

# Enerzan L

### **SECTION 1. IDENTIFICATION**

Product Identifier Enerzan L

Recommended Use Industrial Use.

Manufacturer / AES Drilling Fluids, LLC, 11767 Katy Freeway, Suite 230, Houston, TX, 77079, Sales &

Supplier Information, 281-556-5628

Emergency Phone No. CHEMTREC, 1-800-424-9300, 24-hour Emergency

**Date of Preparation** March 09, 2015

# **SECTION 2. HAZARDS IDENTIFICATION**

#### **GHS Classification**

Acute toxicity (Oral) - Category 4; Acute toxicity (Dermal) - Category 4; Acute toxicity (Inhalation) - Category 3; Carcinogenicity - Category 1A

#### **GHS Label Elements**





Signal Word:

Danger

Hazard Statement(s):

H302 Harmful if swallowed. H332 Harmful if inhaled.

May cause skin irritation. May cause eye irritation.

H350 May cause cancer.

Precautionary Statement(s):

Prevention:

P261 Avoid breathing vapours, mist, spray.

P264 Wash hands and skin thoroughly after handling.
P270 Do not eat, drink or smoke when using this product.

P280 Wear protective gloves/protective clothing.

Response:

IF SWALLOWED: Call a poison control center/doctor immediately. IF ON SKIN, IN EYES: Rinse cautiously with water for several minutes.

IF ON SKIN, IN EYES: seek medical attention

P312 Call a POISON CENTRE/doctor if you feel unwell.

P362 + P364 Take off contaminated clothing and wash it before reuse.

P304 + P340 IF INHALED: Remove person to fresh air and keep comfortable for breathing.

# **SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS**

Chemical Name	CAS No.	%	Other Identifiers
Xanthan gum	11138-66-2	30-60	

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Mineral Oil	8012-95-1	15-40	
Poly(oxy-1,2-ethanediyl)-, alpha-(4-nonylphenyl)-omega-hydroxy-, branched	127087-87-0	1-5	
Silica, quartz	14808-60-7	<1.0	

# **SECTION 4. FIRST-AID MEASURES**

#### **First-aid Measures**

#### Inhalation

Remove source of exposure or move to fresh air. Keep at rest in a position comfortable for breathing. If breathing is difficult, trained personnel should administer emergency oxygen if advised to do so by Poison Centre or doctor. If experiencing respiratory symptoms (e.g. coughing, shortness of breath, wheezing), call a Poison Centre or doctor.

#### **Skin Contact**

Take off contaminated clothing, shoes and leather goods (e.g. watchbands, belts). Immediately wash gently and thoroughly with lukewarm, gently flowing water and mild soap for 15-20 minutes. If skin irritation or a rash occurs, get medical advice/attention.

#### **Eye Contact**

Flush eyes thoroughly with lukewarm water for 15 minutes. Seek medical advice/attention.

# Ingestion

Never give anything by mouth if victim is rapidly losing consciousness, or is unconscious or convulsing. Do not induce vomiting. If vomiting occurs, have victim lean forward to reduce the risk of aspiration. Seek medical attention. If breathing has stopped, trained personnel should immediately begin rescue breathing. Avoid mouth-to-mouth contact by using a barrier device. Immediately call a Poison Centre or doctor. If the heart has stopped, trained personnel should start cardiopulmonary resuscitation (CPR) or automated external defibrillation (AED).

# **SECTION 5. FIRE-FIGHTING MEASURES**

# **Suitable Extinguishing Media**

Carbon Dioxide, Foam, Dry chemical, Water. Water can be used if that is all that is available. Do not use in a direct spray, ideally in a fog or dispersed spray. Use extinguishing agent suitable for surrounding fire.

#### Specific Hazards Arising from the Chemical

Product can ignite if strongly heated and exposed to open flames. Closed containers may rupture violently when heated releasing contents. Do not direct solid streams of water or foam into hot, burning pools, this may cause violent steam generation, frothing and may increase fire intensity.

