

SAFETY DATA SHEET

Issuing Date: 21-Oct-2019

Revision Date: 21-Oct-2019

Version 2

1. Identification of the Substance/Preparation and of the Company /Undertaking

1.1 Product identifier

Product name OIL GERANIUM TERPENELESS

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

Recommended use No information available

Uses advised against No information available

1.3. Details of the supplier of the safety data sheet Details Of The Supplier Of The Safety Data Sheet

Ungerer and Company
 4 Ungerer Way
 Lincoln Park, NJ 07035-1491
 1-973-628-0600
 Email: mlicciardello@UngererAndCompany.com

For further information, please contact: Michael Licciardello

E-mail address mlicciardello@UngererAndCompany.com

1.4 Emergency Telephone Number

CHEMTREC: 1-800-424-9300 For US/ 703-527-3887 Outside US / CN#23087

2. HAZARDS IDENTIFICATION

Classification

OSHA Regulatory Status

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Skin corrosion/irritation	Category 2
Serious eye damage/eye irritation	Category 1
Skin sensitization	Category 1B
Reproductive Toxicity	Category 2
Flammable liquids	Category 4

GHS Label elements, including precautionary statements

Danger

Hazard Statements

Causes skin irritation
 Causes serious eye damage
 May cause an allergic skin reaction
 Suspected of damaging fertility or the unborn child
 Combustible liquid



Appearance Clear Green

Physical State @20°C Liquid

Odor Characteristic

Precautionary Statements - Prevention

Obtain special instructions before use
 Do not handle until all safety precautions have been read and understood
 Use personal protective equipment as required
 Wash face, hands and any exposed skin thoroughly after handling
 Avoid breathing dust/fume/gas/mist/vapors/spray
 Contaminated work clothing should not be allowed out of the workplace
 Wear protective gloves
 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking

Precautionary Statements - Response

Specific treatment (see supplemental first aid instructions on this label)
 In case of fire: Use CO₂, dry chemical, or foam for extinction

Precautionary Statements - Storage

Store locked up
 Store in a well-ventilated place. Keep cool

Precautionary Statements - Disposal

Dispose of contents/container to an approved waste disposal plant

Hazards not otherwise classified (HNOC)

Other information

May be harmful in contact with skin
 Harmful to aquatic life with long lasting effects
 Toxic to aquatic life

Unknown Acute Toxicity

99.25% of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

Product identifier**Product name**

OIL GERANIUM TERPENELESS

Chemical name	CAS No	GHS Classification	Alternate CAS	FEMA Numbers
Oils, geranium, terpene-free	68916-44-9	Asp. Tox 1(H304) Skin Irrit. 2(H315) Skin Sens. 1B(H317) Eye Irrit. 1(H318) Aquatic Acute 2(H401) Aquatic Chronic 3(H412)	90082-51-2	None

