

SAFETY DATA SHEET

According to Regulation (EC) No. 1907/2006 (REACH) Article 31, Annex II as amended.

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1 Product identifier

Product name: PENTOSYNTH R 5W-40

1.2 Relevant identified uses of the substance or mixture and uses advised against

Identified uses: Lubricant

Uses advised against: No uses advised against identified.

1.3 Details of the supplier of the safety data sheet

Manufacturer / Supplier Fuchs Schmierstoffe GmbH

Mexico Distributor LUBRICANTES FUCHS DE MEXICO, S.A. DE C.V. Friesenheimer Str. 19 Acceso C No. 101 Parque Industrial Jurica C.P. 76120 Querétaro, Qro/México + 52 (442) 238-9100 + 52 (442) 238-9110

Version: 1.0

68169 Mannheim

Telephone: +49 621 3701-0 (ZENTRALE)

Departamento de Calidad info@fuchs.com.mx Fax: +49 621 3701-570

Contact Person: Fuchs Schmierstoffe GmbH Abteilung Produktsicherheit

Telephone: +49 621 3701-1333 Fax: +49 621 3701-7303

E-mail: produktsicherheit@fuchs-schmierstoffe.de

1.4 Emergency telephone number: +49 621 3701-1333 ODER +49 621 3701-0

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

The product has been classified and labelled as hazardous according to regulation (EU) 1272/2008 (CLP).

Classification according to Regulation (EC) No 1272/2008 as amended.

Environmental Hazards

Chronic hazards to the aquatic Category 3 H412: Harmful to aquatic life with long lasting

environment effects.

Hazard summary

Physical Hazards: No data available.

2.2 Label Elements

Hazard Statement(s): H412: Harmful to aquatic life with long lasting effects.

Issue Date: 22.01.2016 Revision Date: 22.01.2016

Print date:: 02.03.2016 SDS DE - EN - 000000000601104282 1/14



Precautionary Statement

Prevention: P273: Avoid release to the environment.

2.3 Other hazards: By handling of mineral oil products and chemical products no particular

> hazard is known when normal precautions (item 7) and personal protective equipment (item 8) are kept. The product may not be released into the

environment without control.

SECTION 3: Composition/information on ingredients

3.2 Mixtures

General information: Mixture containing severely refined base oils and additives.

Chemical name Identifier		Concentration *	REACH Registration No.	Notes
baseoil, low viscous	EINECS: 276-738-4	50,00 - <100,00%	01-2119474889-13	
alkarylamine, longchained	EINECS: 253-249-4	1,00 - <5,00%	01-2119488911-28	
Phenol derivative	EINECS: 310-154-3	0,10 - <0,25%	01-2119513207-49	
Alkylated phenol	EINECS: 204-884-0	0,10 - <0,25%	01-2119490822-33	
Diphenylamine	EINECS: 204-539-4	0,10 - <0,25%		

^{*} All concentrations are percent by weight unless ingredient is a gas. Gas concentrations are in percent by volume.

Classification

Chemical name	Identifier	Classi	Classification	
baseoil, low viscous	EINECS: 276-738-4	CLP:	Asp. Tox. 1;H304	
alkarylamine, longchained	EINECS: 253-249-4	CLP:	Aquatic Chronic 4;H413	
Phenol derivative	EINECS: 310-154-3	CLP:	Repr. 2;H361f, Aquatic Acute 1;H400, Aquatic Chronic 1;H410, Skin Irrit. 2;H315, Eye Irrit. 2;H319	
Alkylated phenol	EINECS: 204-884-0	CLP:	Aquatic Acute 1;H400, Aquatic Chronic 1;H410, Skin Irrit. 2;H315	
Diphenylamine	EINECS: 204-539-4	CLP:	Acute Tox. 3;H301, Acute Tox. 3;H311, Acute Tox. 3;H331, STOT RE 2;H373, Aquatic Acute 1;H400, Aquatic Chronic 1;H410	

CLP: Regulation No. 1272/2008.

For the wording of the listed risk phrases refer to section 16.