Oxides of carbon Aldehydes. Thermal decomposition of this product may lead to the release of irritating gases and vapours.

#### Special Protective Equipment and Precautions for Fire-fighters

Evacuate area. For a massive fire, immediately evacuate the area and use unmanned hose holder or monitor nozzles. Use water spray to cool containers/tanks. Knock down vapours or gases with water fog or fine water spray. Dike and recover contaminated water for appropriate disposal.

# **SECTION 6. ACCIDENTAL RELEASE MEASURES**

#### Personal Precautions, Protective Equipment, and Emergency Procedures

Evacuate the area immediately. Isolate the hazard area. Keep out unnecessary and unprotected personnel. Use the personal protective equipment recommended in Section 8 of this safety data sheet. Do not touch damaged containers or spilled product unless wearing appropriate protective equipment. Ensure adequate ventilation in area. Remove or isolate incompatible materials as well as other hazardous materials.

### **Environmental Precautions**

Prevent product from entering drains, soil, ditches, sewers, waterways and/or groundwater. If the spill is inside a building, prevent product from entering drains, ventilation systems and confined areas. Minimize the use of water to prevent environmental contamination.

### Methods and Materials for Containment and Cleaning Up

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Small spills or leaks: stop or reduce leak if safe to do so. Contain and soak up spill with absorbent that does not react with spilled product. Place used absorbent into suitable, covered, labelled containers for disposal. Large spills or leaks: stop or reduce leak if safe to do so. Eliminate all ignition sources. Dike spilled product to prevent runoff. Prevent contamination of waterways or sewers. Knock down vapour with fog or fine water spray. Remove or recover liquid using pumps or vacuum equipment. Store recovered product in suitable containers that are: contain and soak up spill with absorbent that does not react with spilled product. Place used absorbent into suitable, covered, labelled containers for disposal. Spill material may cause floors and contact surfaces to become slippery, flush slowly with water, collect and store in suitable containers.

#### Other Information

Contact EH&S regarding spill as spills of certain products and certain quantities may require reporting to various authorities.

# **SECTION 7. HANDLING AND STORAGE**

### **Precautions for Safe Handling**

Avoid breathing in this product. Avoid repeated or prolonged skin contact. Do not get in eyes. See Section 8 for appropriate Personal Protective Equipment (PPE). Do not ingest product. Only use where there is adequate ventilation. Avoid generating vapours or mists. Prevent uncontrolled release of product. Avoid release to the environment. In the event of a spill or leak, exit the area immediately. Keep containers tightly closed when not in use or empty. Do NOT smoke in work areas. Do NOT eat, drink or store food in work areas. Remove contaminated clothing and protective equipment before entering eating areas or leaving work area. Wash hands thoroughly after handling this product and before eating, using the washroom or leaving work area.

# **Conditions for Safe Storage**

Store in an area that is: cool, well-ventilated. Separate from incompatible materials empty containers may contain hazardous residue. Store separately. Keep closed. Follow all precautions given on this safety data sheet. Away from open flames, excessive heat or sources of ignition.

### SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

#### **Control Parameters**

	ACGIH® TLV®		OSHA PEL		AIHA® WEEL™	
Chemical Name	TWA	STEL [C]	TWA	Ceiling	8-hr TWA	Short-term TWA [C]
Mineral Oil	5 mg/m3 A4		5 mg/m3		Not established	
Poly(oxy-1,2-ethanediyl)-, alpha-(4-nonylphenyl)-omega- hydroxy-, branched	Not established		Not established		Not established	
Silica, quartz	0.025 mg/m3 A2		0.1 mg/m3		Not established	
Xanthan gum	15 mg/m3		10 mg/m3		Not established	

ACGIH® = American Conference of Governmental Industrial Hygienists. TLV® = Threshold Limit Value. TWA = Time-Weighted Average. STEL = Short-term Exposure Limit. C = Ceiling limit. OSHA = US Occupational Safety and Health Administration. PEL = Permissible Exposure Limits. AIHA® = AIHA® Guideline Foundation. WEEL<sup>TM</sup> = Workplace Environmental Exposure Limit.