Contains

Chemical name	CAS No	Weight-%	GHS Classification	FEMA Numbers
Citronellol	106-22-9	>= 25%	Acute Tox. 5 (H303) Acute Tox. 5 (H313) Eye Irrit. 2A (H319) Aquatic Acute 2 (H401) Skin Irrit. 2 (H315)	2309
Citronellyl formate	105-85-1	10 -< 15%	Skin Irrit. 2 (H315) Skin Sens. 1B (H317) Aquatic Acute 2 (H401)	2314
Geraniol	106-24-1	10 -< 15%	Acute Tox. 5 (H303) Skin Irrit. 2 (H315) Skin Sens. 1B (H317) Eye Dam. 1 (H318) Aquatic Acute 3 (H402)	2507
Isomenthone	491-07-6	5 -< 10%	Flam. Liq 4 (H227) Acute Tox. 5 (H303) Skin Irrit. 2 (H315) Skin Sens. 1B (H317) Aquatic Acute 3 (H402)	3460
Linalool	78-70-6	1-<5%	Acute Tox. 5 (H303) Eye Irrit. 2A (H319) Aquatic Acute 3 (H402) Flam. Liq. 4 (H227) Skin Irrit. 2 (H315) Skin Sens. 1B (H317)	2635
Rose oxide	3033-23-6	1-<5%	Acute Tox. 5 (H303) Eye Irrit. 2A (H319) Aquatic Acute 3 (H402) Flam. Liq 4 (H227) Skin Irrit. 2 (H315) Repr. 2 (H361)	None
Geranyl formate	105-86-2	1-<5%	Flam. Liq. 4 (H227) Skin Sens. 1B (H317) Aquatic Acute 2 (H401)	2514
Citronellyl tiglate	24717-85-9	1-<5%	Aquatic Acute 1 (H400) Aquatic Chronic 1 (H410) Skin Sens. 1B (H317)	4295
Menthone	89-80-5	1-<5%	Acute Tox. 5 (H303) Aquatic Acute 3 (H402) Flam. Liq 4 (H227) Skin Sens. 1B (H317) Skin Irrit. 2 (H315)	2667
Geranyl tiglate	7785-33-3	1-<5%	Skin Irrit. 3(H316)	4044
Caryophyllene	87-44-5	1-<5%	Asp. Tox. 1 (H304) Skin Sens. 1B (H317) Aquatic Chronic 4 (H413)	2252
2-Phenylethyl butyrate	103-52-6	1-<5%	Acute Tox. 5(H303)	2861
Citronellyl butyrate	141-16-2	1-<5%	Skin Sens. 1B (H317) Aquatic Acute 1 (H400) Aquatic Chronic (H410)	2312
Citral	5392-40-5	0.1-1%	Acute Tox. 5 (H313) Eye Irrit. 2A (H319) Aquatic Acute 2 (H401) Skin Irrit. 2 (H315) Skin Sens. 1B (H317)	2303
Geranyl acetate	105-87-3	0.1-1%	Aquatic Acute 2 (H401) Aquatic Chronic 3 (H412) Skin Irrit. 2 (H315) Skin Sens. 1B (H317)	2509

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

If symptoms persist, call a physician.

Eye contact

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. If symptoms persist, call a physician. Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician. Immediately flush with plenty of water. After initial flushing, remove any contact lenses and continue flushing for at least 15 minutes. Keep eye wide open while rinsing.

Skin contact

Wash off immediately with plenty of water for at least 15 minutes. If skin irritation persists, call a physician. Remove and wash contaminated clothing before re-use. Wash off immediately with plenty of water. Wash off immediately with soap and plenty of water. Immediate medical attention is not required. Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes.

Inhalation

Move to fresh air. If symptoms persist, call a physician. Immediate medical attention is not required. Move to fresh air in case of accidental inhalation of vapors. Move to fresh air in case of accidental inhalation of vapors or decomposition products.

Ingestion Do not induce vomiting. Drink plenty of water. Immediate medical attention is not required. Rinse mouth. Clean mouth with water and afterwards drink plenty of water. Never give anything by mouth to an unconscious person. Consult a physician.

Protection of first-aiders Use personal protective equipment.

Most important symptoms/effects, acute and delayed

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

Notes to physician May cause sensitization of susceptible persons. Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media

Use: Dry chemical. Carbon dioxide (CO₂). Water spray. Alcohol-resistant foam.

Flammable Properties

Combustible liquid

Unsuitable Extinguishing Media

Do not use a solid water stream as it may scatter and spread fire.

Specific hazards arising from the chemical

Thermal decomposition can lead to release of irritating gases and vapors. In the event of fire and/or explosion do not breathe fumes. May cause sensitization by inhalation and skin contact. Keep product and empty container away from heat and sources of ignition. Risk of ignition.

Explosion Data

Sensitivity to Mechanical Impact

None.

Sensitivity to Static Discharge

Yes.

