

Issuing date 11-Nov-2015

Revision Date 25-Sep-2020

Version 1.07

**1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING****Product identifier****Product name** 80-1614 BIO-MAXX DGRSR**Recommended use of the chemical  
and restrictions on use****Product code** F00513**Product Type** Extremely Flammable Aerosol  
**Synonyms** None**Supplier's details****Recommended Use** Bio-Based Solvent Degreaser.**Uses advised against** No information available**Manufactured For:**  
Kimball Midwest  
4800 Roberts Rd.  
Columbus, OH 43228  
800-233-1294**Emergency telephone number**  
**Chemical Emergency Phone** CHEMTREC : 1-800-424-9300  
**Number**  
**Company Emergency Phone** 800-233-1294  
**Number**

## 2. HAZARDS IDENTIFICATION

### Classification

Skin corrosion/irritation	Category 2
Serious eye damage/eye irritation	Category 2A
Skin Sensitization	Category 1
Flammable Aerosols	Category 1
Gases under pressure	Compressed Gas

### GHS Label elements, including precautionary statements

#### Emergency Overview

#### DANGER

#### Hazard Statements

Causes skin irritation.  
Causes serious eye irritation.  
May cause an allergic skin reaction.  
Extremely Flammable Aerosol  
Contains gas under pressure; may explode if heated



**Appearance** Clear

**Physical state** Aerosol

**Odor** Fragrance

#### Precautionary Statements - Prevention

Wash face, hands and any exposed skin thoroughly after handling.  
Wear protective gloves, eye protection, face protection.  
Avoid breathing fumes, gas, mist, vapors, spray.  
Contaminated work clothing must not be allowed out of the workplace  
Keep away from heat, sparks, open flames, 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.

#### Precautionary Statements - Response

Specific treatment (see first aid on this label).  
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, attention  
IF ON SKIN: Wash with plenty of soap and water.  
Take off contaminated clothing and wash it before reuse.  
If skin irritation or rash occurs: Get medical advice, attention

#### Precautionary Statements - Storage

Protect from sunlight. Store in a well-ventilated place  
Do not expose to temperatures exceeding 122°F (50°C)

#### Precautionary Statements - Disposal

Dispose of contents, container to an approved waste disposal plant.

#### Hazards not otherwise classified (HNOC)

None

**Other information**

0.000005% of the mixture consists of ingredient(s) of unknown toxicity.

**3. COMPOSITION/INFORMATION ON INGREDIENTS**

Chemical Name	CAS-No	Weight %*
SOY METHYL ESTER	67784-80-9	70-80
1,1-DIFLUOROETHANE	75-37-6	10-20
ETHOXYLATED ALCOHOL	68439-46-3	1-10
D-LIMONENE	5989-27-5	1-10

\*The exact percentage (concentration) of composition has been withheld as a trade secret.

**4. FIRST AID MEASURES****First aid measures for different exposure routes**

<b>General advice</b>	Avoid contact with eyes, skin, and clothing. Avoid breathing vapors, mist, or gas.
<b>Eye contact</b>	Immediately flush with plenty of water for at least 15 minutes. After initial flushing, remove any contact lenses and continue flushing. If eye irritation persists, consult a doctor.
<b>Skin contact</b>	Wash off with soap and plenty of water. If skin irritation persists, call a physician. Remove and wash contaminated clothing before re-use.
<b>Inhalation</b>	Move to fresh air. If not breathing, give artificial respiration. If breathing has stopped, contact emergency medical services immediately.
<b>Ingestion</b>	Call a physician or Poison Control Center immediately. Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Risk of product entering the lungs on vomiting after ingestion.
<b>Protection of First-aiders</b>	Remove all sources of ignition.

**Most important symptoms/effects, acute and delayed**

<b>Main Symptoms</b>	Causes skin and serious eye irritation. May cause an allergic skin reaction. May cause respiratory irritation. May cause drowsiness or dizziness.
----------------------	---

**Indication of immediate medical attention and special treatment needed, if necessary**

<b>Notes to physician</b>	Treat symptomatically.
---------------------------	------------------------

**5. FIRE-FIGHTING MEASURES****Suitable Extinguishing Media**

Water fog.Dry chemical. Foam.Carbon dioxide (CO2). Cool containers/tanks with water spray.

