

Safety Data Sheet

Issuing Date 21-Jun-2010 Revision Date 24-May-2019 Version 3

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING

Product identifier

Product name R&O Hydraulic Fluid: ISO 32, 46, 68, 100, 150, 220, 320, 460

Other means of identification

Product Code(s) 1222, 1223, 1224, 1225, 1226, 1227, 1228, 1229

Synonyms No information available

Recommended use of the chemical and restrictions on use

Recommended Use Rust and Oxidation Hydraulic Oil, Turbine Oil, Lubricant.

Uses advised against No information available

Details of the supplier of the safety data sheet

Manufacturer Address

Schaeffer Manufacturing Co. DuQuoin

845 N. Hickory Street Du Quoin,IL 62832 TEL: 1-618-542-5431

Emergency telephone number

Company Phone Number 1-618-542-5431 **Company Emergency Phone** (618) 542-5431

Number

Emergency telephone number Chemtrec 1-800-424-9300

2. HAZARDS IDENTIFICATION

Classification

OSHA Regulatory Status

While this material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200), this SDS contains valuable information critical to the safe handling and proper use of the product. This SDS should be retained and available for employees and other users of this product.

Label elements

EMERGENCY OVERVIEW

Appearance Amber colored liquid Physical state Viscous Liquid Odor Mild petroleum odor

Hazards not otherwise classified (HNOC)

Other information

Unknown Aquatic Toxicty 0% of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

Common NameHydrocarbon Lubricating Fluid.Chemical FamilyPetroleum hydrocarbon mixture.

Lubricating oils, petroleum, hydrotreated spent	64742-58-1	0-99	*
Residual Oils (petroleum), solvent-dewaxed	64742-62-7	0-96	*
Petroleum distillates, hydrotreated heavy paraffinic	64742-54-7	0-99	*

^{*}The exact percentage (concentration) of composition has been withheld as a trade secret.

4. FIRST AID MEASURES

First aid measures

General advice No hazards which require special first aid measures.

Eye contact Flush eyes for 30 minutes with water. Get medical attention if irritation persists.

Skin contact Remove contaminated shoes and clothing and cleanse affected area(s) thoroughly by

washing with mild soap and water or a waterless hand cleaner. If irritation or redness

develops and persists, seek medical attention.

Inhalation Move exposed persons to fresh air. Consult medical personnel if breathing issues occur.

Ingestion Do NOT induce vomiting. Consult a physician.

Most important symptoms and effects, both acute and delayed

Symptoms No information available.

Indication of any immediate medical attention and special treatment needed

Notes to Physician Treat symptomatically.

5. FIRE-FIGHTING MEASURES

Suitable extinguishing media

Carbon dioxide (CO₂). Dry chemical. Foam. Water can be used to keep surrounding materials cool.

Small Fires Always use personal safety equipment. Follow appropriate personal safety procedures, and

extinguishing media.

Large Fires Contact emergency personnel.

Unsuitable extinguishing media Caution: Use of water spray when fighting fire may be inefficient.

Specific hazards arising from the chemical

Combustible material.

Hazardous combustion products Carbon monoxide. Carbon dioxide (CO 2).

Explosion data

Sensitivity to Mechanical Impact None.
Sensitivity to Static Discharge None.

Protective equipment and precautions for firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal protection Avoid contact with the skin and the eyes. Eye protection or face shield should be used if

material is used under conditions that increase the chances of splattering. Wash skin with

soap and water if contact occurs. Launder soiled clothing. If spilled, take caution, as

material can cause surfaces to become very slippery.

Environmental precautions

Environmental precautions See Section 12 for additional Ecological Information.

Methods and material for containment and cleaning up

Methods for containment Cover with earth, sand, or other non-combustible material followed with plastic sheets to

minimize spreading or contact with rain.

Methods for cleaning up Excess liquid material can be collected using a scoop or shovel and stored for recycling or

disposal. Prevent material from entering drains or waterways.

7. HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling Avoid contact with skin, eyes and clothing. Eye protection or face shield should be used if

material is used under conditions that increase the chances of splattering. If contact is made, wash skin with soap and water. Launder soiled clothing. Maximum handling temperature is 70 degrees C (158 F). It is recommended to pump or transfer material at

ambient temperature.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep away from heat and sources of ignition. Keep containers closed when not in use.

Follow first aid measures if contact occurs, and spill procedures if spill occurs. For packaged material: Store in a cool dry area. For bulk material: store in cool dry area. Always follow local, state, and federal guidelines for storage of material for amount stored.

Incompatible Products Strong oxidizing agents.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

Exposure guidelinesThis product does not contain any hazardous materials with occupational exposure limits

established by the region specific regulatory bodies.

Chemical name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Petroleum distillates, hydrotreated	TWA: 5 mg/m ³	TWA: 5 mg/m ³	IDLH: 2500 mg/m ³
heavy paraffinic	_	-	TWA: 5 mg/m ³
64742-54-7			STEL: 10 mg/m ³

Appropriate engineering controls

Engineering Controls Showers

Eyewash stations Ventilation systems.

Individual protection measures, such as personal protective equipment

Eye/face Protection If splashes are likely to occur, wear:. Goggles. Eye/face Protection.

Skin and body protection Long sleeved clothing. Protective gloves can be worn, if material comes in contact with skin

wash with soap and water.

Respiratory protection If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved

respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be

Mild petroleum odor

Cleveland open cup (COC)

460

provided in accordance with current local regulations.

General Hygiene Considerations Remove and wash contaminated clothing before re-use.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

Physical state Viscous Liquid
Appearance Amber colored liquid Odor

Color amber Odor threshold No information available

<u>Property</u> <u>Values</u> <u>Remarks • Method</u>

PH No information available

Melting point/freezing point No information available

Boiling Point/Range No information available

Flash point > 148.8 °C / > 300 °F

Evaporation rate No information available

Flammability (solid, gas) No information available

Flammability (solid, gas)
Flammability Limit in Air

Upper flammability limit:
Lower flammability limit:
Vapor pressure
Vapor density

No information available
No information available
No information available
No information available

Specific gravity 0.87-0.89

Water solubility
Solubility in other solvents
Partition coefficient
No information available
No information available
No information available

Autoignition temperature Decomposition temperature

Decomposition temperatureNo information availableKinematic viscosity32-460 @40C mm2/sDynamic viscosityNo information availableExplosive propertiesNo information availableOxidizing propertiesNo information available

Other information

Softening pointNo information availableVOC ContentNo information availableDensityNo information availableBulk densityNo information available

10. STABILITY AND REACTIVITY

Reactivity

No data available

Chemical stability

Stable under normal conditions.

Possibility of Hazardous Reactions

None under normal processing.

Hazardous polymerization Hazardous polymerization does not occur.

Conditions to avoid

Excessive heat. High energy sources of ignition.

Incompatible materials

Strong oxidizing agents.

Hazardous decomposition products

None known based on information supplied.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information No data available

Inhalation Inhalation of vapors in high concentration may cause irritation of respiratory system.

Eye contact Avoid contact with eyes. May cause irritation.

Skin contact May cause eye/skin irritation. Repeated exposure may cause skin dryness or cracking.

Ingestion Do NOT taste or swallow.

Chemical name	Oral LD50	Dermal LD50	Inhalation LC50
Lubricating oils, petroleum, hydrotreated spent 64742-58-1	> 2000 mg/kg(Rat)	> 4480 mg/kg(Rabbit)	-
Residual Oils (petroleum), solvent-dewaxed 64742-62-7	> 5000 mg/kg (Rat)	> 2000 mg/kg(Rabbit)	= 2.18 mg/L (Rat) 4 h
Petroleum distillates, hydrotreated heavy paraffinic 64742-54-7	> 15 g/kg(Rat)> 24 g/kg(Rat)	> 5000 mg/kg(Rabbit)	= 2062 ppm (Rat) 4 h

Information on toxicological effects

Symptoms No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure

Sensitization
Germ cell mutagenicity

Carcinogenicity

No information available. No information available.

