



Material Safety Data Sheet

NFPA 	Revision Date 01-19-99	Protective Clothing
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Section I: Chemical Product and Company Identification	
Common Name/ Trade Name	Barsol A-4004
Supplier	Barton Solvents, Inc. 1920 N.E. Broadway, P.O. Box 221 Des Moines, IA 50301
Synonym	Not available.
Chemical Name	Not applicable.
Chemical Family	Solvent. (Solvent.)
Chemical Formula	Not applicable.
Manufacturer	Available upon request
Material Uses	Not available.
Code	60071200
CAS#	Mixture
In case of Emergency	CHEMTREC (800) 424-9300

Section II: First Aid Measures	
Eye Contact	IMMEDIATELY flush eyes with running water for at least 15 minutes, keeping eyelids open. COLD water may be used.
Skin Contact	After contact with skin, wash immediately with plenty of water. Gently and thoroughly wash the contaminated skin with running water and non-abrasive soap. Be particularly careful to clean folds, crevices, creases and groin. COLD water may be used. Cover the irritated skin with an emollient. If irritation persists, seek medical attention. Wash contaminated clothing before reusing.
Hazardous Skin Contact	No additional information.
Inhalation	Allow the victim to rest in a well ventilated area. Seek immediate medical attention.
Hazardous Inhalation	No additional information.
Ingestion	Induce vomiting. Examine the lips and mouth to ascertain whether the tissues are damaged, a possible indication that the toxic material was ingested; the absence of such signs, however, is not conclusive. Loosen tight clothing such as a collar, tie, belt or waistband. If the victim is not breathing, perform mouth-to-mouth resuscitation. Seek immediate medical attention.
Hazardous Ingestion	No additional information.

Section III: Composition and Information on Ingredients				
Name	CAS #	% by Volume	TLV/PEL	LC ₅₀ /LD ₅₀
{1,2-}Propylene glycol	57-55-6	>9	Not available.	ORAL (LD50): Acute: 20000 mg/kg [Rat.] DERMAL (LD50): Acute: 20800 mg/kg [Rabbit]. Not available.
Water	7732-18-5	>9	Not available.	Not available.

Section IV. Hazards Identification

Potential Acute Health Effects	Slightly hazardous in case of skin contact (irritant, permeator), of eye contact (irritant), of inhalation. Non-sensitizer for skin. Non-hazardous in case of ingestion.
Potential Chronic Health Effects	<p>CARCINOGENIC EFFECTS: Not available.</p> <p>MUTAGENIC EFFECTS: Not available.</p> <p>TERATOGENIC EFFECTS: Not available.</p> <p>DEVELOPMENTAL TOXICITY: Not available. There is no known effect from chronic exposure to this product. Repeated or prolonged exposure is not known to aggravate medical condition.</p>

Section V. Fire and Explosion Data

Flammability of the Product	Combustible.
Auto-Ignition Temperature	The lowest known value is 415.56°C (780°F) (1,2-Propylene glycol).
Flash Points	The lowest known value is CLOSED CUP: 103°C (217.4°F). (Pensky-Martens). (1,2-Propylene glycol)
Flammable Limits	The greatest known range is LOWER: 2.6% UPPER: 12.5% (1,2-Propylene glycol)
Products of Combustion	These products are carbon oxides (CO, CO ₂).
Fire Hazards in Presence of Various Substances	<p>Slightly flammable in presence of open flames and sparks, of heat.</p> <p>Non-flammable in presence of oxidizing materials, of reducing materials, of combustible materials.</p> <p>Because of the large amount of water contained in the product, the product might be combustible only after partial or complete evaporation.</p>
Fire Fighting Media and Instructions	<p>SMALL FIRE: Use DRY chemicals, CO₂, water spray or foam.</p> <p>LARGE FIRE: Use water spray, fog or foam. DO NOT use water jet.</p>
Special Remarks on Fire Hazards	When heated to decomposition it emits acrid smoke and irritating fumes. (1,2-Propylene glycol)
Special Remarks on Explosion Hazards	No additional remark.

Section VI. Accidental Release Measures

Small Spill	Dilute with water and mop up, or absorb with an inert DRY material and place in an appropriate waste disposal container. Finish cleaning by spreading water on the contaminated surface and dispose of according to local and regional authority requirements.
Large Spill	<p>Combustible material.</p> <p>Keep away from heat. Keep away from sources of ignition. Stop leak if without risk. Finish cleaning by spreading water on the contaminated surface and allow to evacuate through the sanitary system.</p>

Section VII. Handling and Storage

Precautions	Keep away from heat. Keep away from sources of ignition. Empty containers pose a fire risk, evaporate the residue under a fume hood. Ground all equipment containing material. Do not breathe gas, fumes, vapor or spray.
Storage	Keep container dry. Keep in a cool place. Ground all equipment containing material. Keep container tightly closed. Keep in a cool, well-ventilated place. Combustible materials should be stored away from extreme heat and away from strong oxidizing agents.

