

# Material Safety Data Sheet

Revision Date 27-Jul-2012

Version 1

## 1. PRODUCT AND COMPANY IDENTIFICATION

**Product Name** 2x Liquid Laundry Detergent

**Recommended Use** Laundry liquid for clothes washing machines.

**Chemical Emergency Phone Number** Chemtrec 1-800-424-9300 (24 hour)  
Poison Control 1-800-222-1222 (24 hour)

## 2. HAZARDS IDENTIFICATION

### CAUTION!

#### Emergency Overview

Harmful if swallowed  
May cause eye irritation  
Keep out of the reach of children  
May cause central nervous system depression

#### Potential Health Effects

See Section 11 for additional Toxicological information.

**Ingestion** May be harmful if swallowed. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea. Do not taste or swallow.

**Eyes** Irritating to eyes. May cause redness, itching, and pain.

**Skin** Substance may cause slight skin irritation. Prolonged or repeated contact may dry skin and cause irritation.

**Inhalation** May be harmful if inhaled. May cause irritation of respiratory tract.

**Chronic Effects** No known effect based on information supplied.

**Aggravated Medical Conditions** Central nervous system. Preexisting eye disorders. Skin disorders. Respiratory disorders.

**Environmental hazard** See Section 12 for additional Ecological Information.

### 3. COMPOSITION/INFORMATION ON INGREDIENTS

Hazardous ingredients as defined by the OSHA Hazard Communication Standard (29CFR § 1910.1200).

Chemical Name	CAS-No
ALCOHOLS, C12-16, ETHOXYLATED	68551-12-2
BENZENESULFONIC ACID, C10-16-ALKYL DERIVATIVES, SODIUM SALTS	68081-81-2
Propylene Glycol	57-55-6
Ethanolamine	141-43-5
DISODIUM DISTYRYLBIPHENYL DISULFONATE	27344-41-8

Under normal consumer household use, this product would not constitute a hazardous product by OSHA definition as OSHA is not applicable to household consumer use.

### 4. FIRST AID MEASURES

<b>General advice</b>	If symptoms persist, call a physician. Do not breathe dust/fume/gas/mist/vapors/spray. Do not get in eyes, on skin, or on clothing.
<b>Eye contact</b>	Immediately flush with plenty of water. After initial flushing, remove any contact lenses and continue flushing for at least 15 minutes. Keep eye wide open while rinsing. If symptoms persist, call a physician.
<b>Skin contact</b>	Consult a physician if necessary. Wash off immediately with soap and plenty of water while removing all contaminated clothes and shoes.
<b>Inhalation</b>	Move to fresh air. Consult a physician. If breathing is irregular or stopped, administer artificial respiration. Avoid direct contact with skin. Use barrier to give mouth-to-mouth resuscitation.
<b>Ingestion</b>	Rinse mouth. Drink plenty of water. Do not induce vomiting without medical advice. Call a physician or Poison Control Center immediately.
<b>Notes to physician</b>	Treat symptomatically.
<b>Protection of First-aiders</b>	Use personal protective equipment.

### 5. FIRE-FIGHTING MEASURES

<b>Flammable Properties</b>	Not flammable.
<b>Flash point</b>	> 201 °F / > 94 °C
<b>Flammability Limits in Air</b>	
<b>Upper Flammability Limit</b>	No information available
<b>Lower Flammability Limit</b>	No information available
<b>Autoignition temperature</b>	No information available
<b>Hazardous Combustion Products</b>	None.
<b>Explosive properties</b>	No information available

<b>Explosion Limits</b>				
<b>Upper (UEL)</b>	No information available			
<b>Lower (LEL)</b>	No information available			
<b>Suitable Extinguishing Media</b>				
Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.				
<b>Unsuitable Extinguishing Media</b>				
None.				
<b>Protective Equipment and Precautions for Firefighters</b>				
As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.				
<b>NFPA</b>	<b>Health Hazard 2</b>	<b>Flammability 1</b>	<b>Stability 0</b>	<b>Physical and chemical hazards -</b>
<b>HMIS</b>	<b>Health Hazard 2</b>	<b>Flammability 1</b>	<b>Physical Hazard 0</b>	<b>Personal protection -</b>

## 6. ACCIDENTAL RELEASE MEASURES

<b>Personal precautions</b>	Ensure adequate ventilation.
<b>Environmental precautions</b>	Try to prevent the material from entering drains or water courses.
<b>Methods for Containment</b>	Prevent further leakage or spillage if safe to do so.
<b>Methods for cleaning up</b>	Pick up and transfer to properly labeled containers.
<b>Other information</b>	not applicable.

