

FRANCIS DRILLING FLUIDS, LTD.

MATERIAL SAFETY DATA SHEET

		I. PRODUCT ID	ENTIFICAT	TION	
Trade Name(s):	Calcium Bromide Solu	ıtion			
Generic Name(s	s):				
Chemical Name	e(s): Calcium Bromide/V	Water Solution			
Francis Drilling Fluids, LTD. P.O. Box 1694 Crowley, LA 70527-1694			Emergency/Telephone No.: 800-960-6610 337-783-8685 Hazardous Materials No.: 800-255-3924 Poison Control Center No.: 800-256-9822		
		II. HAZARDOU	S INGREDIE	ENTS	
Ingredient		CAS No.	%	Hazard	
Calcium Bromio	de	7789-41-5			
	III. NF	PA/HMIS HAZARD	IDENTIFICA	ATION SYSTEM	
0=LEAST	1=SLIGHT	2=MODERATE		3=HIGH	4 =EXTREME
		Hea	lth: 0		
		Fir	e: 0		
		React	ivity: 0		
		IV. PHYSI	CAL DATA		
Boiling Point (°F): 119°C/246°F			Specific Gravity (H ₂ 0=1): 1.83 (max.)		
Vapor Pressure (mm. Hg): 16mm Hg @ 20C/68F			Melting Point: ND		
Vapor Density (Air = 1): ND			Evaporation Rate: ND		
Solubility in Water: Miscible			pH: ND		
Density (at 20° C): 15.3 lbs/gal (max.)			Odor: Slight odor		
Appearance: Clo	ear liquid				
		V. FIRE AND EX	KPLOSION D	OATA	
Flash Point: Non-flammable			Flammable I	Limits: LEL: NA	A UEL: NA
Special Fire Fig	hting Procedures: Avoi	d breathing fumes.			
Unusual Fire an	d Explosion Hazards: N	Jone known. Condition	ns to avoid: Ex	xtremely high heat.	
Extinguishing N	Media: None required.				

VI. REACTIVITY

Stability: Stable

Hazardous Polymerization: Will not occur.

Incompatibility: Strong acids and strong oxidizing agents

Hazardous Decomposition: Includes bromide.

VII. HEALTH HAZARD INFORMATION

Routes of Exposure and Effects:

Skin: Repeated or prolonged skin contact may cause irritation and superficial burns.

Eyes: Expected to be an eye irritant.

Inhalation: None

Ingestion: None

Permissible Exposure Limits: (for air contaminants) ND

OSHA PEL (8hr. TWA): ND

ACGIH TLV: ND

Carcinogenicity:

Listed By NTP: Not listed	Listed By: IARC: Not listed	Listed By OSHA: Not listed
Acute Oral LD50:	Acute Dermal LD50:	Aquatic Toxicology LC50:

Emergency and First Aid Procedures:

Skin: Wash contaminated areas with soap and water.

Eyes: Immediately flush eyes with plenty of water for at least 15 minutes. Get medical attention.

Ingestion: If swallowed, give two glasses of water.

Inhalation: If inhaled, remove to fresh air.

Additional Health Hazard Information::

If repeated or prolonged skin contact or contamination of clothing is likely, protective clothing should be worn.

VIII. HANDLING AND USE PRECAUTIONS

Steps to be Taken if Material is Released or Spilled: Contain any spills with dikes or absorbents to prevent migration and entry into sewers or streams. Take up small spills with dry chemical absorbent. Large spills may be taken up with pump or vacuum and finished off with dry chemical absorbent. May require excavation of contaminated soil.

Waste Disposal Methods: To the best of FDF's knowledge, this product is not regulated by CERCLA/RCRA as a hazardous waste or material. However, this product has not been tested for the toxicity characteristic via the Toxicity Characteristic Leaching Procedure. Therefore, it may be disposed of as an industrial waste in a manner acceptable to good waste management practice and in compliance with applicable local, state and federal regulations.

Handling and Storage Precautions: No special storage required.

IX. INDUSTRIAL HYGIENE CONTROL MEASURES

Ventilation Requirements: Mechanical ventilation recommended.

Respirator: None under normal conditions.

Eye Protection: Chemical goggles.

Gloves: Resistant to chemical penetration.

Other Protective Clothing or Equipment: If repeated or prolonged skin contact or contamination of clothing is likely,

protective clothing should be worn.

X. SPECIAL PRECAUTIONS

XI. ENVIRONMENTAL/SAFETY REGULATION

TSCA: This material is in compliance with the Toxic Substances Control Act (15 USC 2601 - 2629).

Hazard Categories for SARA 311/312 reporting are indicated below:

Health Immediate (Acute).....Yes Health Delayed (Chronic).....No Physical Fire.....No Sudden Release of Pressure.....No Physical Physical Reactive.....No Physical Nuisance Mist/Dust Only.....No

DEPARTMENT OF TRANSPORTATION

Shipping Name: Not regulated	Hazard Class: Nonhazardous			
Hazardous Substance: None				
Cautionary Labeling: None				
NA=Not Applicable; ND=Not Determined or No Data	Date Prepared: July 31, 1995			

File Name: Calcium Bromide Solution

The data presented is true and correct to the best of our knowledge and belief; however, neither seller nor preparer make any warranties, express or implied, concerning the information presented. The user is cautioned to perform his own hazard evaluation and to rely upon his own determinations.