Protective equipment and precautions for firefighters

Wear self contained breathing apparatus for fire fighting if necessary.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions

Use personal protective equipment. Avoid contact with the skin and the eyes. Remove all sources of ignition. Evacuate personnel to safe areas. Keep people away from and upwind of spill/leak. Pay attention to flashback. Take precautionary measures against static discharges.

Environmental precautions

Environmental precautions

Prevent entry into waterways, sewers, basements or confined areas. Do not flush into surface water or sanitary sewer system. Prevent further leakage or spillage if safe to do so. Prevent product from entering drains. Beware of vapors accumulating to form explosive concentrations. Vapors can accumulate in low areas.

Methods and materials for containment and cleaning up

Methods for Containment

Prevent further leakage or spillage if safe to do so.

Methods for cleaning up

Soak up with inert absorbent material. Pick up and transfer to properly labeled containers. After cleaning, flush away traces with water. Prevent product from entering drains. Dam up. Take precautionary measures against static discharges.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling

Ensure adequate ventilation. Wear personal protective equipment/face protection. Use local exhaust ventilation. Do not breathe dust/fume/gas/mist/vapors/spray. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Take necessary action to avoid static electricity discharge (which might cause ignition of organic vapors).

Conditions for safe storage, including any incompatibilities

Technical measures/Storage conditions

Keep out of the reach of children. Keep container tightly closed. Keep containers tightly closed in a cool, well-ventilated place. Keep away from heat and sources of ignition. Keep in properly labeled containers. Keep away from heat.

Incompatible products

None known based on information supplied.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure Guidelines

This product does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.

Chemical name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Citral 5392-40-5	TWA: 5 ppm	-	-

Exposure controls

Engineering Measures

Showers
Eyewash stations
Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/Face Protection

Tightly fitting safety goggles. Face-shield.

Skin and body protection

Chemical resistant apron.

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

When using do not eat, drink or smoke. Remove and wash contaminated clothing before re-use. Provide regular cleaning of equipment, work area and clothing.

9. Physical and Chemical Properties

9.1 Information On Basic Physical And Chemical Properties

Physical State @20°C	Liquid
Appearance	Clear Green
Odor	Characteristic
Odor Threshold	No information available
pH	No information available
Melting point/range	No information available
Freezing Point	No information available
Initial Boiling Point	No information available
Boiling point/boiling range	410 °F / 210 °C
Flash point	179.6 °F / 82 °C
Method	
Evaporation Rate VALUE (BuOAc=1) (Literature)	No information available
Flammable Properties	Combustible liquid
Flammability Limits in Air	No information available
Explosive properties	No information available
Oxidizing Properties	No information available
Vapor Pressure @20°C (mmHg)	0.08
Vapor Density	No information available
Specific Gravity	0.8844
Water Solubility	Insoluble in water
solubility	No information available
Partition coefficient:	No information available
Autoignition temperature	No information available
Decomposition Temperature °C	No information available
Viscosity, dynamic	No information available
Molecular Weight	No information available

10. STABILITY AND REACTIVITY

Reactivity

Exothermic reaction

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

None under normal processing.

Conditions to avoid

Heat, flames and sparks.

Incompatible materials

None known based on information supplied.

Hazardous decomposition products

None known based on information supplied.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information

Product does not present an acute toxicity hazard based on known information

Inhalation

There is no data available for this product.

Eye contact

There is no data available for this product.

Skin contact

There is no data available for this product.

Ingestion

There is no data available for this product.

Component Information

Information on toxicological effects

Symptoms

No information available.

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

Sensitization

No information available.

mutagenic effects

No information available.

Carcinogenicity

There are no known carcinogenic chemicals in this product.

Reproductive Toxicity

No information available.

STOT - single exposure

No information available.

STOT - repeated exposure

No information available.

Chronic toxicity

Repeated contact may cause allergic reactions in very susceptible persons. Avoid repeated exposure.

Aspiration hazard

No information available.