## 7. HANDLING AND STORAGE

<b>Advice on safe handling</b>	Handle in accordance with good industrial hygiene and safety practice.
<b>Technical measures/Storage conditions</b>	Keep containers tightly closed in a dry, cool and well-ventilated place.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### Exposure Guidelines

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Ethanolamine 141-43-5	STEL: 6 ppm TWA: 3 ppm	TWA: 3 ppm TWA: 6 mg/m <sup>3</sup> (vacated) TWA: 3 ppm (vacated) TWA: 8 mg/m <sup>3</sup> (vacated) STEL: 6 ppm (vacated) STEL: 15 mg/m <sup>3</sup>	IDLH: 30 ppm TWA: 3 ppm TWA: 8 mg/m <sup>3</sup> STEL: 6 ppm STEL: 15 mg/m <sup>3</sup>
Subtilisin 9014-01-1	Ceiling: 0.00006 mg/m <sup>3</sup> as crystalline active enzyme	(vacated) STEL: 0.00006 mg/m <sup>3</sup> 60 min	STEL: 0.00006 mg/m <sup>3</sup> 60 min Subtilisins

*NIOSH IDLH: Immediately Dangerous to Life or Health*

<b>Other Exposure Guidelines</b>	Vacated limits revoked by the Court of Appeals decision in AFL-CIO v. OSHA, 965 F.2d 962 (11th Cir., 1992).
<b>Engineering Measures</b>	None under normal use conditions
<b>Personal Protective Equipment</b>	
<b>Eye/Face Protection</b>	No protective equipment is needed under normal use conditions
<b>Skin and body protection</b>	No protective equipment is needed under normal use conditions.

**Respiratory protection**

If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.

**Hygiene measures**

Remove and wash contaminated clothing before re-use.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

<b>Physical state</b>	liquid	<b>Appearance</b>	LIQUID
<b>Color</b>	blue	<b>Odor</b>	ORIGINAL
<b>Odor Threshold</b>	No information available	<b>pH</b>	7.6
<b>Specific Gravity</b>	1.02 SPECIFIC GRAVITY - 25C	<b>Density</b>	no data available
<b>Viscosity, kinematic</b>	160 cps	<b>Flash point</b>	> 201 °F / > 94 °C
<b>Method</b>	No information available	<b>Autoignition temperature</b>	No information available
<b>Decomposition temperature</b>	no data available	<b>Boiling point/boiling range</b>	no data available
<b>Melting point</b>	no data available	<b>Freezing Point</b>	no data available
<b>Water solubility</b>	Soluble in water	<b>Evaporation rate</b>	no data available
<b>Vapor pressure</b>	no data available	<b>Vapor density</b>	No data available
<b>VOC Content(%)</b>	not applicable		
<b>Flammability Limits in Air</b>		<b>Explosion Limits</b>	
<b>Upper Flammability Limit</b>	no data available	<b>Upper (UEL)</b>	no data available
<b>Lower Flammability Limit</b>	no data available	<b>Lower (LEL)</b>	no data available

## 10. STABILITY AND REACTIVITY

<b>Stability</b>	Stable under recommended storage conditions.
<b>Incompatible products</b>	Strong oxidizing agents, strong acids, and strong bases.
<b>Conditions to Avoid</b>	Extremes of temperature and direct sunlight. Do not freeze.
<b>Hazardous Decomposition Products</b>	None known based on information supplied.
<b>Hazardous Reactions</b>	None known based on information supplied.
<b>Hazardous Polymerization</b>	Hazardous polymerization does not occur.

## 11. TOXICOLOGICAL INFORMATION

**Acute toxicity**

<b>Ingestion</b>	Harmful if swallowed. Do not taste or swallow. Ingestion may cause gastrointestinal irritation, nausea, vomiting and diarrhea.
<b>Eye contact</b>	Irritating to eyes. Avoid contact with eyes.
<b>Skin contact</b>	Causes skin irritation. Prolonged contact may cause redness and irritation. Prolonged or repeated contact may dry skin and cause irritation.
<b>Inhalation</b>	May cause irritation of respiratory tract.
<b>Product Safety Profile</b>	Product is safe for its intended use based on the formulation, testing results, and the long history of safe consumer use.
<b>LD50 Oral:</b>	> 2000 mg/kg (rat)
<b>LD50 Dermal:</b>	> 2000 mg/kg

Chemical Name	LD50 Oral	LD50 Dermal	LC50 Inhalation
ALCOHOLS, C12-16, ETHOXYLATED	1700 mg/kg ( Rat )	2501 mg/kg ( Rat )	11.1 mg/L ( Rat ) 4 h
BENZENESULFONIC ACID, C10-16-ALKYL DERIVATIVES, SODIUM SALTS	1000 mg/kg ( Rat )	730 mg/kg ( Rabbit )	
Propylene Glycol	20000 mg/kg ( Rat )	20800 mg/kg ( Rabbit )	
Ethanolamine	1720 mg/kg ( Rat )	1 mL/kg ( Rabbit ) 1025 mg/kg ( Rabbit )	
DISODIUM DISTYRYLBIPHENYL DISULFONATE	2000 mg/kg ( Rat )	2500 mg/kg ( Rabbit ) 1 g/kg ( Rat )	3.6 mg/L ( Rat ) 4 h

