

# SAFETY DATA SHEET

Date issued : 11/10/2023

SDS number : Custom CLS\_Orange Lightning

## Orange Lightning

### 1. Identification

**Product identifier:** Orange Lightning  
**Product description:** Cleaner-Degreaser  
**Chemical family:** Dipentene/Detergent blend  
**Relevant identified uses:** Cleaner/Degreaser

#### Distributor

Custom CLS  
711 Upland Street  
Chester, PA 19013  
**Emergency Phone:** 484-483-7530

#### Emergency telephone number (24 hour)

**CHEM-TEL (Medical and Transportation):** 800-255-3924  
**POISON CONTROL CENTER (Medical):** 800-222-1222

### 2. Hazard identification

#### Classification of the substance or mixture

##### Health hazards:

Acute Toxicity (Inhalation), Category 4  
Skin Irritation, Category 2  
Serious Eye Damage, Category 1  
Skin Sensitization, Category 1  
Specific Target Organ Toxicity (Single exposure - Inhalation), Category 3 (Central Nervous System) (Respiratory Tract Irritation)  
Aspiration Hazard, Category 1

##### Physical hazards:

Flammable Liquids, Category 3

#### Label elements



Corrosion



Exclamation  
mark



Flame



Health  
hazard

**Signal word:** DANGER

#### Hazard statement(s)

H226: Flammable liquid and vapour.  
H304: May be fatal if swallowed and enters airways.  
H315: Causes skin irritation.  
H317: May cause an allergic skin reaction.  
H318: Causes serious eye damage.  
H332: Harmful if inhaled.  
H335: May cause respiratory irritation.  
H336: May cause drowsiness or dizziness.  
H401: Toxic to aquatic life.  
H411: Toxic to aquatic life with long lasting effects.

#### Precautionary statement(s)

##### Prevention:

P210: Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.  
P233: Keep container tightly closed.  
P240: Ground and bond container and receiving equipment.  
P241: Use explosion-proof electrical, ventilating, lighting equipment.  
P242: Use non-sparking tools.  
P243: Take action to prevent static discharges.  
P261: Avoid breathing fume, gas, mist, vapors, or spray.  
P264: Wash hands thoroughly after handling.  
P271: Use only outdoors or in a well-ventilated area.  
P272: Contaminated work clothing should not be allowed out of the workplace.

P273: Avoid release to the environment.

P280: Wear protective gloves/eye protection/face protection.

**Response:**

P301+P310: IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.

P302+P352: IF ON SKIN: Wash with plenty of soap and water

P303+P361+P353: IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or shower].

P304+P340: IF INHALED: Remove person to fresh air and keep comfortable for breathing.

P305+P351+P338: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P310: Immediately call a POISON CENTER or doctor/physician.

P312: Call a POISON CENTER or doctor/physician if you feel unwell.

P331: Do NOT induce vomiting.

P332+P313: If skin irritation occurs: Get medical advice/attention.

P333+P313: If skin irritation or rash occurs: Get medical advice/attention.

P362+P364: Take off contaminated clothing and wash it before reuse.

P363: Wash contaminated clothing before reuse.

P370+P378: In case of fire: Use dry chemical, foam or water mist to extinguish.

P391: Collect spillage.

**Storage:**

P403+P233: Store in a well-ventilated place. Keep container tightly closed.

P403+P235: Store in a well-ventilated place. Keep cool.

P405: Store locked up.

**Disposal:**

P501: Dispose of contents/container according to all local, state and Federal regulations.

**Emergency overview**

**Physical appearance:** Orange Liquid

**Immediate concerns:** Corrosive to the eyes. Skin irritant. May cause an allergic skin reaction.

**Potential health effects**

**Eye:** Corrosive, contact causes severe eye burns.

**Skin:** Contact may cause moderate to severe irritation.

**Skin absorption:** May cause an allergic skin reaction.

**Ingestion:** No known significant effects or critical hazards.

**Inhalation:** Harmful if inhaled. High concentrations may lead to central nervous system effects (drowsiness, dizziness, nausea, headaches)