#### **Appropriate Engineering Controls**

General ventilation is usually adequate. Use local exhaust ventilation, if general ventilation is not adequate to control amount in the air. While working with the product an eyewash and safety shower should be within acceptable distance to the work area.

### **Individual Protection Measures**

#### **Eye/Face Protection**

Safety glasses or goggles. Use chemical goggles or a face shield if product could be splashed.

**Skin Protection** 

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Wear gloves with appropriate chemical resistance, see manufacturers specifications for suitability. Wear long sleeves, long pants and appropriate footwear while working with product.

### **Respiratory Protection**

Not usually required when working with small quantities. If conditions exist above the OEL wear a NIOSH approved air-purifying respirator with an appropriate cartridge.

# **SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES**

# **Basic Physical and Chemical Properties**

**Appearance** Yellow - orange liquid.

Odour Odourless pH Not available

Melting Point/Freezing Point Not available (melting); Not available (freezing)

Initial Boiling Point/Range 482 °F (250 °C) (estimated)

Flash Point Not available

Upper/Lower Flammability or

Explosive Limit

Not available (upper); Not available (lower)

Vapour Pressure

Vapour Density (air = 1)

Relative Density (water = 1)

Not available

1.08 (estimated)

Other Information

Physical State Liquid

# **SECTION 10. STABILITY AND REACTIVITY**

#### Reactivity

Not reactive under normal conditions of use.

# **Chemical Stability**

Stable under normal conditions.

#### **Possibility of Hazardous Reactions**

None expected under normal conditions of storage and use.

#### **Conditions to Avoid**

Excess heat. Open flames, sparks, static discharge, heat and other ignition sources.

## **Incompatible Materials**

Strong oxidizing agents (e.g. perchloric acid).

#### **Hazardous Decomposition Products**

Oxides of carbon.

# **SECTION 11. TOXICOLOGICAL INFORMATION**

# **Likely Routes of Exposure**

Skin contact; eye contact; ingestion; inhalation.

# **Acute Toxicity**

Chemical Name	LC50	LD50 (oral)	LD50 (dermal)
Mineral Oil	Not available	>= 22,000 mg/kg (rat)	Not available
Poly(oxy-1,2-ethanediyl)-, alpha-(4-nonylphenyl)-omega -hydroxy-, branched	Not available	Not available	Not available
Silica, quartz	Not available	500 mg/kg (rat)	Not available

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Xanthan gum	Not available	> 1,000 mg/kg (mouse)	Not available
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#### Skin Corrosion/Irritation

May cause skin irritation. Irritating to skin, prolonged contact can de fat the skin and cause dermatitis symptoms may include drying and cracking of the skin (dermatitis).

### Serious Eye Damage/Irritation

May cause moderate eye irritation. Symptoms can include: redness, swelling, a burning sensation and blurred vision.

# STOT (Specific Target Organ Toxicity) - Single Exposure

#### Inhalation

Material is irritating to mucous membranes and upper respiratory tract. Symptoms may include headache, nausea, dizziness, drowsiness and confusion.

#### Ingestion

May be harmful if ingested liquid can be drawn into the lungs from ingestion or vomiting and may cause severe health effects such as bronchopneumonia or pulmonary edema. May cause. irritation of the gastrointestinal tract. Symptoms may include nausea, vomiting, stomach cramps and diarrhea.

### **Aspiration Hazard**

Liquid may be aspirated into the lungs during ingestion or vomiting resulting in lung injury.

# STOT (Specific Target Organ Toxicity) - Repeated Exposure

Prolonged skin contact may aggravate existing skin conditions such as dermatitis. Long term exposure to respirable crystalline silica dust over the TLV may lead to the development of silicosis or other respiratory problems. Symptoms include cough, shortness of breath, wheezing, non-specific chest illness and reduced pulmonary function.