**Unsuitable Extinguishing Media** Do not use a solid water stream as it may scatter and spread fire. Keep away from sources of ignition - No smoking.

**Specific hazards arising from the chemical**

Extremely Flammable / Flammable. Keep product and empty container away from heat and sources of ignition. In the event of fire and/or explosion do not breathe fumes. In the event of fire, cool tanks with water spray.

**Hazardous Combustion** Acrid smoke/fumes. Carbon oxides , Hydrocarbons, Fumes. Sulfur oxides.

**Products****Explosion Data****Sensitivity to Mechanical Impact** none.**Sensitivity to Static Discharge** Yes.**Protective Equipment and Precautions for Firefighters**

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear. Use shielding to protect fire-fighters from bursting containers. In the event of fire and/or explosion do not breathe fumes.

## 6. ACCIDENTAL RELEASE MEASURES

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

**Personal precautions** Use with adequate ventilation to keep the exposure levels below the OELS. Follow safe handling advice and personal protective equipment recommendations.

**Environmental precautions**

**Environmental precautions** Vapors can accumulate in low areas. Report spills as required by local and federal regulations. Do not flush into surface water or sanitary sewer system. Do not allow material to contaminate ground water system. Should not be released into the environment.

**Methods and materials for containment and cleaning up**

**Methods for Containment** Absorb with earth, sand or other non-combustible material and transfer to containers for later disposal. Prevent further leakage or spillage if safe to do so. Do not allow material to contaminate ground water system. Prevent product from entering drains.

**Methods for cleaning up** Soak up with inert absorbent material. Contain liquid and collect with an inert, non-combustible material. Pick up and transfer to properly labeled containers. Clean contaminated surface thoroughly. After cleaning, flush away traces with water. Prevent product from entering drains. Take precautionary measures against static discharges.

## 7. HANDLING AND STORAGE

**Precautions for safe handling**

**Advice on safe handling** Avoid breathing vapors or mists. Avoid contact with skin, eyes and clothing. Keep away from open flames, hot surfaces and sources of ignition. Contents under pressure. Do not puncture or incinerate cans. Handle in accordance with good industrial hygiene and safety practice. Take precautionary measures against static discharges.

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

**Technical measures/Storage conditions** Keep container tightly closed in a dry and well-ventilated place. Keep away from open flames, hot surfaces, and sources of ignition. Keep in properly labeled containers. Keep out of the reach of children. Store locked up.

**Incompatible products** Strong acids, alkalis, oxidizing agents.

**Aerosol Level** 3

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

**Control parameters****Exposure Guidelines**

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
1,1-DIFLUOROETHANE 75-37-6	TWA 1000 PPM 8 hours	-	-

ACGIH: (American Conference of Governmental Industrial Hygienists)

OSHA: (Occupational Safety & Health Administration)

NIOSH IDLH: Immediately Dangerous to Life or Health

**Other Exposure Guidelines** Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962 (11th Cir., 1992).

### Exposure controls

**Engineering Measures** Ventilation systems. Use adequate ventilation to keep the exposure levels below the occupational exposure limits. Showers, eyewash stations, and ventilation systems.

### Individual protection measures, such as personal protective equipment

**Eye/Face Protection** Safety glasses with side-shields. Tightly fitting safety goggles.

**Skin and body protection** Chemical resistant apron. Protective gloves.

**Respiratory protection** If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.

**Hygiene measures** Handle in accordance with good industrial hygiene and safety practice.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

### Physical and chemical properties

<b>Physical state</b>	Aerosol	<b>Odor</b>	Fragrance
<b>Appearance</b>	Clear	<b>Odor Threshold</b>	
<b>Color</b>	Light Amber		

