

SAFETY DATA SHEET

SECTION 1) CHEMICAL PRODUCT AND SUPPLIER'S IDENTIFICATION

CAS Number: 1338-43-8 (Sorbitan Monooleate)
Product Name: SMO
Revision Date: Oct 09, 2020 **Date Printed:** Oct 22, 2020
Version: 1.0 **Supersedes Date:** N.A.
Manufacturer's Name: Thames River Chemical Corp.
Address: 5230 Harvester Road Burlington, ON, CA, L7L 4X4
Emergency Phone: CHEMTREC (800) 424-9300
Information Phone Number: 905-681-5353
Fax: 905-681-5377
Product/Recommended Uses: For laboratory or industrial use only.

SECTION 2) HAZARDS IDENTIFICATION

Classification

Not a hazardous substance or mixture according to United States Occupational Safety and Health Administration (OSHA) Hazard Communication Standard (29 CFR 1910.1200).

Pictograms

None

2.2 Label Elements

None.

Signal Word

No signal word available.

Precautionary Statements - General

Read label before use.

Precautionary Statements - Prevention

Keep container tightly closed.

Do not get in eyes, on skin, or on clothing.

Wear protective gloves/protective clothing/eye protection/face protection.

SECTION 3) COMPOSITION/INFORMATION ON INGREDIENTS

CAS	Chemical Name	% By Weight
0001338-43-8	SORBITAN MONOOLEATE	100%

SECTION 4) FIRST-AID MEASURES

Inhalation

Remove source of exposure or move person to fresh air and keep comfortable for breathing.

Inhalation

Move to fresh air. Treat symptomatically.
If symptoms persist, call a physician.

Eye Contact

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.
If easy to do, remove contact lens, if worn.
Protect unharmed eye.
Keep eye wide open while rinsing.
If eye irritation persists, consult a specialist.

Eye Contact

Rinse eyes cautiously with lukewarm, gently flowing water for several minutes, while holding the eyelids open. Remove contact lenses, if present and easy to do. Continue rinsing for a duration of 15-20 minutes or until medical aid is available. Seek medical attention.

Skin Contact

Rinse skin with water/shower and mild soap for 5 minutes or until product is removed.

Skin Contact

Wash off with soap and plenty of water. Consult a physician.

Take off contaminated clothing, shoes and leather goods (e.g. watchbands, belts). Wash contaminated clothing before re-use or discard.

Ingestion

Rinse mouth. Do NOT induce vomiting. If vomiting occurs naturally, lie on your side, in the recovery position.

Most Important Symptoms and Effects, Both Acute and Delayed

No data available.

Indication of Any Immediate Medical Attention and Special Treatment Needed

No data available.

SECTION 5) FIRE-FIGHTING MEASURES

Suitable Extinguishing Media

Carbon dioxide, dry chemical, foam, water spray, fog.

Unsuitable Extinguishing Media

No data available.

Specific Hazards in Case of Fire

Emits toxic fumes under fire conditions.

Fire will produce irritating gases.

Fire-fighting Procedures

No data available.

Special Protective Actions

Wear self-contained breathing apparatus and full protective clothing.

Wear positive pressure self-contained breathing apparatus (SCBA) and full turnout gear.

5.3 Advice for firefighters

Firefighters should wear NIOSH/MSHA approved self-contained, breathing apparatus and full protective clothing

SECTION 6) ACCIDENTAL RELEASE MEASURES

Emergency Procedure

Do not touch damaged containers or spilled materials unless wearing appropriate protective clothing. Ventilate closed spaces before entering.

Recommended Equipment

Wear chemical protective clothing.

Wear appropriate personal protective equipment.

Personal Precautions

DO NOT get on skin, eyes or clothing.

ELIMINATE all ignition sources (no smoking, flares, sparks or flames in immediate area).

Environmental Precautions

Stop spill/release if it can be done safely. Prevent spilled material from entering sewers, storm drains, other unauthorized drainage systems and natural waterways by using sand, earth, or other appropriate barriers.

Methods and Materials for Containment and Cleaning up

Dispose of contaminated materials according to federal, state and local regulations.

Absorb Liquids in vermiculite, dry sand, earth, or similar inert material and deposit in sealed containers for disposal.

6.2 Environmental Precautions

Prevent spilled material from entering sewers, storm drains, other unauthorized drainage systems and natural waterways by using sand, earth, or other appropriate barriers.