### Respiratory and/or Skin Sensitization

Not known to be a respiratory sensitizer. Repeated contact with this product may cause dermal irritation, dryness and cracking.

#### Carcinogenicity

Chemical Name	IARC	ACGIH®	NTP	OSHA
Mineral Oil	Group 3	A4	Not Listed	Not Listed
Poly(oxy-1,2-ethanediyl)-, alpha-(4-nonylphenyl)-omega -hydroxy-, branched		Not Listed	Not Listed	Not Listed
Silica, quartz	Group 1	A2	Known carcinogen	Not Listed
Xanthan gum	Not Listed	Not Listed	Not Listed	Not Listed

This product contains free silica which the International Agency for Research on Cancer (IARC) has listed as causing cancer in humans.

# Key to Abbreviations

IARC = International Agency for Research on Cancer. Group 1 = Carcinogenic to humans. Group 3 = Not classifiable as to its carcinogenicity to humans. ACGIH® = American Conference of Governmental Industrial Hygienists. A2 = Suspected human carcinogen. A4 = Not classifiable as a human carcinogen. NTP = National Toxicology Program. OSHA = US Occupational Safety and Health Administration.

# **Reproductive Toxicity**

# **Development of Offspring**

No information was located.

## **Sexual Function and Fertility**

No information was located.

# Effects on or via Lactation

No information was located.

#### **Germ Cell Mutagenicity**

No information was located.

#### **Interactive Effects**

Smoking and being exposed to free silica may cause a greater risk of developing certain pulmonary illnesses.

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# **SECTION 12. ECOLOGICAL INFORMATION**

Do not allow product to contaminate domestic or irrigation water supplies, lakes, streams, ponds or rivers.

### **Toxicity**

No information was located.

# **Acute Aquatic Toxicity**

Chemical Name	LC50 Fish	EC50 Crustacea	ErC50 Aquatic Plants	ErC50 Algae
Mineral Oil	Not available	Not available	Not available	Not available
Poly(oxy-1,2-ethanediyl)-, alpha-(4-nonylphenyl)- omega-hydroxy-, branched	Not available	Not available	Not available	Not available
Silica, quartz	Not available	Not available	Not available	Not available
Xanthan gum	Not available	Not available	Not available	Not available

#### Persistence and Degradability

No information was located.

#### **Bioaccumulative Potential**

No information was located.

# **Mobility in Soil**

Studies are not available.

# **SECTION 13. DISPOSAL CONSIDERATIONS**

### **Disposal Methods**

Dispose of in accordance with all local, state and federal regulations. Not classified as RCRA Hazardous. RCRA WASTE NUMBER: Not Applicable.

# **SECTION 14. TRANSPORT INFORMATION**

Not regulated under US DOT Regulations.

# **SECTION 15. REGULATORY INFORMATION**

# Safety, Health and Environmental Regulations

### USA

# Toxic Substances Control Act (TSCA) Section 8(b)

All ingredients are on the TSCA Inventory or are exempt from TSCA Inventory requirements under 40 CFR 720.

#### **Additional USA Regulatory Lists**

CERCLA: No listed components.

SARA Title III - Section 302: No listed components.

SARA Title III - Section 311/312: Immediate Health Hazard Chronic Health Hazard.

SARA Title III - Section 313: No chemicals are reportable under Section 313.

# **SECTION 16. OTHER INFORMATION**

NFPA Rating Health - 1 Flammability - 1 Instability - 0

SDS Prepared By AES Drilling Fluids Phone No. 281-556-5628

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**Disclaimer** Do not handle or use until precautions on MSDS are read and understood. The information on

this form is furnished solely for the purpose of enabling those who transport, handle or use our

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products to ensure the safety and health of their employees and to comply with various laws and regulations (federal, state and local). We believe the statements, technical information and recommendations contained herein are reliable but, they are given without warranty or guarantee of any kind, express or implied and we assume no responsibility for any loss, damage, direct or consequential, arising out of their use.

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