**Reproductive toxicity**

**Reproductive toxicity:** None known.

**Teratogenic effects:** None known.

**Carcinogenicity:** Contains an ingredient listed under IARC Group 3 status.

**Mutagenicity:** None known.

**Medical conditions aggravated:** Respiratory conditions such as asthma may be aggravated .

**Routes of entry:** Eye, skin, ingestion, inhalation.

**Target organ statement:** Central Nervous System, Respiratory Tract

**Cancer statement:** None

**Sensitization:** May cause skin sensitization with contact.

**Warning caution labels:** Corrosive

**3. Composition/information on ingredients**

Chemical name	% w/w	CAS No.
Terpene Hydrocarbons	65 - 70	68956-56-9
Butoxyethanol	20 - 25	111-76-2
C12-14 Sec-Pareth-9	1 - 5	84133-50-6
Undeceth-3	1 - 5	34398-01-1
Ethanolamine	1 - 5	141-43-5
Dye	< 0.1	TS

**Comments:** If CAS number is "TS", the specific chemical identity has been withheld as a trade secret.

**4. First-aid measures**

**Eye:** Immediately flush eyes with water for at least 15 minutes, while holding eyelids open. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Seek medical attention immediately.

**Skin:** Remove contaminated clothing. Immediately flush with water followed by washing with mild soap. Seek medical attention.

**Ingestion:** Get immediate medical attention. Do not induce vomiting unless instructed to do so by poison center or physician.

**Inhalation:** Remove victim to fresh air and monitor. Seek medical advice if irritation develops or persists.

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

**Eye:** Severe burning sensation, tearing, redness, swelling.

**Skin:** Burning sensation, redness.

**Skin absorption:** Not Established

**Ingestion:** Irritation of mouth, throat, along with upset stomach, vomiting.

**Inhalation:** Headache, dizziness, nausea.

**Acute effects:** Corrosive to eyes. Causes moderate to severe skin irritation. Harmful if swallowed.

**Chronic effects:** Not Established

## 5. Fire-fighting measures

**Flammable class:** II (100-140F)

**General hazard:** Combustible Liquid

**Suitable extinguishing media:** Use Dry chemical, carbon dioxide, or water spray when fighting fires involving this material.

**Hazardous combustion products:** Carbon monoxide from combustion

**Explosion hazards:** Fire exposed containers may burst due to increased pressure from heat.

**Fire fighting procedures:** Keep fire exposed containers cool with water stream or mist.

**Fire fighting equipment:** Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with full face-piece operated in positive pressure mode.

**Sensitivity to static discharge:** Not Established

**Hazardous decomposition products:** Decomposition products may include: Carbon dioxide, Carbon monoxide, nitrogen oxides.

## 6. Accidental release measures

**Small spill:** Avoid walking in product. Wipe up or otherwise flush small spills to sanitary sewer.

**Large spill:** Avoid walking in material. Prevent product from entering into stream, soil, storm sewer or other bodies of water.

**Environmental precautions**

**Water spill:** Avoid discharges into open waterways and notify your local emergency services if this occurs.

**Land spill:** Avoid discharge to soil.

**Air spill:** No data available. Contact Env. Dept.

**General procedures:** Isolate spill or leak area immediately. Keep unauthorized personnel away. Do not touch or walk through spilled material. Prevent entry into waterways, sewers, or confined areas. Absorb with dry earth, sand or other non-combustible material and transfer to containers.

**Release notes:** Eliminate all ignition sources. Ventilate area well.

**Special protective equipment:** Eye protection, rubber gloves, rubber boots to protect feet.

## 7. Handling and storage

**General procedures:** Store away from excessive heat, spark or open flame. Store at temperatures below 140F. Keep container closed until used. Do not contaminate water, food, or feed by storage or disposal.

**Precautions for safe handling:** Wear chemical resistant rubber or neoprene gloves and eye safety goggles/full face shield when handling.

**Conditions for safe storage:** Store in closed container in an area inaccessible to children.

**Storage temperature:** Store at ambient temperatures.

**Storage pressure:** Store at ambient atmospheric pressure.

## 8. Exposure controls/personal protection

## Exposure controls

Control parameters				
	Occupational exposure limit values			
Chemical name	Type		ppm	mg/m <sup>3</sup>
Butoxyethanol	OSHA PEL	TWA	50	240
	ACGIH TLV	TWA	20	97
	Supplier OEL	TWA	NL	NL
		STEL	NL	NL
Ethanolamine	OSHA PEL	TWA	3	6
	ACGIH TLV	TWA	3	7.5
		STEL	6	15
	Supplier OEL	TWA	NL	NL
		STEL	NL	NL

**Appropriate engineering controls:** Provide mechanical ventilation when used in confined areas, or areas with poor ventilation.