6.3 Methods and Materials for Containment and Cleaning up

For small spills add absorbent(soil may be used in the absence of other suitable materials) And use a non-sparking or explosion proof means to transfer material to a sealed, appropriate container for disposal. For large spills dike spilled material or otherwise contain material to ensure runoff does not reach a waterway. Minimize contact of spilled material with soils to prevent runoff to surface waterways.

SECTION 7) HANDLING AND STORAGE

General

Wash hands after use. Do not get in eyes, on skin or on clothing. Use good personal hygiene practices. Eating, drinking and smoking in work areas is prohibited. Remove contaminated clothing and protective equipment before entering eating areas. Eyewash stations and showers should be available in areas where this material is used and stored

Ventilation Requirements

Use only with adequate ventilation to control air contaminants to their exposure limits.

Storage Room Requirements

Store protected from moisture.

Store in dry, cool areas, out of direct sunlight and away from other sources of heat. Store in original containers. Keep containers securely sealed.

7.2 Conditions for safe storage, including any incompatibilities

Store in tightly closed containers. Store in an area that is dry, well-ventilated, away from incompatible materials(see Section 10. Stability and Reactivity)

SECTION 8) EXPOSURE CONTROLS/PERSONAL PROTECTION

Eye protection

Wear safety glasses with side shields

Skin Protection

Use of gloves approved to relevant standards made from the following materials may provide suitable chemical protection: PVC, neoprene or nitrile rubber gloves. Suitability and durability of a glove is dependent on usage, e.g. frequency and duration of contact, chemical resistance of glove material, glove thickness, dexterity. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory Protection

If engineering controls do not maintain airborne concentrations to a level which is adequate to protect worker, a respiratory protection program that meets or is equivalent to OSHA 29 CFR 1910.134 should be followed. Check with respiratory protective equipment suppliers.

Appropriate Engineering Controls

Showers, eyewash stations, and ventilation system.

Provide exhaust ventilation or other engineering controls to keep the airborne concentrations of vapors below their respective threshold

limit value.

8.2 Exposure Controls

Eye contact should be prevented through use of chemical safety glasses with side shields or splash proof goggles.

An emergency eye wash must be readily accessible to the work area.

Chemical Name	CANsmg	CANsppm	CANtmg	CANtppm	OSHA STEL (mg/m3)	OSHA STEL (ppm)	OSHA TWA (mg/m3)	OSHA TWA (ppm)
No applicable chemical	-	-	-	-	-	-	-	-

Chemical Name	OSHA Carcinogen	OSHA Tables (Z1, Z2, Z3)	OSHA Skin designation	ACGIH STEL (mg/m3)	ACGIH STEL (ppm)	ACGIH TWA (mg/m3)	ACGIH TWA (ppm)	ACGIH TLV Basis
No applicable chemical	-	-	-	-	-	-	-	-

Chemical Name	ACGIH Carcinogen	ACGIH Notations
No applicable chemical	-	-

SECTION 9) PHYSICAL AND CHEMICAL PROPERTIES

Physical and Chemical Properties

Density	8.35 lb/gal
Specific Gravity	1.00
Appearance	Clear to Slightly Hazy, Yellow to Amber liquid
Odor Description	Sweet
Odor Threshold	N/A
pH	N/A
Melting/Freezing Point	-16 °C
Low Boiling Point	300 °C
High Boiling Point	N/A
Flash Point	149 °C
Vapor Pressure	<0.01 @ 20°C mmHg
Vapor Density	N/A
Evaporation Rate	<0.01
Upper Explosion Level	N/A
Lower Explosion Level	N/A
Water Solubility	Insoluble in water
Coefficient Water/Oil	N/A
Viscosity	1000 cps @ 25°C

SECTION 10) STABILITY AND REACTIVITY

Reactivity

No data available.

Stability

Stable under normal storage and handling conditions.

Conditions to Avoid

Avoid extreme heat, moisture and dust formation.

Heat, flames and sparks.

Avoid contact with incompatible materials.

10.2 Chemical Stability

Stable under normal storage and handling conditions.

Hazardous Reactions/Polymerization

Hazardous polymerization will not occur.

Incompatible Materials

Strong oxidizing agents. Avoid heat, sparks, open flames and other ignition sources. Avoid temperatures exceeding the flash point.

