

Material Safety Data Sheet

Aerosol OT Solution 75%

ACC# 00409

Section 1 - Chemical Product and Company Identification

MSDS Name: Aerosol OT Solution 75%

Catalog Numbers: A345-500

Synonyms: Sodium dioctyl sulfosuccinate in mixture of ethanol and water.

Company Identification:

Fisher Scientific

1 Reagent Lane

Fair Lawn, NJ 07410

For information, call: 201-796-7100

Emergency Number: 201-796-7100

For CHEMTREC assistance, call: 800-424-9300

For International CHEMTREC assistance, call: 703-527-3887

Section 2 - Composition, Information on Ingredients

| CAS# | Chemical Name | Percent | EINECS/ELINCS |
|-----------|-------------------------------|---------|---------------|
| 577-11-7 | Dioctyl sodium sulfosuccinate | 73-75 | 209-406-4 |
| 7732-18-5 | Water | 18-21 | 231-791-2 |
| 64-17-5 | Ethyl alcohol | 6-7 | 200-578-6 |
| 104-76-7 | 2-Ethylhexanol | <1 | 203-234-3 |
| 67-64-1 | Acetone | <0.55 | 200-662-2 |

Section 3 - Hazards Identification

EMERGENCY OVERVIEW

Appearance: clear colorless liquid. Flash Point: 29 deg C.

Warning! Flammable liquid and vapor. Causes eye and skin irritation. May cause central nervous system depression. May cause reproductive and fetal effects.

Target Organs: Central nervous system, eyes, skin.

Potential Health Effects

Eye: Causes eye irritation.

Skin: Causes skin irritation. A single prolonged skin exposure is not likely to result in the material being absorbed in harmful amounts. In a modified Draize-Shelanski repeat-insult patch test, sodium dioctyl sulfosuccinate showed little evidence of irritation and no evidence of eliciting an allergic response in human subjects.(Cytec)

Ingestion: No hazard expected in normal industrial use. May cause central nervous system depression.

Inhalation: May cause respiratory tract irritation. Overexposure produces central nervous system depression.

Chronic: Prolonged or repeated exposure may cause adverse reproductive effects.

Section 4 - First Aid Measures

Eyes: In case of contact, immediately flush eyes with plenty of water for a t least 15 minutes. Get medical aid.

Skin: In case of contact, flush skin with plenty of water. Remove contaminated clothing and shoes. Get medical aid if irritation develops and persists. Wash clothing before reuse.

Ingestion: If swallowed, do not induce vomiting unless directed to do so by medical personnel. Never give anything by mouth to an unconscious person. Get medical aid.

Inhalation: If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical aid.

Notes to Physician: Treat symptomatically and supportively.

Section 5 - Fire Fighting Measures

General Information: As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear. Vapors can travel to a source of ignition and flash back. Use water spray to keep fire-exposed containers cool. Vapors may be heavier than air. They can spread along the ground and collect in low or confined areas.

Extinguishing Media: Solid streams of water may be ineffective and spread material. Use water spray, alcohol foam, CO2, dry chemical.

Flash Point: 29 deg C (84.20 deg F)

Autoignition Temperature: Not available.

Explosion Limits, Lower:3.3%for EtOH

Upper: 19%for EtOH

NFPA Rating: (estimated) Health: 2; Flammability: 3; Instability: 0

Section 6 - Accidental Release Measures

General Information: Use proper personal protective equipment as indicated in Section 8.

Spills/Leaks: Absorb spill with inert material (e.g. vermiculite, sand or earth), then place in suitable container. Avoid runoff into storm sewers and ditches which lead to waterways. Remove all sources of ignition. A vapor suppressing foam may be used to reduce vapors. Water spray may reduce vapor but may not prevent ignition in closed spaces.

Section 7 - Handling and Storage

Handling: Wash thoroughly after handling. Ground and bond containers when transferring material. Use spark-proof tools and explosion proof equipment. Avoid contact with eyes, skin, and clothing. Keep container tightly closed. Use only with adequate ventilation. Keep away from heat, sparks and flame. Avoid breathing vapor or mist.

Storage: Keep away from sources of ignition. Store in a tightly closed container. Store in a cool, dry, well-ventilated area away from incompatible substances. Keep containers closed as evaporation of water and solvent may cause gelation.

Section 8 - Exposure Controls, Personal Protection

Engineering Controls: Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use adequate general or local exhaust ventilation to keep airborne concentrations below the permissible exposure limits.

Exposure Limits

| Chemical Name | ACGIH | NIOSH | OSHA - Final PELs |
|-------------------------------|---------------------------|---|--|
| Diethyl sodium sulfosuccinate | none listed | none listed | none listed |
| Water | none listed | none listed | none listed |
| Ethyl alcohol | 1000 ppm TWA | 1000 ppm TWA; 1900 mg/m ³ TWA 3300 ppm IDLH | 1000 ppm TWA; 1900 mg/m ³ TWA |
| 2-Ethylhexanol | none listed | none listed | none listed |
| Acetone | 500 ppm TWA; 750 ppm STEL | 250 ppm TWA; 590 mg/m ³ TWA 2500 ppm IDLH | 1000 ppm TWA; 2400 mg/m ³ TWA |

OSHA Vacated PELs: Diethyl sodium sulfosuccinate: No OSHA Vacated PELs are listed for this chemical. Water: No OSHA Vacated PELs are listed for this chemical. Ethyl alcohol: 1000 ppm TWA; 1900 mg/m³ TWA 2-Ethylhexanol: No OSHA Vacated PELs are listed for this chemical. Acetone: 750 ppm TWA; 1800 mg/m³ TWA

Personal Protective Equipment

Eyes: Wear chemical splash goggles.

