Beta-Cyfluthrin caused developmental toxicity only at dose levels toxic to the dams. The developmental effects seen with Beta-Cyfluthrin are related to maternal toxicity.

Further information

Acute toxicity studies have been bridged from a similar formulation(s). The non-acute information pertains to the active ingredient(s).

SECTION 12: ECOLOGICAL INFORMATION

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| Toxicity to fish | LC50 (Oncorhynchus mykiss (rainbow trout)) 0.000068 mg/l Exposure time: 96 h The value mentioned relates to the active ingredient beta-cyfluthrin. |
|--------------------------------------|---|
| Toxicity to aquatic invertebrates | EC50 (Daphnia magna (Water flea)) 0.00029 mg/l Exposure time: 48 h The value mentioned relates to the active ingredient beta-cyfluthrin. |
| Toxicity to aquatic plants | IC50 (Desmodesmus subspicatus) > 0.01 mg/l Growth rate; Exposure time: 72 h The value mentioned relates to the active ingredient beta-cyfluthrin. No acute toxicity was observed at its limit of water solubility. |
| Biodegradability | Beta-Cyfluthrin: ; not rapidly biodegradable |
| Кос | Beta-Cyfluthrin: Koc: 508 - 3179 |
| Bioaccumulation | Beta-Cyfluthrin: Bioconcentration factor (BCF) 506; Does not bioaccumulate. |
| Mobility in soil | Beta-Cyfluthrin: Immobile in soil |
| Environmental precautions | Apply this product as specified on the label. Do not allow to get into surface water, drains and ground water. Do not contaminate surface or ground water by cleaning equipment or disposal of wastes, including equipment wash water. |

SECTION 13: DISPOSAL CONSIDERATIONS

Waste treatment methods

| Product | It is best to use all of the product in accordance with label directions. If it is necessary to dispose of unused product, please follow container label instructions and applicable local guidelines. Never place unused product down any indoor or outdoor drain. |
|------------------------|--|
| Contaminated packaging | Do not re-use empty containers. Place empty container in trash. Follow advice on product label and/or leaflet. |
| RCRA Information | Characterization and proper disposal of this material as a special or hazardous waste is dependent upon Federal, State and local laws and are the user's responsibility. RCRA classification may apply. |

SECTION 14: TRANSPORT INFORMATION

49CFR Not dangerous goods / not hazardous material

IMDG UN number

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| Class Packaging group Marine pollutant Proper shipping name | 9 III YES ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (BETA-CYFLUTHRIN MIXTURE) |
|---|--|
| IATA UN number Class Packaging group Environm. Hazardous Mark Proper shipping name | 3077 9 III YES ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S. (BETA-CYFLUTHRIN MIXTURE) |

This transportation information is not intended to convey all specific regulatory information relating to this product. It does not address regulatory variations due to package size or special transportation requirements.

SECTION 15: REGULATORY INFORMATION

| EPA Registration No. US Federal Regulations TSCA list | 92564-14 | |
|---|---|----------------------------------|
| Crystalline quartz (respirable) | 14808-60-7 | |
| US. Toxic Substances Contr | ol Act (TSCA) Section 12(b) Export No | tification (40 CFR 707, Subpt D) |
| None. | | |
| | Notification and Information | |
| None. | | |
| SARA Title III - Section 313 - | Toxic Chemical Release Reporting | |
| Beta-Cyfluthrin | 68359-37-5 | 25,000lbs |
| US States Regulatory Repor | ting | |
| CA Prop65 | | |
| This product does not contain | any substances known to the State of Ca | alifornia to cause cancer. |
| This product does not contain | any substances known to the State of Ca | alifornia to cause reproductive |

This product does not contain any substances known to the State of California to cause reproductive harm. **US State Right-To-Know Ingredients** Beta-Cyfluthrin 68359-37-5 NJ, RI

Canadian Regulations Canadian Domestic Substance List

Environmental

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CERCLA None. Clean Water Section 307 Priority Pollutants None. Safe Drinking Water Act Maximum Contaminant Levels None.

International Regulations European Inventory of Existing Commercial Substances (EINECS)

EPA/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 required on the pesticide label:

Signal word:Caution!Hazard statements:Harmful by inhalation and if swallowed.
Causes eye irritation.
Avoid contact with skin, eyes and clothing.
Wash thoroughly with soap and water after handling.

SECTION 16: OTHER INFORMATION

| NFPA 704 (National Fire Protection Association): | | | | |
|---|------------------|---------------------|---------------|--|
| Health - 1 | Flammability - 0 | Instability - 1 | Others - none | |
| HMIS (Hazardous Materials Identification System, based on the Third Edition Ratings Guide) | | | | |
| Health - 1 | Flammability - 0 | Physical Hazard - 0 | PPE - | |
| 0 = minimal hazard, 1 = slight hazard, 2 = moderate hazard, 3 = severe hazard, 4 = extreme hazard | | | | |

Reason for Revision: Update emergency contact and product information number.

Date of Previous Revision: 03/13/2018

This information is provided in good faith but without express or implied warranty. The customer assumes all responsibility for safety and use not in accordance with label instructions. The product names are trademarks of SBM Life Science Corp.