



SIGMA-ALDRICH

Material Safety Data Sheet

Date Printed: 07/23/2004
Date Updated: 05/26/2004
Version 1.60

Section 1 - Product and Company Information

Product Name: Brij 35
Product Number: 858366
Brand: Aldrich Chemical
Company: Sigma-Aldrich
Street Address: 3050 Spruce Street
City, State, Zip, Country: SAINT LOUIS, MO 63103 US
Technical Phone: 314 771 5765
Fax: 800 325 5052
Emergency Phone: 414 273 3850 Ext. 5996

Section 2 - Composition/Information on Ingredient

Table with 5 columns: Substance Name, CAS #, SARA 313, EC no, Annex I Index Number. Row 1: BRIJ, 9002-92-0, No, [blank], [blank]

Formula Synonyms: Aldospense L 9, ASK-010, Atlas G-2133, Atlas G-3705, BASE LP 12, BL 9, BL 9EX, Brij 23, Brij 30, Brij 35, Brij 30SP, Chimipal AE 3, Cimigel, Dehydrol LS 4, Depeg, DO 9, Dodecanol, ethoxylate, Dodecanol-ethylene oxide (9.5 moles) condensate, Dodecanol, polyethoxylated, Dodecyl alcohol, ethoxylated, alpha-Dodecyl-omega-hydroxy-polyoxyethylene, Dodecyl-polyaethylenoxyd-aether (German), Dodecyl poly(oxyethylene)ether, Du Pont WK, EMAL 108, Emalex 715, Emulgen 100, Emulgen 105, Emulgen 108, Emulgen 109, Emulgen 120, Emulgen 147, Emulmin L 500, Ethal LA-X, Ethospense LA-4, Ethospense LA 12, Ethospense LA 23, Ethoxylated lauryl alcohol, G 3707, G 3711, G-2130A, Hydroxypolyethoxydodecane, LA 7, LA (Alcohol), Lanettes, Laureth, Laureth 9, Laureth 12, Laureth 23, Lauromacrogol, Lauromacrogol 400, Lauryl alcohol, ethoxylated, Lauryl polyethylene glycol ether, Lauryl poly(oxyethylene) ether, Lipal 4LA, Lipocol L-4, Lipocol L 12, Lipocol L-23, Lubrol 12A9, Lubrol PX, Maripal 1217, Mergital LM 11, NCI-C54875, Newcol 1203, Nikkol BL, Nikkol BL 25, Nikkol BL 42, Nikkol BL 9EX, Nissan nonion K 220, Noigen ET 83, Noigen ET 102, Noigen ET 143, Noigen ET 160, Noigen ET 170, Noigen ET 190, Noigen P, Noigen YX 400, Noigen YX 500, Noniolite AL 20, Oxyethylenated dodecyl alcohol, PEG n-dodecyl ether, Pegnol L 12, Pegnol L 20, Peregol O 20, Plurafac RA 43, Polidocanol, Polyethoxylated dodecanol, Polyethylene glycol dodecyl ether, Polyethylene glycol lauryl ether, Poly(ethylene oxide) dodecyl ether, Poly(oxy-1,2-ethanediyl), alpha-dodecyl-omega-hydroxy-, Polyoxyethylene lauric alcohol, Polyoxyethylene lauryl alcohol, Poly(oxyethylene) monolauryl ether, Rokanol L, Rokanol L 2, Rokanol L 4, Rokanol L 6, Rokanol L 8, Rokanol L 10/80, Romopal LN, Simulol 330 M, Simulsol P 4, Simulsol P 23, Siponic L, Siponic L 3, Siponic L-4, Siponic L 10, Siponic L 15, Siponic L 150, Siponic L 7-90, Slovasol S, Slovasol SF, Standamul LA 2, Surfactant WK, Teic 12A, Texofor B 9, Texofor B 30, Thesat, Thesit, Trycol LAL 12, Trycol LAL series, Value 2205, YX 500

Section 3 - Hazards Identification

Emergency Overview: Harmful. Harmful if swallowed. Irritating to skin. Risk of serious damage to eyes.

HMIS Rating: Health: 2, Flammability: 0, Reactivity: 0

NFPA Rating: Health: 2, Flammability: 0, Reactivity: 0

For additional information on toxicity, please refer to Section 11.