Skin: Wear appropriate protective gloves to prevent skin exposure.

Clothing: Wear appropriate protective clothing to prevent skin exposure.

Respirators: Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced.

Section 9 - Physical and Chemical Properties

Physical State: Liquid

Appearance: clear colorless

Odor: faint odor

pH: 5-7 (1% aq soln)

Vapor Pressure: Not available.

Vapor Density: Not available.

Evaporation Rate: Not available.

Viscosity: Not available.

Boiling Point: 78 deg C

Freezing/Melting Point: Not available.

Decomposition Temperature: Not available.

Solubility: 1.5 g/100 ml @ 25°C

Specific Gravity/Density: 1.09

Molecular Formula: Not applicable.

Molecular Weight: Not available.

Section 10 - Stability and Reactivity

Chemical Stability: Stable under normal temperatures and pressures.

Conditions to Avoid: Ignition sources, excess heat, allowing solvents to evaporate.

Incompatibilities with Other Materials: Strong oxidizing agents, strong acids, strong bases, steel.

Hazardous Decomposition Products: Carbon monoxide, oxides of sulfur, carbon dioxide.

Hazardous Polymerization: Will not occur.

Section 11 - Toxicological Information

RTECS#:

CAS# 577-11-7: WN0525000

CAS# 7732-18-5: ZC0110000

CAS# 64-17-5: KQ6300000

CAS# 104-76-7: MP0350000

CAS# 67-64-1: AL3150000

LD50/LC50:

CAS# 577-11-7:

Draize test, rabbit, eye: 250 ug Mild;
Draize test, rabbit, eye: 1% Severe;
Draize test, rabbit, skin: 10 mg/24H Moderate;
Oral, mouse: LD50 = 2643 mg/kg;
Oral, rat: LD50 = 1900 mg/kg;

CAS# 7732-18-5:

Oral, rat: LD50 = >90 mL/kg;

CAS# 64-17-5:

Draize test, rabbit, eye: 500 mg Severe;
Draize test, rabbit, eye: 500 mg/24H Mild;
Draize test, rabbit, skin: 20 mg/24H Moderate;
Inhalation, mouse: LC50 = 39 gm/m3/4H;
Inhalation, rat: LC50 = 20000 ppm/10H;
Oral, mouse: LD50 = 3450 mg/kg;
Oral, rabbit: LD50 = 6300 mg/kg;
Oral, rat: LD50 = 7060 mg/kg;
Oral, rat: LD50 = 9000 mg/kg;

CAS# 104-76-7:

Draize test, rabbit, eye: 20 mg Severe;
Draize test, rabbit, eye: 20 mg/24H Moderate;
Draize test, rabbit, skin: 500 mg/24H Moderate;
Oral, mouse: LD50 = 2500 mg/kg;
Oral, rabbit: LD50 = 1180 mg/kg;
Oral, rat: LD50 = 3730 mg/kg;
Skin, rabbit: LD50 = 1970 mg/kg;
Skin, rat: LD50 = >3 gm/kg;

CAS# 67-64-1:

Dermal, guinea pig: LD50 = >9400 uL/kg;
Draize test, rabbit, eye: 20 mg Severe;
Draize test, rabbit, eye: 20 mg/24H Moderate;
Draize test, rabbit, eye: 10 uL Mild;
Draize test, rabbit, skin: 500 mg/24H Mild;
Inhalation, mouse: LC50 = 44 gm/m3/4H;
Inhalation, rat: LC50 = 50100 mg/m3/8H;
Oral, mouse: LD50 = 3 gm/kg;
Oral, rabbit: LD50 = 5340 mg/kg;
Oral, rat: LD50 = 5800 mg/kg;

The estimated acute oral (rat) LD50 and acute dermal (rabbit) LD50 values for this material are >5.0 g/kg and >10.0 g/kg, respectively.
The 4-hour LC50 value is estimated to be >2,500 ppm.

Carcinogenicity:

CAS# 577-11-7: Not listed by ACGIH, IARC, NTP, or CA Prop 65.
CAS# 7732-18-5: Not listed by ACGIH, IARC, NTP, or CA Prop 65.
CAS# 64-17-5: Not listed by ACGIH, IARC, NTP, or CA Prop 65.
CAS# 104-76-7: Not listed by ACGIH, IARC, NTP, or CA Prop 65.
CAS# 67-64-1: Not listed by ACGIH, IARC, NTP, or CA Prop 65.