<u>Property</u>	<u>Values</u>	<u>Remarks • Methods</u>
pH	No information available	
Melting/freezing point	No information available	
Boiling point/boiling range		
Flash Point	-50 °C / -58 °F	Based on propellant
Evaporation rate	No information available	
Flammability (solid, gas)	No information available	
Flammability Limits in Air		
upper flammability limit		
lower flammability limit		
Vapor pressure		
Vapor density		
Specific Gravity	0.889	
Water solubility	No information available	
Partition coefficient: n-octanol/water		
Autoignition temperature	No information available	Not applicable
Decomposition temperature		
Viscosity	No information available	
Explosive properties		

### Other information

VOC Content(%)	8.56
MIR Value	0.20

## 10. STABILITY AND REACTIVITY

### Reactivity

No data available

**Chemical stability**

Stable under recommended storage conditions.

**Possibility of hazardous reactions**

None under normal processing.

**Conditions to Avoid**

Extremes of temperature and direct sunlight.

**Incompatible Materials**

Strong acids, alkalis, oxidizing agents.

**Hazardous Decomposition Products**

Carbon oxides , Hydrocarbons, Fumes.

## 11. TOXICOLOGICAL INFORMATION

**Information on likely routes of exposure****Product Information**

<b>Inhalation</b>	Respiratory irritation may occur if excessive exposure to product by inhalation.
<b>Eye contact</b>	Causes serious eye irritation.
<b>Skin contact</b>	Causes skin irritation. May cause an allergic skin reaction.
<b>Ingestion</b>	May be harmful if swallowed.

**Component Information**

Chemical Name	LD50 Oral	LD50 Dermal	LC50 Inhalation
ETHOXYLATED ALCOHOL 68439-46-3	= 1378 mg/kg ( Rat ) = 1400 mg/kg ( Rat )	> 2 g/kg ( Rabbit )	-
D-LIMONENE 5989-27-5	= 4400 mg/kg ( Rat ) = 5200 mg/kg ( Rat )	> 5 g/kg ( Rabbit )	-

**Information on toxicological effects**

**Symptoms** Causes skin and serious eye irritation. May cause an allergic skin reaction.

**Delayed and immediate effects as well as chronic effects from short and long-term exposure**

<b>Skin corrosion/irritation</b>	Irritating to skin.
<b>Eye damage/irritation</b>	Irritating to eyes.
<b>Sensitization</b>	Known skin sensitizer.
<b>Germ cell mutagenicity</b>	Not a germ cell mutagen.
<b>Carcinogenicity</b>	The table below indicates whether each agency has evaluated a listed ingredient as a carcinogen.

Chemical Name	ACGIH	IARC	NTP	OSHA
D-LIMONENE 5989-27-5	-	-	-	X

IARC: (International Agency for Research on Cancer)  
Group 3 - Not Classifiable as to Carcinogenicity in Humans  
OSHA: (Occupational Safety & Health Administration)  
X - Present

<b>Reproductive toxicity</b>	This product does not contain any known or suspected reproductive hazards.
<b>Specific target organ systemic toxicity (single exposure)</b>	No known effect based on information supplied.
<b>Specific target organ systemic toxicity (repeated exposure)</b>	No known effect based on information supplied.

<b>Chronic toxicity</b>	Intentional misuse by deliberately concentrating and inhaling contents may be harmful or fatal. Chronic hydrocarbon abuse has been associated with irregular heart rhythms and potential cardiac arrest.
<b>Target Organ Effects</b>	No known effects under normal use conditions.
<b>Neurological effects</b>	Intentional misuse by deliberately concentrating and inhaling contents may be harmful or fatal.
<b>Aspiration hazard</b>	No known effect based on information supplied.

**Numerical measures of toxicity - Product Information**

**Unknown Acute Toxicity** 0.000005% of the mixture consists of ingredient(s) of unknown toxicity.

The following values are calculated based on chapter 3.1 of the GHS document .