Strong oxidizing agents, acids, bases and sources of ignition.

10.6 Hazardous Decomposition Products

Carbon monoxide, Carbon dioxide (CO₂), Nitrogen oxides (NO_x)

SECTION 11) TOXICOLOGICAL INFORMATION

Acute Toxicity

LD50 Oral: Rat > 39800 mg/kg - Relatively harmless

Information on toxicological effects

Carcinogenicity

Not listed by ACGIH, IARC, NIOSH, NTP, or OSHA.

Germ Cell Mutagenicity

None.

Reproductive Toxicity

None.

Respiratory/Skin Sensitization

Minimal irritation, if any

Serious Eye Damage/Irritation

Minimal irritation, if any

Skin Corrosion/Irritation

Causes mild skin irritation

Specific Target Organ Toxicity - Repeated Exposure

None.

Likely Routes of Exposure

Inhalation, Ingestion, Skin contact, Eye contact

SECTION 12) ECOLOGICAL INFORMATION

Toxicity

Toxicity

LC50 Fish (Rainbow trout) > 1000 mg/l: No effects expected at WSL (water solubility limit)

EC50 Aquatic Invertebrates (Daphnia magna) > WSL: No effects expected at WSL (water solubility limit)

EC50 Aquatic Plants (Algae) > WSL: No effects expected at WSL (water solubility limit)

Mobility in Soil

Moderate

Persistence and degradability

This product is biodegradable

Bioaccumulative potential

Bio-accumulative Potential

Low potential for bioaccumulation.

Persistence and Degradability

Readily Biodegradable, 62% in 28d

Other Adverse Effects

No data available.

SECTION 13) DISPOSAL CONSIDERATIONS

Waste Disposal

Ontario Class 211 -Aromatic solvents and residues

It is the responsibility of the user of the product to determine at the time of disposal whether the product meets local criteria for hazardous waste. Waste management should be in full compliance with national, provincial and local laws.

SECTION 14) TRANSPORT INFORMATION

	Transport Canada Information	U.S. DOT Information
UN number:	Not Regulated	Not Regulated
Proper shipping name:	N/A	N/A
Hazard class:	Not Applicable	Not Applicable
Packaging group:	Not Applicable	Not Applicable
Hazardous substance (RQ):		No Data Available
Marine Pollutant:	No Data Available	No Data Available
Note / Special Provision:	No Data Available	No Data Available
Toxic-Inhalation Hazard:		No Data Available
Transport in bulk (according to Annex II of MARPOL 73/78):	No Data Available	

SECTION 15) REGULATORY INFORMATION

CAS	Chemical Name	% By Weight	Regulation List
0001338-43-8	SORBITAN MONOOLEATE	100%	DSL,TSCA,EU_EC_Inventory

SECTION 16) OTHER INFORMATION

Glossary

ACGIH- American Conference of Governmental Industrial Hygienists; ANSI- American National Standards Institute; Canadian TDG- Canadian Transportation of Dangerous Goods; CANsmg or CANspmm - Canadian Short Term Exposure Level in mg/L or in ppm; CANTmg or CANTppm - Canadian Time Weighted Average in mg/L or in ppm; CAS- Chemical Abstract Service; Chemtrec- Chemical Transportation Emergency Center(US); CHIP- Chemical Hazard Information and Packaging; DSL- Domestic Substances List; EC- Equivalent Concentration; EH40 (UK)- HSE Guidance Note EH40 Occupational Exposure Limits; EPCRA- Emergency Planning and Community Right-To-Know Act; ESL Effects screening levels; HMIS- Hazardous Material Information Service; LC- Lethal Concentration; LD- Lethal Dose; NFPA- National Fire Protection Association; OEL- Occupational Exposure Limits; OSHA- Occupational Safety and Health

Administration, US Department of Labor; PEL- Permissible Exposure Limit; SARA (Title III)- Superfund Amendments and Reauthorization Act; SARA 313- Superfund Amendments and Reauthorization Act, Section 313; SCBA- Self Contained Breathing Apparatus; STEL-Short Term Exposure Limit; TCEQ Texas Commission on Environmental Quality; TLV- Threshold Limit Value; TSCA- Toxic Substances Control Act Public Law 94-469; TWA Time Weighted Value; US DOT- US Department of Transportation; WHMIS- Workplace Hazardous Materials Information System.

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