

MATERIAL SAFETY DATA SHEET



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Date Issued: 02/02/2013

MSDS No: KAESER SIGMA S-460-022307

SIGMA S-460 Synthetic Air Compressor Fluid

1. PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: SIGMA S-460 Synthetic Air Compressor Fluid

GENERAL USE: Lubricant and corrosion inhibitor

CHEMICAL FAMILY: Synthetic based lubricant

MANUFACTURER

Manufactured for Kaeser Compressors, Inc.

511 Sigma Drive

Fredericksburg, VA 22408

Product Stewardship: 281-354-8600

24 HR. EMERGENCY TELEPHONE NUMBERS

USA : 800-424-9300

International : 703-527-3887(collect calls accepted)

2. HAZARDS IDENTIFICATION

POTENTIAL HEALTH EFFECTS

EYES: May cause irritation.

SKIN: May irritate the skin after prolonged periods of contact.

INGESTION: May cause diarrhea.

INHALATION: Hydrocarbon mist may line breathing passages with oil making breathing difficult.

3. COMPOSITION / INFORMATION ON INGREDIENTS

Chemical Name	Wt. %	CAS	EINECS
Poly Ester Synthetic	5 - 10	68515-49-1	
Poly Alpha Olefin Synthetic	75 - 80	68037-01-4	
Hydrogenated ISO-Paraffin	10 - 15	64742-54-7	265-157-1
Synthetic Oxidation Inhibitor	0.5 - 1	68921-45-9	
Synthetic Corrosion Inhibitor	0.5 - 1	28015-99-8	
Synthetic Ashless EP Additive	1 - 5	10254-57-6	
Synthetic Oxidation Inhibitor	0.5 - 1	41484-35-9	

COMMENTS: This product contains no hazardous substances within the definition of OSHA Regulation 29 CFR 1910.1200.

4. FIRST AID MEASURES

EYES: Flush with water until all residual material is gone. If irritation persists, seek medical help.

SKIN: Wash thoroughly with hand cleanser, followed by soap and water. Contaminated clothing should be dry cleaned before reuse.

INGESTION: Wash out mouth immediately. Do not induce vomiting. Consult physician.

INHALATION: Clear air passage. If respiratory difficulty continues, seek medical help.

5. FIRE FIGHTING MEASURES

FLASH POINT AND METHOD: 238°C (460°F) COC

AUTOIGNITION TEMPERATURE: > 315°C (600°F)

EXTINGUISHING MEDIA: Foam, dry powder, Halon®, carbon dioxide, sand, earth and water mist.
Unsuitable: Water jet.

OTHER CONSIDERATIONS: Not flammable at ambient temp.

FIRE FIGHTING EQUIPMENT: Self-contained breathing apparatus.

6. ACCIDENTAL RELEASE MEASURES

SMALL SPILL: Contain spill and keep from entering waterways. Absorb on porous material. Large quantities can be pumped.

ENVIRONMENTAL PRECAUTIONS

LAND SPILL: Do not allow it to enter drains.

SPECIAL PROTECTIVE EQUIPMENT: Wear gloves and protective overalls.

7. HANDLING AND STORAGE

HANDLING: No special handling precautions necessary.

STORAGE: Do not store at elevated temperatures.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

EXPOSURE GUIDELINES

OSHA HAZARDOUS COMPONENTS (29 CFR1910.1200)							
		EXPOSURE LIMITS					
		OSHA PEL		ACGIH TLV		Supplier OEL	
Chemical Name		ppm	mg/m ³	ppm	mg/m ³	ppm	mg/m ³
Hydrogenated ISO-Paraffin	TWA	NL ^[1]	5 ^[1]	NL	5	NL	NL
	STEL	NL	NL	NL	10	NL	NL
Footnotes: 1. NL = Not listed							

PERSONAL PROTECTIVE EQUIPMENT

EYES AND FACE: Glasses, if applied to parts in motion.

SKIN: Oil-proof gloves for hypersensitive persons.

RESPIRATORY: Hydrocarbon absorbing respirator if misting.

PROTECTIVE CLOTHING: Overalls.

