



**MSDS
MATERIAL SAFETY DATA SHEET**

CRUDE OIL (SOUR)
MSDS # 109

Effective: May 11, 2010

Manufacturer/Supplier:

Hunt Oil Company
1900 North Akard Street
Dallas, Texas 75201-2300
214-978-8000

Emergency Health Information:

CHEMTREC (for transport emergencies):

(713) 420-2600

800-424-9300
(USA)

202-483-7616
(Outside the USA)

Important Components:

<u>Component</u>	<u>CAS #</u>	<u>Range % by Wt.</u>	
Crude oil	8002-05-9		
Benzene	71-43-2	>0.1	ACGIH TLV-TWA: 10 ppm
Hydrogen sulfide	7783-06-4	>20 ppm	ACGIH TLV-TWA: 10 ppm ACGIH TLV-STEL: 15 ppm

Warning Statement:

Flammable liquid. Can cause skin irritation on prolonged or repeated contact. Vapor Harmful. May give off sulfur-containing gases. Cancer hazard. Harmful or fatal if liquid aspirated into lungs.

NFPA Codes: (Health;2) (Flammability;4) (Reactivity;0), Chronic Hazard

Appearance and odor:

Yellow to dark brown liquid; typical petroleum odor

HEALTH HAZARD INFORMATION

EYE

Effect: Contact with eyes may cause moderate to severe irritation.

First Aid: Flush eyes with plenty of water for 15-20 min. Seek medical attention.

Protection: Safety glasses or goggles are required when there is a possibility of splashing or spraying.

SKIN

Effect: Causes skin irritation on prolonged or repeated contact. Possible cancer hazard based on skin painting studies in laboratory animals. See toxicology section.

First Aid: Wash exposed skin with soap and water. Remove contaminated clothing including shoes, thoroughly clean and dry before reuse. Get prompt medical attention if irritation develops.

Protection: Avoid skin contact. Wear protective clothing and gloves. Wash thoroughly after handling.

INHALATION

Effect: Can be harmful or fatal if vapors are inhaled. Can cause blood disorders. See Toxicology Section.

First Aid: If worker is overcome, rescuer must wear supplied air breathing apparatus to remove worker to uncontaminated area. Give artificial respiration if not breathing. Get immediate medical attention.

Protection: If H2S is present, use NIOSH/MSHA certified approved breathing apparatus.

INGESTION

Effect: Harmful or fatal if aspirated into lungs. May cause gastrointestinal problems. See Toxicology section.

First Aid: If swallowed, **DO NOT** induce vomiting. Get immediate medical attention.

FIRE AND EXPLOSION INFORMATION

Flashpoint:	Flammable – varies widely < 73 to > 200 ° F (< 23 to > 93 ° C)
Extinguishing Media:	Agents approved for Class B hazards (e.g., dry chemical, carbon dioxide, foam, steam or water fog)
Unusual Fire and Explosion Hazards:	Flammable liquid. Vapor may explode if ignited in enclosed area. Product gives off vapors that are heavier than air which can travel considerable distances to a source of ignition and flashback.
Precautions:	Keep away from ignition sources (e.g., heat, sparks and open flames). Runoff to sewer may cause fire or explosion hazard.
Fire-fighting Equipment:	Firefighters should wear full bunker gear, including a positive pressure self-contained breathing apparatus.

REACTIVITY INFORMATION

Stability:	Stable
Conditions to Avoid:	Ignition sources (e.g. heat, sparks and open flames). Avoid unventilated, enclosed areas.
Materials to Avoid:	Avoid chlorine, fluorine and other strong oxidizers.
Hazardous Decomposition:	Incomplete burning can produce carbon monoxide and/or carbon dioxide and other harmful products.

CHEMICAL AND PHYSICAL PROPERTIES

Solubility in Water:	Negligible, below 0.1%
Specific Gravity (Water = 1):	0.75 – 0.99
Viscosity:	0.35 cp @ 50°F; 31-9000 SUS @ 20°C 22-1230 SUS at 50°C (approximate)
Vapor Density:	Greater than 1.