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

**Eye / face protection:** Chemical splash goggles.

**Skin protection - hand protection:** Rubber or other chemical resistant gloves.

**Respiratory protection:** A respirator is not needed under normal and intended conditions of product use.

**Skin protection - other:** Chemical resistant outerwear (tyvek) if contact with spray or mist is anticipated.

**Occupational hygiene practices:** Always wash hands after handling chemical products, and before smoking, eating, drinking, or using toilet. Wash contaminated clothing or protective equipment before storage and re-use.

## 9. Physical and chemical properties

**Physical state:** Liquid

**Color:** Orange

**Odor:** Citrus

**Odor threshold:** Not Established

**pH:** 11.0 to 12.0

**Freezing point:** Not Available

**Initial boiling point and boiling range:** 170°C (338°F) to 177°C (351°F)

**Flash point:** 48°C (118°F) Tag Closed Cup (TCC)

**Evaporation rate (n-butyl acetate = 1):** (Water =1) <1.0

**Lower explosion limit / flammability limit:** 0.7

**Upper explosion limit / flammability limit:** 6.0

**Vapor pressure:** ~ 2 mm Hg at 20°C (68°F)

**Relative vapor density:** > 1 Air = 1

**Density:** 7.423 at 20°C (68°F)

**Relative density:** 0.89 grams/ml. at 20°C (68°F)

**Solubility:** dispersable

**Auto-ignition temperature:** Not Established

**Decomposition temperature:** Not Available

**Viscosity:** Water thin.

**Percent volatiles:** >90

**VOC content:** 91.47 % by weight

## 10. Stability and reactivity

**Reactivity:** Stable

**Dangerous polymerization:** None known.

**Chemical stability:** Stable under normal storage and use conditions.

**Conditions to avoid:** Heat, flames and sparks.

**Hazardous decomposition products:** Not Established

**Incompatible materials:** Strong oxidizers

## 11. Toxicological information

**Acute toxicity**

Chemical name	LD <sub>50</sub> (oral) mg/kg(rat)	LD <sub>50</sub> (dermal) mg/kg(rabbit)	LC <sub>50</sub> (inhalation) mg/l
Butoxyethanol	1300 mg/kg (rat)	> 2000 mg/kg (rabbit)	> 3.1 mg/l
C12-14 Sec-Pareth-9	> 412 mg/kg (rat)	> 14000 mg/kg (rat)	1.06 mg/l (Rat), Aerosol
Ethanolamine	1089 mg/kg (rat)	2504 mg/kg (rat)	~ 1.48 mg/l

**Acute dermal toxicity LD<sub>50</sub>:** Not Established

**Acute oral toxicity LD<sub>50</sub>:** Not Established

**Acute inhalation toxicity LC<sub>50</sub>:** Not Established

**Skin corrosion / irritation:** Irritant

**Serious eye damage / irritation:** Corrosive

**Respiratory or skin sensitization:** May cause sensitization by skin contact.

**Germ cell mutagenicity:** No known significant effects or critical hazards.

**Carcinogenicity**

Chemical name	IARC
Butoxyethanol	Group 3 - Not classifiable as to its carcinogenicity to Humans

**IARC:**

The International Agency for Research on Cancer (IARC) has concluded that there is inadequate evidence for carcinogenicity of Butoxyethanol in humans, but limited evidence in experimental animals (Group 3 - not classifiable as to its carcinogenicity to humans).

**Notes:** No known significant effects or critical hazards.

**Reproductive toxicity:** No known significant effects or critical hazards.

**Specific Target Organ Toxicity - single exposure:** May cause respiratory irritation and depression of the central nervous system with drowsiness, dizziness, weakness, loss of consciousness, nausea and headache.