Mineral oils are known to cause cancer because of carcinogenic components (e.g. benzene). The mineral oil in this product is highly refined and should not be considered a carcinogen. Used lubricating oil may contain hazardous components which have the potential to cause skin cancer. Continuous long-term contact with used lubricating oils has

caused skin cancer in animal tests. .

Chemical name	ACGIH	IARC	NTP	OSHA
Residual Oils (petroleum), solvent-dewaxed 64742-62-7	-	Group 1	Known	X
Petroleum distillates, hydrotreated heavy paraffinic 64742-54-7	<u>-</u>	Group 1	Known	Х

Reproductive toxicity
STOT - single exposure
STOT - repeated exposure
Aspiration hazard
No information available.
No information available.
No information available.

Numerical measures of toxicity - Product Information

Unknown Aquatic Toxicty 0% of the mixture consists of ingredient(s) of unknown toxicity

The following values are calculated based on chapter 3.1 of the GHS document .

12. ECOLOGICAL INFORMATION

Ecotoxicity

0% of the mixture consists of components(s) of unknown hazards to the aquatic environment

Chemical name	Algae/aquatic plants	Fish	Crustacea
Residual Oils (petroleum), solvent-dewaxed	-	5000: 96 h Oncorhynchus mykiss	1000: 48 h Daphnia magna mg/L
64742-62-7		mg/L LC50	EC50
Petroleum distillates, hydrotreated heavy	=	5000: 96 h Oncorhynchus mykiss	1000: 48 h Daphnia magna mg/L
paraffinic		mg/L LC50	EC50
64742-54-7			

Persistence and degradability

No information available.

Bioaccumulation

No information available.

Other adverse effects No information available

13. DISPOSAL CONSIDERATIONS

Waste treatment methods

Waste Disposal Method Disposal should be in accordance with applicable regional, national and local laws and

regulations.

Contaminated packaging Do not reuse container.

14. TRANSPORT INFORMATION

DOT Not regulated

15. REGULATORY INFORMATION

International Inventories

TSCA Does not comply **DSL/NDSL** Does not comply **EINECS/ELINCS** Does not comply Does not comply **ENCS** Does not comply **IECSC KECL** Does not comply **PICCS** Does not comply **AICS** Does not comply

Legend:

All components in this product are listed on the US Toxic Substances Control Act (TSCA) inventory of chemicals.

R&O Hydraulic Fluid: ISO 32, 46, 68, 100, 150, 220, 320,

DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List

EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances

ENCS - Japan Existing and New Chemical Substances

IECSC - China Inventory of Existing Chemical Substances

KECL - Korean Existing and Evaluated Chemical Substances

PICCS - Philippines Inventory of Chemicals and Chemical Substances

AICS - Australian Inventory of Chemical Substances

U.S. Federal Regulations

SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

SARA 311/312 Hazard Categories

Acute health hazard	No
Chronic Health Hazard	No
Fire hazard	No
Sudden release of pressure hazard	No
Reactive Hazard	No

Clean Water Act

This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

CERCLA

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material

U.S. State Regulations

California Proposition 65

This product does not contain any Proposition 65 chemicals

U.S. State Right-to-Know Regulations

Chemical name	New Jersey	Massachusetts	Pennsylvania
Petroleum distillates, hydrotreated	X	-	X
heavy paraffinic			
64742-54-7			

U.S. EPA Label Information

EPA Pesticide registration number Not Applicable

16. OTHER INFORMATION

NFPA Health hazards 0 Flammability 1 Instability 0 Physical and Chemical

Hazards -

<u>HMIS</u> Health hazards 0 Flammability 1 Physical hazards 0 Personal protection X

Issuing Date 21-Jun-2010 **Revision Date** 24-May-2019

Revision Note

SDS sections updated 2 3 9 11 16

Disclaimer

The information provided on this SDS is correct to the best of our knowledge, information and belief at the date of its

publication. The information given is designed only as a guide for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered as a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process, unless specified in the text.

End of MSDS