Numerical measures of toxicity - Product Information

Unknown Acute Toxicity

99.25% of the mixture consists of ingredient(s) of unknown toxicity

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

ATEmix (oral)

37031 mg/kg

ATEmix (dermal)

3212 mg/kg

12. ECOLOGICAL INFORMATION

Ecotoxicity

Harmful to aquatic life with long lasting effects

15.55 % of the mixture consists of component(s) of unknown hazards to the aquatic environment

Chemical name	Toxicity to algae	Toxicity to fish	Toxicity to daphnia and other aquatic invertebrates
Citronellol 106-22-9	-	LC50: 10 - 22 mg/L	EC50: 17 mg/L
Linalool 78-70-6	EC50: 88.3 mg/L	LC50: 22 - 46 mg/L	EC50: 20 mg/L
Citral 5392-40-5	EC50: 16 mg/L EC50: 19 mg/L	LC50: 4.6 - 10 mg/L	EC50: 7 mg/L 48h

Persistence and degradability

No information available.

Bioaccumulation

Other adverse effects

No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment

Waste Disposal Methods

Dispose of in accordance with local regulations.

Contaminated packaging

Do not re-use empty containers.

14. Transport information

DOT

BULK PACKAGING

NA Number

1993

Proper shipping name

Combustible liquid, n.o.s. (Isomenthone)

Hazard Classification

3

Packing Group

III

Reportable Quantity (RQ)

Please Refer to Appendix A to 49CFR 172.101 - List of Hazardous Substances and Reportable Quantities

DOT

NON BULK PACKAGING

NA Number

1993

Proper shipping name

Combustible liquid, n.o.s. (Isomenthone)

Hazard Classification

3

Packing Group

III

Reportable Quantity (RQ)

Please Refer to Appendix A to 49CFR 172.101 - List of Hazardous Substances and Reportable Quantities

IMDG/IMO

Reportable Quantity (RQ)

Not regulated

Please Refer to Appendix A to 49CFR 172.101 - List of Hazardous Substances and Reportable Quantities

MEX (SCT)

Reportable Quantity (RQ)

Not regulated

Please Refer to Appendix A to 49CFR 172.101 - List of Hazardous Substances and Reportable Quantities

ICAO/IATA

Reportable Quantity (RQ)

Not regulated

Please Refer to Appendix A to 49CFR 172.101 - List of Hazardous Substances and Reportable Quantities

TDG

Reportable Quantity (RQ)

Not regulated

Please Refer to Appendix A to 49CFR 172.101 - List of Hazardous Substances and Reportable Quantities

RID

ADR/RID

Not regulated

Not regulated

15. REGULATORY INFORMATION

International Inventories

TSCA

Complies

DSL/NDSL

Complies

EINECS/ELINCS

Complies

ENCS

Not determined

IECSC

Complies

KECL

Complies

PICCS

Complies

AICS

Complies

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

IECSC - 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

Acute Health Hazard	Yes
Chronic Health Hazard	no
Fire Hazard	Yes
Sudden Release of Pressure Hazard	no
Reactive Hazard	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

U.S. EPA Label Information

EPA Pesticide Registration Number Not applicable

16. OTHER INFORMATION

<u>NFPA</u>	Health Hazard 2	Flammability 2	Instability 0	Physical and chemical hazards -
<u>HMIS</u>	Health Hazard 2	Flammability 2	Physical Hazard 0	Personal protection X

Revision Date: 21-Oct-2019

Revision Note

No information available

Disclaimer

The information provided in this Safety Data Sheet 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 guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered 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 materials or in any process, unless specified in the text.

This material has not been evaluated for safe use in inhalation products such as e-cigarettes or vaping products, therefore it is Ungerer and Company's position that it is not intended to be used for these particular applications. It is the sole responsibility of the individual(s) purchasing the product to assess it's safety in the final application.

End of Safety Data Sheet