**Chronic toxicity**

**Chronic toxicity** No known effect based on information supplied. May produce an allergic reaction.

**Carcinogenicity** The table below indicates whether each agency has listed any ingredient as a carcinogen

**Sensitization** None known.

**Germ Cell Mutagenicity** None known.

**Reproductive toxicity** This product does not contain any known or suspected reproductive hazards

**Developmental Toxicity** None known

**Target Organ Effects** Central nervous system, Eyes, Respiratory system, Skin

**Interactions with Other Chemicals** Use of alcoholic beverages may enhance toxic effects

## 12. ECOLOGICAL INFORMATION

**Ecotoxicity**

The environmental impact of this product has not been fully investigated

Chemical Name	Toxicity to algae	Toxicity to fish	Toxicity to microorganisms	Toxicity to daphnia and other aquatic invertebrates
Propylene Glycol	19000: 96 h Pseudokirchneriella subcapitata mg/L EC50	51600: 96 h Oncorhynchus mykiss mg/L LC50 static 41 - 47: 96 h Oncorhynchus mykiss mL/L LC50 static 51400: 96 h Pimephales promelas mg/L LC50 static 710: 96 h Pimephales promelas mg/L LC50		10000: 24 h Daphnia magna mg/L EC50 1000: 48 h Daphnia magna mg/L EC50 Static
Ethanolamine	15: 72 h Desmodesmus subspicatus mg/L EC50	227: 96 h Pimephales promelas mg/L LC50 flow-through 3684: 96 h Brachydanio rerio mg/L LC50 static 300 - 1000: 96 h Lepomis macrochirus mg/L LC50 static 114 - 196: 96 h Oncorhynchus mykiss mg/L LC50 static 200: 96 h Oncorhynchus mykiss mg/L LC50 flow-through	EC50 = 110 mg/L 17 h EC50 = 12200 mg/L 2 h EC50 = 13.7 mg/L 30 min	65: 48 h Daphnia magna mg/L EC50
DISODIUM DISTYRYLBIPHENYL DISULFONATE	10: 72 h Desmodesmus subspicatus mg/L EC50 10.0 - 11.0: 96 h Desmodesmus subspicatus mg/L EC50	76: 96 h Brachydanio rerio mg/L LC50 static		1000: 48 h Daphnia magna mg/L EC50

**Persistence and degradability** No data is available on the product itself.

**Bioaccumulation** Not likely to bioaccumulate.

**Mobility** Not Determined .

Chemical Name	log Pow
Ethanolamine	-1.91

### 13. DISPOSAL CONSIDERATIONS

**Waste Disposal Methods** This material, as supplied, is not a hazardous waste according to Federal regulations (40 CFR 261). This material could become a hazardous waste if it is mixed with or otherwise comes in contact with a hazardous waste, if chemical additions are made to this material, or if the material is processed or otherwise altered. Consult 40 CFR 261 to determine whether the altered material is a hazardous waste. Consult the appropriate state, regional, or local regulations for additional requirements

**Contaminated packaging** Do not re-use empty containers

**California Waste Status**

This product contains one or more substances that are listed with the State of California as a hazardous waste.

### 14. TRANSPORT INFORMATION

**DOT** Not regulated

**TDG** Not regulated

**MEX** Not regulated

**IATA** Not regulated

**IMDG** Not regulated

### 15. REGULATORY INFORMATION

**International Inventories**

**TSCA** Complies  
**DSL** Complies

**TSCA** - United States Toxic Substances Control Act Section 8(b) Inventory  
**DSL/NDL** - Canadian Domestic Substances List/Non-Domestic Substances List

**U.S. Federal Regulations**

**SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

**SARA 311/312 Hazard Categories**

<b>Acute Health Hazard</b>	Yes
<b>Chronic Health Hazard</b>	no
<b>Fire Hazard</b>	no
<b>Sudden Release of Pressure Hazard</b>	no
<b>Reactive Hazard</b>	no

**Clean Water Act**

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material.

**U.S. State Regulations****California Proposition 65**

This product does not contain any Proposition 65 chemicals.

**U.S. State Right-to-Know Regulations**

Chemical Name	Massachusetts	New Jersey	Pennsylvania	Illinois	Rhode Island
Propylene Glycol		X	X		
Ethanolamine	X	X	X	X	

**Mexico**

Chemical Name	Carcinogen Status	Exposure Limits
Ethanolamine		Mexico: TWA 3 ppm Mexico: TWA 8 mg/m <sup>3</sup> Mexico: STEL 6 ppm Mexico: STEL 15 mg/m <sup>3</sup>

**Canada**

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

**WHMIS Hazard Class**

D2A Very toxic materials

D2B Toxic materials

**Legend**

NPRI - National Pollutant Release Inventory

<b>16. OTHER INFORMATION</b>
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**Prepared By**

KS Distribution, LLC

**Revision Date**

27-Jul-2012

**Revision Note**

no data available.

**Status**

0

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**PROTYP**

F30

**Disclaimer**

The (M)SDS is intended to provide a brief summary of our knowledge and guidance regarding the use of this material. The information contained here has been compiled from sources considered by KS Distribution, LLC to be dependable and is accurate to the best of the Company's knowledge. It is not meant to be an all-inclusive document on worldwide hazard communication regulations.

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**End of Material Safety Data Sheet**