**Specific Target Organ Toxicity - repeated exposure:** Not Established

**Aspiration hazard:** Yes

## 12. Ecological information

**Ecotoxicological information:** This product is toxic to aquatic life

**Aquatic toxicity, both acute and chronic:** Not Established

**Persistence and degradability:** Not Established

**Bioaccumulative potential:** Not Established

**Environmental data:** Toxic to aquatic life with long lasting effects.

## 13. Disposal considerations

**Disposal methods:** Any method in accordance with local, state and federal laws. Best method is to recycle or reuse for intended purpose. If discarded, this material and its containers should be treated as hazardous waste based on the characteristics of ignitability as defined under federal RCRA regulations (40 CFR 261). Consult local authorities for disposal into public sewer.

**For large spills:** Consult with local and state authorities for large volume disposal.

**Product disposal:** Any method in accordance with local, state, and federal laws. Best method is to recycle or reuse for intended purpose.

**Empty container:** Rinse container with clear water. Offer container for recycling, or dispose of in trash.

**RCRA/EPA waste information:** Ignitability

**RCRA hazard class:** D001

## 14. Transport information

**USA Department of Transport Regulations (DOT)**

**UN proper shipping name:** Cleaning Compound, not regulated (for US domestic shipment only)

**DOT other shipping information:** Under 49 CFR 173.150(f), this product has been reclassified as a Combustible Liquid and, as such, meets the requirements of Exceptions for Class 3 (flammable liquids) for domestic transportation by ground ONLY.

**ICAO - air**

**UN proper shipping name:** Contact manufacturer for more information.

**Note:** Not Approved

**IMDG - sea**

**UN proper shipping name:**

Flammable Liquid, n.o.s.

**Technical name:** Terpene Hydrocarbon Solution

**UN number:** 1993

**Transport hazard class(es):** 3

**Packing group, if applicable:** III

**EmS:** 3-07

**Environmental hazards - marine pollutant:** Yes

**Placards:** Flammable

**Hazard label:** Flammable, Marine Pollutant

**Note:** Above information for containers greater than 5 gallons. Consult manufacturer for container shipping information of less than 5 gallons.

## 15. Regulatory information

### UNITED STATES

#### SARA Section 311/312 Hazard Categories

**311/312 Health hazards:** Health Hazard - Acute; Fire Hazard

#### EPCRA Section 313 Toxic Chemicals

Chemical name	% w/w	CAS No.	Comments
Butoxyethanol	20 - 25	111-76-2	N230 Certain Glycol Ethers

#### EPCRA Section 302 Extremely Hazardous Substances

**EPCRA Status:** No listed substance

#### CERCLA Hazardous Substances and Reportable Quantities (RQ)

**CERCLA regulatory:** No products were found.

**CERCLA rq:** Not Established

#### TSCA (The Toxic Substances Control Act)

**TSCA regulatory:** All ingredients are listed on the TSCA Chemical Inventory.

#### States with special requirements

Chemical name	Requirements
Butoxyethanol	Massachusetts Right to Know Substance Pennsylvania Right to Know Substance New Jersey Right To Know Substance
Ethanolamine	Massachusetts Right to Know Substance New Jersey Right To Know Substance New York Right to Know Substance Pennsylvania Right to Know Substance

**California Proposition 65:** No listed substance

#### Carcinogen:

The International Agency for Research on Cancer (IARC) has concluded that there is inadequate evidence for carcinogenicity of Butoxyethanol in humans, but limited evidence in experimental animals (Group 3 - not classifiable as to its carcinogenicity to humans).

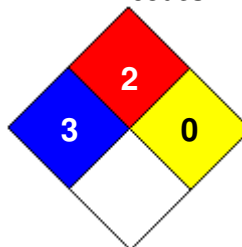
## 16. Other information

**Date Prepared:** 11/10/2023

#### HMIS rating

Health	3
Flammability	2
Physical hazard	0
Personal protection	D

#### NFPA codes



**Manufacturer disclaimer:** This company cannot anticipate all conditions of handling and use of this product. Therefore, this company accepts no responsibility for results obtained by the application of this information, or the safety and suitability of the product either alone or in combination with other products. It is the responsibility of the employer and/or user to provide a safe workplace, using health and safety information contained herein as a guide. This company will accept no liability for damages or losses incurred from the improper handling and use of this product.