

MATERIAL SAFETY DATA SHEET

Product Trade Name: **Cleaning Agent No. 2**

Revision Date: 03-Jan-2013

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Trade Name: Cleaning Agent No. 2
Synonyms: None
Chemical Family: Blend
Application: Cleaner

Manufacturer/Supplier Halliburton Energy Services
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Prepared By Chemical Compliance
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2. COMPOSITION/INFORMATION ON INGREDIENTS

Substances	CAS Number	PERCENT	ACGIH TLV-TWA	OSHA PEL-TWA
Ethylene glycol	107-21-1	1 - 5%	100 mg/m ³	50 ppm CEIL
Ethoxylated nonylphenol		10 - 30%	Not applicable	Not applicable
Ethylene glycol monobutyl ether	111-76-2	30 - 60%	20 ppm	50 ppm

3. HAZARDS IDENTIFICATION

Hazard Overview May cause eye, skin, and respiratory irritation. May cause headache, dizziness, and other central nervous system effects. May be harmful if swallowed. Combustible.

4. FIRST AID MEASURES

Inhalation If inhaled, remove to fresh air. If not breathing give artificial respiration, preferably mouth-to-mouth. If breathing is difficult give oxygen. Get medical attention.

Skin In case of contact, immediately flush skin with plenty of soap and water for at least 15 minutes. Get medical attention. Remove contaminated clothing and launder before reuse.

Eyes In case of contact, immediately flush eyes with plenty of water for at least 15 minutes and get medical attention if irritation persists.

Ingestion Do not induce vomiting. Slowly dilute with 1-2 glasses of water or milk and seek medical attention. Never give anything by mouth to an unconscious person.

Notes to Physician Not Applicable

5. FIRE FIGHTING MEASURES

Flash Point/Range (F):	156
Flash Point/Range (C):	68
Flash Point Method:	Not Determined
Autoignition Temperature (F):	Not Determined
Autoignition Temperature (C):	Not Determined
Flammability Limits in Air - Lower (%):	Not Determined
Flammability Limits in Air - Upper (%):	Not Determined

Fire Extinguishing Media Water fog, carbon dioxide, foam, dry chemical.

Special Exposure Hazards Use water spray to cool fire exposed surfaces. Closed containers may explode in fire. Decomposition in fire may produce toxic gases.

Special Protective Equipment for Fire-Fighters Full protective clothing and approved self-contained breathing apparatus required for fire fighting personnel.

NFPA Ratings: Health 2, Flammability 2, Reactivity 0

HMIS Ratings: Health 2, Flammability 2, Reactivity 0

6. ACCIDENTAL RELEASE MEASURES

Personal Precautionary Measures Use appropriate protective equipment. Wear self-contained breathing apparatus in enclosed areas.

Environmental Precautionary Measures Prevent from entering sewers, waterways, or low areas.

Procedure for Cleaning / Absorption Isolate spill and stop leak where safe. Contain spill with sand or other inert materials. Scoop up and remove.

7. HANDLING AND STORAGE

Handling Precautions Avoid contact with eyes, skin, or clothing. Wash hands after use. Avoid breathing vapors. Do NOT consume food, drink, or tobacco in contaminated areas.

Storage Information Store away from oxidizers. Store in a dry location. Store in a cool well ventilated area. Keep from heat, sparks, and open flames. Keep container closed when not in use. Product has a shelf life of 24 months. Store at temperatures between 50 and 100 F (10 and 37.8 C). Do not freeze.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Engineering Controls Use in a well ventilated area. Local exhaust ventilation should be used in areas without good cross ventilation.

Respiratory Protection Organic vapor respirator.

Hand Protection Impervious rubber gloves.

Skin Protection Rubber apron.

Eye Protection Chemical goggles; also wear a face shield if splashing hazard exists.

Other Precautions Eyewash fountains and safety showers must be easily accessible.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State:	Liquid
Color:	White, opaque
Odor:	Solvent
pH:	5-7
Specific Gravity @ 20 C (Water=1):	0.94
Density @ 20 C (lbs./gallon):	7.90
Bulk Density @ 20 C (lbs/ft3):	Not Determined
Boiling Point/Range (F):	340
Boiling Point/Range (C):	171
Freezing Point/Range (F):	Not Determined
Freezing Point/Range (C):	Not Determined
Vapor Pressure @ 20 C (mmHg):	> 0.76
Vapor Density (Air=1):	Not Determined
Percent Volatiles:	57
Evaporation Rate (Butyl Acetate=1):	Not Determined
Solubility in Water (g/100ml):	Disperses
Solubility in Solvents (g/100ml):	Not Determined
VOCs (lbs./gallon):	Not Determined
Viscosity, Dynamic @ 20 C (centipoise):	Not Determined
Viscosity, Kinematic @ 20 C (centistokes):	Not Determined
Partition Coefficient/n-Octanol/Water:	Not Determined
Molecular Weight (g/mole):	Not Determined