Section 4 - First Aid Measures

Oral Exposure: If swallowed, wash out mouth with water provided person is conscious. Call a physician.
Inhalation Exposure: If inhaled, remove to fresh air. If not breathing give artificial respiration. If breathing is difficult, give oxygen.
Dermal Exposure: In case of contact, immediately wash skin with soap and copious amounts of water.
Eye Exposure: In case of contact, immediately flush eyes with copious amounts of water for at least 15 minutes.

Section 5 - Fire Fighting Measures

Flash Point: 235 °F, 113 °C
Autoignition Temp: N/A
Extinguishing Media: Suitable. Water spray, Carbon dioxide, dry chemical powder, or appropriate foam.
Firefighting Protective Equipment: Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes.
Specific Hazard(s): Emits toxic fumes under fire conditions.

Section 6 - Accidental Release Measures

Procedure(s) of Personal Precaution(s): Wear respirator, chemical safety goggles, rubber boots, and heavy rubber gloves.
Methods for Cleaning Up: Absorb on sand or vermiculite and place in closed containers for disposal. Ventilate area and wash spill site after material pickup is complete.

Section 7 - Handling and Storage

Handling User Exposure: Do not breathe vapor. Avoid contact with eyes, skin, and clothing. Avoid prolonged or repeated exposure.

Storage
Storable
Keep lightly closed.

Section 8 - Exposure Controls / PPE

Engineering Controls
Mechanical exhaust required. Safety shower and eye bath.

Personal Protective Equipment
Respiratory
Government approved respirator.
Hand
Compatible chemical-resistant gloves.
Eye
Chemical safety goggles.

General Hygiene Measures
Wash thoroughly after handling.

Section 9 - Physical/Chemical Properties

Appearance
Physical State
Semi-solid melting to a clear colorless liquid

Molecular Weight: N/A

<u>Property</u>	<u>Value</u>	<u>At Temperature or Pressure</u>	<u>Other</u>
pH	5.5 - 7.5		Concentration: 100 g/l
BP/BP Range	100 °C	760 mmHg	
MP/MP Range	41 - 45 °C		
Freezing Point	N/A		
Vapor Pressure	< 1 mmHg	20 °C	
Vapor Density	N/A		
Saturated Vapor Conc.	N/A		
SG/Density	N/A		
Bulk Density	N/A		
Odor Threshold	N/A		
Volatile%	N/A		
VOC Content	N/A		
Water Content	N/A		
Solvent Content	N/A		
Evaporation Rate	N/A		
Viscosity	N/A		
Partition Coefficient	N/A		
Decomposition Temp.	N/A		
Flash Point °F	235 °F		Method: closed cup
Flash Point °C	113 °C		Method: closed cup
Explosion Limits	N/A		
Flammability	N/A		
Autoignition Temp	N/A		

Solubility
Solubility In Water: Soluble.

N/A = not available

Section 10 - Stability and Reactivity

Stability
Stable
Stable.
Materials to Avoid
Strong oxidizing agents.

Hazardous Decomposition Products
Hazardous Decomposition Products
Nature of decomposition products not known.

Hazardous Polymerization
Hazardous Polymerization
Will not occur.

Section 11 - Toxicological Information

Route of Exposure
Skin Contact
Causes skin irritation.
Skin Absorption
May be harmful if absorbed through the skin.
Eye Contact
Causes severe eye irritation.
Inhalation
May be harmful if inhaled. Material may be irritating to mucous membranes and upper respiratory tract.
Ingestion
Harmful if swallowed.

Signs and Symptoms of Exposure
To the best of our knowledge, the chemical, physical, and toxicological properties have not been thoroughly investigated.

RTECS Number: MD0875000

Toxicity Data

Oral - Rat: 1000 mg/kg (LD50)
Remarks: Gastrointestinal:Ulceration or bleeding from stomach.
Gastrointestinal:Other changes.
Liver:Fatty liver degeneration.
Intraperitoneal - Rat: 125 MG/KG (LD50)
Remarks: Gastrointestinal:Other changes.
Subcutaneous - Rat: 953 MG/KG (LD50)
Intravenous - Rat: 27 MG/KG (LD50)
Oral - Mouse: 1170 mg/kg (LD50)
Remarks: Peripheral Nerve and Sensation:Flaccid paralysis without anesthesia (usually neuromuscular blockage).
Behavioral:Change in motor activity (specific assay).
Lungs, Thorax, or Respiration:Other changes.
Intraperitoneal - Mouse: 160 MG/KG (LD50)
Subcutaneous - Mouse: 792300 UG/KG (LD50)
Intravenous - Mouse: 100 MG/KG (LD50)
Intravenous - Rabbit: 36 MG/KG (LD50)
Remarks: Behavioral:Change in motor activity (specific assay).