Section VIII. Exposure Controls/Personal Protection

Engineering Controls	Provide exhaust ventilation or other engineering controls to keep the airborne concentrations of vapors below their respective threshold limit value. Ensure that eyewash stations and safety showers are proximal to the work-station location.
Personal Protection	Lab coat. Gloves (impervious). Splash goggles.
Personal Protection in Case of a Large Spill	Splash goggles. Full suit. Boots. Gloves. Suggested protective clothing might not be sufficient; consult a specialist BEFORE handling this product.

Section IX. Physical and Chemical Properties

Physical state and appearance	Liquid.	Odor	Glycol
Molecular Weight	Not applicable.	Taste	Not available.
pH (1% soln/water)	Neutral.	Color	Clear
Boiling Point	The lowest known value is 100°C (212°F) (Water). Weighted average: 126.19°C (259.1°F)		
Melting Point	May start to solidify at 0°C (32°F) based on data for: Water. Weighted average: -18°C (-0.4°F)		
Critical Temperature	Not available.		
Specific Gravity	Weighted average: 1.01 (Water = 1)		
Vapor Pressure	The highest known value is 17.2 mm of Hg (@ 20°C) (Water). Weighted average: 12.06 mm of Hg (@ 20°C)		
Vapor Density	The highest known value is 2.62 (Air = 1) (1,2-Propylene glycol). Weighted average: 1.49 (Air = 1)		
Volatility	100% (v/v).		
Odor Threshold	Not available.		
Evaporation rate	Not available.		
Viscosity	Not available.		
Solubility	Easily soluble in cold water, hot water, methanol, acetone. Insoluble in diethyl ether, n-octanol.		

Section X. Stability and Reactivity Data

Stability	The product is stable.
Instability Temperature	Not available.
Conditions of Instability	No additional remark.
Incompatibility with various substances	Slightly reactive with oxidizing agents, acids. Non-reactive with organic materials, metals.
Corrosivity	Not considered to be corrosive for metals and glass according to our database.
Special Remarks on Reactivity	Hygroscopic; keep container tightly closed. Incompatible with chloroformates. (1,2-Propylene glycol)
Special Remarks on Corrosivity	No additional remark.

Section XI. Toxicological Information

Routes of Entry	Ingestion.
Toxicity to Animals	Acute oral toxicity (LD50): 66667 mg/kg (Rat.) (Calculated value for the mixture). Acute dermal toxicity (LD50): 69333 mg/kg (Rabbit.) (Calculated value for the mixture).
Chronic Effects on Humans	Not available.
Other Toxic Effects on Humans	Slightly hazardous in case of skin contact (irritant, permeator), of eye contact (irritant), of inhalation. Non-sensitizer for skin. Non-hazardous in case of ingestion.
Special Remarks on Toxicity to Animals	No additional remark.
Special Remarks on Chronic Effects on Humans	Can cause gastrointestinal disturbances. (1,2-Propylene glycol)
Special Remarks on Other Toxic Effects on Humans	No additional remark.

Section XII. Ecological Information

Ecotoxicity	Not available.
BOD5 and COD	Not available.
Products of Biodegradation	Possibly hazardous short term degradation products are not likely. However, long term degradation products may arise.
Toxicity of the Products of Biodegradation	The product itself and its products of degradation are not toxic.
Special Remarks on the Products of Biodegradation	No additional remark.

Section XIII. Disposal Considerations

Waste Disposal	Recycle, if possible. Consult your local or regional authorities.
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Section XIV. Transport Information

DOT Classification	Not a DOT controlled material (United States).
PIN	Not applicable.
Special Provisions for Transport	Not applicable.
DOT (Pictograms)	

Section XV. Other Regulatory Information and Pictograms

Federal and State Regulations	<u>SARA 302/304/311/312 extremely hazardous substances:</u> No products were found. <u>SARA 313 toxic chemical notification and release reporting:</u> No products were found. <u>CERCLA hazardous substances:</u> No products were found.
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All components of this product are listed on the TSCA inventory.

Other Classifications

WHMIS (Canada) Not controlled under WHMIS (Canada).

(370, U.S. P. 1101)

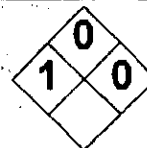
DSCL (EEC) Not controlled under DSCL (Europe).

HMIS (U.S.A.)

Health Hazard	1
Fire Hazard	0
Reactivity	0
Personal Protection	a

National Fire Protection Association (U.S.A.)

Health



Fire Hazard

Reactivity

Specific hazard

Protective Clothing (Pictograms)



Section XVI Other Information

References Not available.

Other Special Considerations No additional remark.

Validated by Barton Solvents, Inc. on 1/19/99.

Verified by Barton Solvents, Inc..

Printed 1/19/99.

Daytime Phone (515)-265-7998

Notice to Reader

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