10. STABILITY AND REACTIVITY

Stability Data:	Stable
Hazardous Polymerization:	Will Not Occur
Conditions to Avoid	Keep away from heat, sparks and flame.
Incompatibility (Materials to Avoid)	Strong oxidizers.
Hazardous Decomposition Products	Carbon monoxide and carbon dioxide.
Additional Guidelines	Not Applicable

11. TOXICOLOGICAL INFORMATION

Principle Route of Exposure	Eye or skin contact, inhalation.
Inhalation	May cause central nervous system depression including headache, dizziness, drowsiness, incoordination, slowed reaction time, slurred speech, giddiness and unconsciousness. May cause respiratory irritation.
Skin Contact	Can dry skin. May cause skin defatting with prolonged exposure. May be absorbed through the skin and contribute to the symptoms listed under ingestion.
Eye Contact	May cause eye irritation.
Ingestion	May cause headache, dizziness, nausea, vomiting, gastrointestinal irritation and central nervous system depression. May cause liver and kidney damage.
Aggravated Medical Conditions	Eye ailments. Skin disorders.

Chronic Effects/Carcinogenicity Prolonged or repeated exposure may cause eye, blood, lung, liver, kidney, heart, central nervous system and spleen damage. May contain ethylene oxide in the headspace of the drum. Ethylene oxide is a cancer and reproductive hazard. Prolonged or repeated exposure may cause embryo and fetus toxicity.

Other Information None known.

Toxicity Tests

Oral Toxicity: Not determined

Dermal Toxicity: Not determined

Inhalation Toxicity: Not determined

Primary Irritation Effect: Not determined

Carcinogenicity Not determined

Genotoxicity: Not determined

**Reproductive /
Developmental Toxicity:** Not determined

12. ECOLOGICAL INFORMATION

Mobility (Water/Soil/Air) Not determined

Persistence/Degradability Not determined

Bio-accumulation Not determined

Ecotoxicological Information

Acute Fish Toxicity: Not determined

Acute Crustaceans Toxicity: Not determined

Acute Algae Toxicity: Not determined

Chemical Fate Information Not determined

Other Information Not applicable

13. DISPOSAL CONSIDERATIONS

Disposal Method Disposal should be made in accordance with federal, state, and local regulations.

Contaminated Packaging Follow all applicable national or local regulations.

14. TRANSPORT INFORMATION

Land Transportation

DOT

Not restricted

DOT (Bulk)

NA1993, Combustible Liquid, N.O.S., Combustible Liquid, III
(Contains Ethylene Glycol Monobutyl Ether)

Canadian TDG

Not restricted

ADR

Not restricted

Air Transportation**ICAO/IATA**

Not restricted

Sea Transportation**IMDG**

Not restricted

Other Transportation Information

Labels: None

15. REGULATORY INFORMATION**US Regulations****US TSCA Inventory** All components listed on inventory or are exempt.**EPA SARA Title III Extremely Hazardous Substances** Not applicable**EPA SARA (311,312) Hazard Class** Acute Health Hazard
Chronic Health Hazard
Fire Hazard**EPA SARA (313) Chemicals** This product contains toxic chemical(s) listed below which is(are) subject to the reporting requirements of Section 313 of Title III of SARA and 40 CFR Part 372:
Ethylene Glycol//107-21-1
Glycol Ethers//111-76-2**EPA CERCLA/Superfund Reportable Spill Quantity** EPA Reportable Spill Quantity is 62050 Gallons based on Ethylene glycol (CAS: 107-21-1).**EPA RCRA Hazardous Waste Classification** If product becomes a waste, it does NOT meet the criteria of a hazardous waste as defined by the US EPA.**California Proposition 65** The California Proposition 65 regulations apply to this product.**MA Right-to-Know Law** One or more components listed.**NJ Right-to-Know Law** One or more components listed.**PA Right-to-Know Law** One or more components listed.**Canadian Regulations****Canadian DSL Inventory** All components listed on inventory or are exempt.**WHMIS Hazard Class** B3 Combustible Liquids
D2B Toxic Materials

16. OTHER INFORMATION

The following sections have been revised since the last issue of this MSDS

Not applicable

Additional Information

For additional information on the use of this product, contact your local Halliburton representative.

For questions about the Material Safety Data Sheet for this or other Halliburton products, contact Chemical Compliance at 1-580-251-4335.

Disclaimer Statement

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*****END OF MSDS*****