9. PHYSICAL AND CHEMICAL PROPERTIES

PHYSICAL STATE: Liquid

ODOR: Mild Hydrocarbon

COLOR: Golden

pH: Neutral

PERCENT VOLATILE: None

VAPOR PRESSURE: < 0.01

VAPOR DENSITY: Greater than air

BOILING POINT: > 371°C (700°F)

POUR POINT: -30°C

FLASH POINT AND METHOD: 238°C (460°F) COC

SOLUBILITY IN WATER: Insoluble

EVAPORATION RATE: Negligible

DENSITY: > 0.86

OXIDIZING PROPERTIES: None

10. STABILITY AND REACTIVITY

STABILITY: Chemically stable under normal conditions. No photoreactive agents.

CONDITIONS TO AVOID: Powerful sources of ignition and extreme temperatures.

HAZARDOUS DECOMPOSITION PRODUCTS: Burning generates smoke, airborne soot, hydrocarbons and oxides of carbon, sulfur and nitrogen. Residue mainly comprised of soot and mineral oxides.

INCOMPATIBLE MATERIALS: Strong inorganic and organic acids, oxidizing agents.

11. TOXICOLOGICAL INFORMATION

ACUTE

ORAL LD₅₀: > 2000 mg/kg

Notes: Extrapolated from component data

INHALATION LC₅₀: Not applicable.

SKIN EFFECTS: Very mild

CHRONIC: None known.

SUBCHRONIC: Not known

CARCINOGENICITY

IARC: No

NTP: No

OSHA: No

SENSITIZATION: Not known

12. ECOLOGICAL INFORMATION

ENVIRONMENTAL DATA: Due to its fluid nature and specific gravity, this product will float or spread across water making it a nuisance contaminant. It is not thought to be toxic to marine or land organisms.

BIOACCUMULATION/ACCUMULATION: Relatively well behaved. Bioaccumulation potential nil.

GENERAL COMMENTS: When released into the environment, adsorption to sediment and soil will be the predominant behavior.

13. DISPOSAL CONSIDERATIONS

DISPOSAL METHOD: Consider recycling. This product, as sold, does not meet the RCRA characteristics of a hazardous waste. Under RCRA, it is the responsibility of the user, at the time of disposal, to determine whether the product meets the RCRA criteria for hazardous waste. Contact a waste disposal company or local authority for advice.

EMPTY CONTAINER: See waste disposal section listed above.

14. TRANSPORT INFORMATION

DOT (DEPARTMENT OF TRANSPORTATION)

UN/NA NUMBER: N/A

OTHER SHIPPING INFORMATION: Nonhazardous

ROAD AND RAIL (ADR/RID): Bulk Nonhazardous

AIR (ICAO/IATA): Bulk Nonhazardous

VESSEL (IMO/IMDG): Bulk Nonhazardous

15. REGULATORY INFORMATION

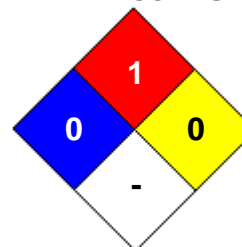
UNITED STATES

SARA TITLE III (SUPERFUND AMENDMENTS AND REAUTHORIZATION ACT)**311/312 HAZARD CATEGORIES:** None**313 REPORTABLE INGREDIENTS:** N/A**CERCLA (COMPREHENSIVE RESPONSE, COMPENSATION, AND LIABILITY ACT)****CERCLA REGULATORY:** Nonhazardous**TSCA (TOXIC SUBSTANCE CONTROL ACT)**

Chemical Name	CAS
Hydrogenated ISO-Paraffin	64742-54-7

TSCA REGULATORY: All components are listed**CALIFORNIA PROPOSITION 65:** This product contains a chemical known to the state of California to cause birth defects or other reproductive harm.**CANADA****WHMIS (WORKPLACE HAZARDOUS MATERIALS INFORMATION SYSTEM):** Not regulated**DOMESTIC SUBSTANCE LIST (INVENTORY):** All components are listed**16. OTHER INFORMATION****REVISION SUMMARY:** Revision 1 02-02-2013**HMIS RATING**

HEALTH:	0
FLAMMABILITY:	1
PHYSICAL HAZARD:	0
PERSONAL PROTECTION:	

NFPA CODES

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