STORAGE AND ENVIRONMENTAL PROTECTION

Handling:	Keep away from ignition sources, e.g., heat, sparks or open flames. Do not breathe vapors. Do not get on skin or clothing. Ground and bound containers when transferring materials. Use with adequate ventilation.
Spills and Leaks:	Remove or shut off all sources of ignition. Contain and remove by mechanical means. Keep out of sewers and waterways. Use appropriate protective equipment.
Disposal:	Enclosed-controlled incineration is recommended unless directed otherwise by applicable ordinances.
Special Precautions:	Avoid strong oxidizers.

TOXICOLOGICAL INFORMATION

From skin-painting studies in laboratory animals, it has been concluded that most, if not all, petroleum crudes, regardless of source, possess carcinogenic activity to some degree. This means that workers who practice poor personal hygiene and who are repeatedly exposed by direct skin contact to crude oil over many years may potentially be at risk of developing skin cancer. However, intermittent or occasional with petroleum crude oils is not expected to have serious health effects as long as good personal hygiene measures such as those outlined in this material safety data sheet are followed.

Aspiration of this product into the lungs can cause chemical pneumonia and can be fatal. Aspiration into the lungs can occur while vomiting after ingestion of this product. Do not siphon by mouth.

Acute toxicity of benzene results primarily from depression of the central nervous system (CNS). Inhalation of concentrations over 50 ppm can produce headache, lassitude, weariness, dizziness, drowsiness, or excitation. Exposure to very high levels can result in unconsciousness and death.

Long term overexposure to benzene has been associated with certain types of leukemia in humans. In addition, the International Agency for Research on Cancer (IARC) and OSHA consider benzene to be a human carcinogen. Chronic exposures to benzene at levels of 100 ppm and below have been reported to cause adverse blood effects including anemia. Benzene exposure can occur by inhalation and absorption through the skin.

Inhalation and forced feeding studies of benzene in laboratory animals have produced a carcinogenic response in a variety of organs, including possibly leukemia, other adverse effects on the blood, chromosomal changes and some effects on the immune system. Exposure to benzene at levels up to 300 ppm did not produce birth defects in animal studies; however, exposure to the higher dosage levels (greater than 100 ppm) resulted in a reduction of body weight of the rat pups (fetotoxicity). Changes in the testes have been observed in mice exposed to benzene at 300 ppm, but reproductive performance was not altered in rats exposed to benzene at the same level.

TRANSPORTATION INFORMATION

DOT Proper Classification	Petroleum Crude Oil
DOT Hazard Class and Packing Group	3
DOT Identification Number	UN 1267
DOT Shipping Label	Flammable Liquid

Additional Marking Requirement: "Inhalation Hazard"

If net weight of product > 100 pounds, the container must be also marked with the letters "RO".

REGULATORY INFORMATION

Hydrogen sulfide is listed under the accident prevention provisions of section 112(r) of the Clean Air Act (CAA) with a threshold quantity (TQ) of 10,000 pounds.

SARA TITLE III NOTIFICATIONS AND INFORMATION

Hydrogen sulfide is listed as an extremely hazardous substance (EHS) subject to state and local reporting under Section 304 of SARA Title III (EPCRA).

The presence of hydrogen sulfide in quantities in excess of the threshold planning quantity (TPQ) of 100 pounds requires certain emergency planning activities to be conducted.

Releases of hydrogen sulfide in quantities equal to or greater than the reportable quantity (RQ) of 100 pounds are subject to reporting to the National Response Center under CERCLA, Section 304 SARA Title III.

NOTICE

This material safety data sheet and the information it contains is offered to you in good faith as accurate. We have reviewed any information contained in this data sheet which we received from sources outside our Company. We believe that information to be correct but cannot guarantee its accuracy or completeness. Health and safety precautions in this data sheet may not be adequate for all individuals and/or situations. It is the user's obligation to evaluate and use this product safely and to comply with all applicable laws and regulations. No statement made in this data sheet shall be construed as a permission or recommendation for the use of any product in a manner that might infringe existing patents. No warranty is made, either express or implied.