Epidemiology: No information available.**Teratogenicity:** Repeated ingestion of ethanol by pregnant mothers has been shown to adversely affect the central nervous system of the fetus, producing a collection of effects which together constitute the fetal alcohol syndrome.**Reproductive Effects:** No information found**Mutagenicity:** No information available.**Neurotoxicity:** No information available.**Other Studies:****Section 12 - Ecological Information**

Ecotoxicity: Fish: Bluegill/Sunfish: 54.5 mg/L; 96 hr LC50 Fish: Rainbow trout: 35.4 mg/L; 96 hr LC50 Water flea Daphnia: 35.9 mg/L; 48 hr LC50

Section 13 - Disposal Considerations

Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261.3. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.

RCRA P-Series: None listed.**RCRA U-Series:**

CAS# 67-64-1: waste number U002 (Ignitable waste).

Section 14 - Transport Information

| | US DOT | Canada TDG |
|-----------------------|---------------------------|---------------------------|
| Shipping Name: | FLAMMABLE LIQUIDS, N.O.S. | No information available. |
| Hazard Class: | 3 | |
| UN Number: | UN1993 | |
| Packing Group: | III | |

Section 15 - Regulatory Information

US FEDERAL

TSCA

CAS# 577-11-7 is listed on the TSCA inventory.
CAS# 7732-18-5 is listed on the TSCA inventory.
CAS# 64-17-5 is listed on the TSCA inventory.
CAS# 104-76-7 is listed on the TSCA inventory.
CAS# 67-64-1 is listed on the TSCA inventory.

Health & Safety Reporting List

CAS# 104-76-7: Effective 6/1/87, Sunset 12/19/95

Chemical Test Rules

CAS# 67-64-1: Test for Health Effects

Section 12b

None of the chemicals are listed under TSCA Section 12b.

TSCA Significant New Use Rule

None of the chemicals in this material have a SNUR under TSCA.

CERCLA Hazardous Substances and corresponding RQs

CAS# 67-64-1: 5000 lb final RQ; 2270 kg final RQ

SARA Section 302 Extremely Hazardous Substances

None of the chemicals in this product have a TPQ.

SARA Codes

CAS # 577-11-7: immediate.
CAS # 64-17-5: immediate, delayed, fire.
CAS # 104-76-7: immediate, fire.
CAS # 67-64-1: immediate, fire.

Section 313

No chemicals are reportable under Section 313.

Clean Air Act:

This material does not contain any hazardous air pollutants.
This material does not contain any Class 1 Ozone depleters.
This material does not contain any Class 2 Ozone depleters.

Clean Water Act:

None of the chemicals in this product are listed as Hazardous Substances under the CWA.
None of the chemicals in this product are listed as Priority Pollutants under the CWA.
None of the chemicals in this product are listed as Toxic Pollutants under the CWA.

OSHA:

None of the chemicals in this product are considered highly hazardous by OSHA.

STATE

CAS# 577-11-7 is not present on state lists from CA, PA, MN, MA, FL, or NJ.
CAS# 7732-18-5 is not present on state lists from CA, PA, MN, MA, FL, or NJ.
CAS# 64-17-5 can be found on the following state right to know lists: California, New Jersey, Pennsylvania, Minnesota, Massachusetts.
CAS# 104-76-7 can be found on the following state right to know lists: Pennsylvania, Massachusetts.
CAS# 67-64-1 can be found on the following state right to know lists: California, New Jersey, Pennsylvania, Minnesota, Massachusetts.

California Prop 65

WARNING: This product contains Ethyl alcohol, a chemical known to the state of California to cause developmental reproductive toxicity.
California No Significant Risk Level: None of the chemicals in this product are listed.

European/International Regulations

European Labeling in Accordance with EC Directives

Hazard Symbols:

XI

Risk Phrases:

R 10 Flammable.
R 36/38 Irritating to eyes and skin.

Safety Phrases:

S 16 Keep away from sources of ignition - No smoking.
S 24/25 Avoid contact with skin and eyes.

WGK (Water Danger/Protection)

CAS# 577-11-7: 2
CAS# 7732-18-5: No information available.
CAS# 64-17-5: 0
CAS# 104-76-7: 2
CAS# 67-64-1: 0

Canada - DSL/NDSL

CAS# 577-11-7 is listed on Canada's DSL List.
CAS# 7732-18-5 is listed on Canada's DSL List.
CAS# 64-17-5 is listed on Canada's DSL List.
CAS# 104-76-7 is listed on Canada's DSL List.

CAS# 67-64-1 is listed on Canada's DSL List.

Canada - WHMIS

This product has a WHMIS classification of B2, D2B.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all of the information required by those regulations.

Canadian Ingredient Disclosure List

CAS# 577-11-7 is listed on the Canadian Ingredient Disclosure List.

CAS# 64-17-5 is listed on the Canadian Ingredient Disclosure List.

CAS# 104-76-7 is listed on the Canadian Ingredient Disclosure List.

CAS# 67-64-1 is listed on the Canadian Ingredient Disclosure List.

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| Section 16 - Additional Information |
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MSDS Creation Date: 2/02/1999

Revision #7 Date: 3/22/2006

The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall Fisher be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential or exemplary damages, howsoever arising, even if Fisher has been advised of the possibility of such damages.