HALLIBURTON

MATERIAL SAFETY DATA SHEET

Product Trade Name: ANHIB INHIBITOR

Revision Date: 20-Dec-2012

1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Trade Name: ANHIB INHIBITOR

Synonyms: None Chemical Family: Blend

Application: Corrosion Inhibitor

Manufacturer/Supplier Halliburton Energy Services

P.O. Box 1431

Duncan, Oklahoma 73536-0431

Emergency Telephone: (281) 575-5000

Prepared By Chemical Compliance

Telephone: 1-580-251-4335

e-mail: fdunexchem@halliburton.com

2. COMPOSITION/INFORMATION ON INGREDIENTS

Substances	CAS Number	PERCENT	ACGIH TLV-TWA	OSHA PEL-TWA
Ammonium bisulfite	10192-30-0	5 - 10%	Not applicable	Not applicable
Isopropanol	67-63-0	20-40	200 ppm	400 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. Repeated

overexposure may cause liver and kidney effects. Flammable.

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. Destroy or properly dispose of contaminated shoes.

Eyes In case of contact, or suspected contact, immediately flush eyes with plenty of water

for at least 15 minutes and get medical attention immediately after flushing.

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

FIRE FIGHTING MEASURES

Flash Point/Range (F): 66 Flash Point/Range (C): 18 Flash Point Method: **PMCC**

Autoignition Temperature (F): Not Determined **Autoignition Temperature (C):** Not Determined Flammability Limits in Air - Lower (%): Not Determined Flammability Limits in Air - Upper (%): Not Determined

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

Special Exposure Hazards May be ignited by heat, sparks or flames. Use water spray to cool fire exposed

surfaces. Closed containers may explode in fire. Decomposition in fire may produce

toxic gases.

Fire-Fighters

Special Protective Equipment for Full protective clothing and approved self-contained breathing apparatus required for

fire fighting personnel.

NFPA Ratings: Health 1, Flammability 3, Reactivity 0 Health 1, Flammability 3, Reactivity 0 **HMIS Ratings:**

ACCIDENTAL RELEASE MEASURES

Personal Precautionary Measures Use appropriate protective equipment.

Environmental Precautionary

Measures

Prevent from entering sewers, waterways, or low areas.

Procedure for Cleaning /

Absorption

Isolate spill and stop leak where safe. Remove ignition sources and work with nonsparking tools. Contain spill with sand or other inert materials. Scoop up and

remove.

HANDLING AND STORAGE

Handling Precautions Avoid contact with eyes, skin, or clothing. Avoid breathing vapors. Wash hands after

use. Launder contaminated clothing before reuse. Ground and bond containers

when transferring from one container to another.

Storage Information Store away from oxidizers. 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.

EXPOSURE CONTROLS/PERSONAL PROTECTION

Engineering Controls Use in a well ventilated area. Local exhaust ventilation should be used in areas

without good cross ventilation.

In high concentrations, supplied air respirator or a self-contained breathing **Respiratory Protection**

apparatus.

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.

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9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State:

Color:

Red

Odor:

PH:

Specific Gravity @ 20 C (Water=1):

Density @ 20 C (Ibs./gallon):

Liquid

Red

Ammonia

8.9

1.07

Bulk Density @ 20 C (lbs/ft3):Not DeterminedBoiling Point/Range (F):Not DeterminedBoiling Point/Range (C):Not DeterminedFreezing Point/Range (F):Not DeterminedFreezing Point/Range (C):Not Determined

Vapor Pressure @ 20 C (mmHg): 97

Vapor Density (Air=1): Not Determined

Percent Volatiles: 13

Evaporation Rate (Butyl Acetate=1): Not Determined

Solubility in Water (g/100ml): Soluble

Solubility in Solvents (g/100ml):

VOCs (lbs./gallon):

Viscosity, Dynamic @ 20 C (centipoise):

Viscosity, Kinematic @ 20 C (centistokes):

Partition Coefficient/n-Octanol/Water:

Molecular Weight (g/mole):

Not Determined

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. Strong acids.

Hazardous Decomposition

Products

Oxides of nitrogen. Oxides of sulfur. Carbon monoxide and carbon dioxide.

Additional Guidelines Not Applicable

11. TOXICOLOGICAL INFORMATION

Principle Route of Exposure Eye or skin contact, inhalation.

Inhalation May cause respiratory irritation. May cause central nervous system depression

including headache, dizziness, drowsiness, incoordination, slowed reaction time,

slurred speech, giddiness and unconsciousness.

Skin Contact May cause moderate skin irritation.

Eye Contact May cause moderate eye irritation.

Ingestion May cause abdominal pain, vomiting, nausea, and diarrhea. Irritation of the mouth,

throat, and stomach.

Aggravated Medical Conditions Skin disorders.

Chronic Effects/Carcinogenicity Repeated overexposure may cause liver and kidney effects.

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 /

Not determined

Developmental Toxicity:

12. ECOLOGICAL INFORMATION

Mobility (Water/Soil/Air) Not determined

Persistence/Degradability Slowly biodegradable

Bio-accumulation Not determined

Ecotoxicological Information

Acute Fish Toxicity: Not determined Acute Crustaceans Toxicity: Not determined Acute Algae Toxicity: Not determined

Chemical Fate InformationNot determinedOther InformationNot applicable

13. DISPOSAL CONSIDERATIONS

Disposal MethodDisposal 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

UN1993,Flammable Liquid, N.O.S.(Contains Isopropanol), 3, II, (19 C) NAERG 128

Canadian TDG

Flammable Liquid, N.O.S.(Contains Isopropanol), 3, UN1993, II, (19 C)

ADR

Air Transportation

ICAO/IATA

UN1993, Flammable Liquid, N.O.S., 3, II (Contains Isopropanol)

Sea Transportation

IMDG

UN1993, Flammable Liquid, N.O.S. (Contains Isopropanol), 3, II, (19 C) EmS F-E, S-E

Other Transportation Information

Flammable Liquid Labels:

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:

Isopropanol//67-63-0

EPA CERCLA/Superfund Reportable Spill Quantity EPA Reportable Spill Quantity is 1921 Gallons based on Ammonium bisulfite (CAS:

10192-30-0).

EPA RCRA Hazardous Waste

Classification

If product becomes a waste, it does meet the criteria of a hazardous waste as

defined by the US EPA, because of:

Ignitability D001

All components listed do not apply to the California Proposition 65 Regulation. **California Proposition 65**

One or more components listed. MA Right-to-Know Law

NJ Right-to-Know Law One or more components listed.

PA Right-to-Know Law One or more components listed.

Canadian Regulations

All components listed on inventory or are exempt. **Canadian DSL Inventory**

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

This information is furnished without warranty, expressed or implied, as to accuracy or completeness. The information is obtained from various sources including the manufacturer and other third party sources. The information may not be valid under all conditions nor if this material is used in combination with other materials or in any process. Final determination of suitability of any material is the sole responsibility of the user.

END OF MSDS