<b>ATEmix (oral)</b>	5715 mg/kg
<b>ATEmix (dermal)</b>	7152 mg/kg
<b>ATEmix (inhalation-gas)</b>	198334 mg/l
<b>ATEmix (inhalation-dust/mist)</b>	245.6 mg/l
<b>ATEmix (inhalation-vapor)</b>	271.8 mg/l

**12. ECOLOGICAL INFORMATION****Ecotoxicity**

Chemical Name	Toxicity to algae	Toxicity to fish	Toxicity to microorganisms	Toxicity to daphnia and other aquatic invertebrates
D-LIMONENE 5989-27-5	-	0.619 - 0.796 mg/L LC50 Pimephales promelas 96h flow-through 35 mg/L LC50 Oncorhynchus mykiss 96h	-	-

**Persistence and degradability**

.

**Bioaccumulation**

**Other adverse effects** No information available

**13. DISPOSAL CONSIDERATIONS****Waste treatment**

**Waste Disposal Methods** Dispose of in accordance with federal, state, and local regulations. This material, as supplied, is a hazardous waste according to federal regulations (40 CFR 261). Dispose of in accordance with federal, state, and local regulations. Dispose of in accordance with local regulations.

**Contaminated packaging** Empty containers should be taken to an approved waste handling site for recycling or disposal. Pressurized container: Do not pierce or burn, even after use. Do not re-use empty containers.

**14. TRANSPORT INFORMATION**

**DOT Ground** CONSUMER COMMODITY ORM-D  
or  
LIMITED QUANTITY

IATA UN1950, AEROSOLS, FLAMMABLE, 2.1, LTD .QTY.

IMDG UN1950, AEROSOLS, 2.1, LTD.QTY

**15. REGULATORY INFORMATION**

SCHEDULE B CODE: 3403.99.0000.

**International Inventories**

Chemical Name	TSCA	DSL/NDSL	EINECS/ELINCS	ENCS	IECSC	KECL	PICCS	AICS
SOY METHYL ESTER	X	X	X	Not listed	X	X	Not listed	X
1,1-DIFLUOROETHANE	X	X	X	X	X	X	X	X
ETHOXYLATED ALCOHOL	X	X	Not listed	X	X	X	X	X
D-LIMONENE	X	X	X	X	X	X	X	X

**Legend:****TSCA** - United States Toxic Substances Control Act Section 8(b) Inventory**DSL/NDSL** - Canadian Domestic Substances List/Non-Domestic Substances List**EINECS/ELINCS** - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances**ENCS** - Japan Existing and New Chemical Substances**CHINA** - China Inventory of Existing Chemical Substances**KECL** - Korean Existing and Evaluated Chemical Substances**PICCS** - Philippines Inventory of Chemicals and Chemical Substances**AICS** - Australian Inventory of Chemical Substances**U.S. Federal Regulations****SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

**SARA 311/312 Hazard Categories**

<b>Acute Health Hazard</b>	Yes
<b>Chronic Health Star Hazard</b>	Yes
<b>Fire Hazard</b>	Yes
<b>Sudden Release of Pressure Hazard</b>	Yes
<b>Reactive Hazard</b>	No

**Clean Water Act**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material.

**U.S. State Regulations**



**California Proposition 65**

This product does not contain any Proposition 65 chemicals.

**U.S. State Right-to-Know Regulations**

Chemical Name	New Jersey	Massachusetts	Pennsylvania
1,1-DIFLUOROETHANE 75-37-6	X	X	

EPA Pesticide Registration Number Not applicable

**Canada**

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the SDS contains all the information required by the CPR.

**16. OTHER INFORMATION**

<b>NFPA</b>	<b>Health Hazard 2</b>	<b>Flammability 4</b>	<b>Instability 0</b>	<b>Physical and chemical hazards -</b>
<b>HMIS</b>	<b>Health Hazard 2*</b>	<b>Flammability 4</b>	<b>Physical Hazard 1</b>	<b>Personal protection B</b>
<i>Chronic Hazard Star Legend</i>	<i>Chronic Health Star Hazard</i>	<i>Repeated or prolonged exposure may cause damage</i>		<i>central nervous system</i>

**Prepared By** Regulatory Affairs  
**Issuing date** 11-Nov-2015  
**Revision Date** 25-Sep-2020  
**Revision Note**  
(M)SDS sections updated 1

**Disclaimer**

The information provided on this SDS is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guide for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered as a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process, unless specified in the text.

**End of Safety Data Sheet**