Lungs, Thorax, or Respiration: Other changes.
Kidney, Ureter, Bladder: Hematuria.

Parenteral - Rabbit: >75 MG/KG (LD50)

Intratracheal - Rabbit: >15 MG/KG (LD50)

Oral - Guinea pig: 384 mg/kg (LD50)

Remarks: Peripheral Nerve and Sensation: Flaccid paralysis without anesthesia (usually neuromuscular blockage).
Behavioral: Change in motor activity (specific assay).
Lungs, Thorax, or Respiration: Other changes.

Intravenous - Guinea pig: 38 MG/KG (LD50)

Remarks: Behavioral: Change in motor activity (specific assay).
Lungs, Thorax, or Respiration: Other changes.
Kidney, Ureter, Bladder: Hematuria.

Irritation Data

Skin - Human: 6 mg 3D I
Remarks: Moderate irritation effect

Skin - Rabbit: 500 mg 24H
Remarks: Mild irritation effect

Skin - Rabbit: 75 mg 24H
Remarks: Mild irritation effect

Skin - Rabbit: 500 mg 24H
Remarks: Moderate irritation effect

Eyes - Rabbit: 100 mg

Eyes - Rabbit: 0.75 mg 24H
Remarks: Severe irritation effect

Section 12 - Ecological Information

Acute Ecotoxicity Tests

Test Type

EC50 Algae

Species

Selenastrum capricornutum resp.

Value:
2.0 - 4.0 mg/l

Test Type

EC50 Daphnia

Species

Daphnia magna

Time: Value:
48.0 h 4.78 - 7.58 mg/l

Test Type

LC50 Fish

Species

Cyprinus carpio

Time: Value:
96.0 h 1.4 mg/l

Test Type

LC50 Fish

Species

other fish

Time: Value:
96.0 h 1.5 mg/l

Section 13 - Disposal Considerations

Appropriate Method of Disposal of Substance or Preparation

Contact a licensed professional waste disposal service to dispose of this material.
Dissolve or mix the material with a combustible solvent and burn in a chemical incinerator equipped with an afterburner and scrubber.
Observe all federal, state, and local environmental regulations.

Section 14 - Transport Information

DOT

Proper Shipping Name: Environmentally hazardous substances, liquid, n.o.s.
UN#: 3082
Class: 9
Packing Group: Packing Group III
Hazard Label: Class 9
PIH: Not PIH

IATA

Proper Shipping Name: Environmentally hazardous substance, liquid, n.o.s.
IATA UN Number: 3082
Hazard Class: 9
Packing Group: III

Section 15 - Regulatory Information

EU Additional Classification

Symbol of Danger: Xn

Indication of Danger

Harmful.

Risk Statements R: 22 38 41

Harmful if swallowed. Irritating to skin. Risk of serious damage to eyes.

Safety Statements S: 26 36/37/39

In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Wear suitable protective clothing, gloves, and eye/face protection.

US Classification and Label Text

Indication of Danger

Harmful.

Risk Statements

Harmful if swallowed. Irritating to skin. Risk of serious damage to eyes.

Safety Statements

In case of contact with eyes, rinse immediately with plenty of water and seek medical advice. Wear suitable protective clothing, gloves, and eye/face protection.

United States Regulatory Information

SARA Listed: No

TSCA Inventory Item: Yes

Canada Regulatory Information

WHMIS Classification

This product has been classified in accordance with the hazard criteria of the CPR, and the MSDS contains all the information required by the CPR.

DSL: Yes

NDSL: No

Section 16 - Other Information

Disclaimer

For R&D use only. Not for drug, household or other uses.

Warranty

The above information is believed to be correct but does not purport to be all inclusive and shall be used only as a guide. The information in this document is based on the present state of our knowledge and is applicable to the product with regard to appropriate safety precautions. It does not represent any guarantee of the properties of the product. Sigma-Aldrich Inc., shall not be held liable for any damage resulting from handling or from contact with the above product. See reverse side of invoice or packing slip for additional terms and conditions of sale. Copyright 2004 Sigma-Aldrich Co. License granted to make unlimited paper copies for internal use only.