SECTION 4: First aid measures

General: Instantly remove any clothing soiled by the product.

4.1 Description of first aid measures

Inhalation: Supply fresh air; consult doctor in case of symptoms.

Eye contact: Promptly wash eyes with plenty of water while lifting the eye lids.

Issue Date: 22.01.2016 Revision Date: 22.01.2016

Version: 1.0 Print date:: 02.03.2016 SDS DE - EN - 000000000601104282

PBT: persistent, bioaccumulative and toxic substance.

vPvB: very persistent and very bioaccumulative substance.



Skin Contact: Wash with soap and water. The product is not skin irritating.

Ingestion: Rinse mouth thoroughly.

4.2 Most important symptoms and effects, both acute and delayed:

May cause skin and eye irritation.

4.3 Indication of any immediate medical attention and special treatment needed

Get medical attention if symptoms occur.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing

media:

CO2, fire extinguishing powder or fog like water spraying. Extinguish larger fires with alcohol resistant foam or spray water with suitable surfactant

added

Unsuitable extinguishing

media:

Water with a full water jet.

5.2 Special hazards arising from the substance or

mixture:

During fire, gases hazardous to health may be formed.

5.3 Advice for firefighters

Special fire fighting

procedures:

Move container from fire area if it can be done without risk. Dispose of fire debris and contaminated fire fighting water inaccordance with official regulations. Collect contaminated fire fighting water separately. It must not

enter drains.

Special protective

equipment for fire-fighters:

Self-contained breathing apparatus and full protective clothing must be

worn in case of fire.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures:

In case of spills, beware of slippery floors and surfaces.

6.2 Environmental Precautions: Avoid release to the environment. Prevent further leakage or spillage if safe

to do so. Prevent from spreading (e.g. by binding or oil barriers).

Environmental manager must be informed of all major spillages. Do not

allow to enter drainage system, surface or ground water.

6.3 Methods and material for containment and cleaning

up:

Absorb with liquid-binding material (sand, diatomite, acidbinders, universal binders, sawdust). Dispose of the material collected according to

regulations. Stop the flow of material, if this is without risk.

Issue Date: 22.01.2016
Revision Date: 22.01.2016
Version: 1.0

Print date:: 02.03.2016

SDS DE - EN - 000000000601104282



6.4 Reference to other

sections:

See Section 8 of the SDS for Personal Protective Equipment. See Section 7 for information on safe handling See Section 13 for information on

disposal.

SECTION 7: Handling and storage:

7.1 Precautions for safe

handling:

Prevent formation of aerosols. Do not eat, drink or smoke when working with the product. Take usual precautions when handling mineral oil products or chemical products. Observe good industrial hygiene practices. Provide adequate ventilation.

7.2 Conditions for safe storage,

including any incompatibilities:

Local regulations concerning handling and storage of waterpolluting products have to be followed. Do not heat up to temperatures close to the flash point.

7.3 Specific end use(s): not applicable

Storage Class: 10, Combustible liquids

SECTION 8: Exposure controls/personal protection

8.1 Control Parameters

Occupational Exposure Limits

None of the components have assigned exposure limits.

8.2 Exposure controls

Appropriate engineering

controls:

Provide adequate ventilation. Ventilation rates should be matched to conditions. If applicable, use process enclosures, local exhaust ventilation, or other engineering controls to maintain airborne levels below

recommended exposure limits. If exposure limits have not been established, maintain airborne levels to an acceptable level.

Individual protection measures, such as personal protective equipment

General information: Wash hands before breaks and after work. Use personal protective

equipment as required. Personal protection equipment should be chosen according to the CEN standards and in discussion with the supplier of the personal protective equipment. The usual precautionary measures should be adhered to inhandling the chemicals or the mineral oil products.

Eye/face protection: Safety glasses (EN 166) recommended during refilling.

Issue Date: 22.01.2016 Revision Date: 22.01.2016 Print date:: 02.03.2016

SDS DE - EN - 000000000601104282

Version: 1.0



Skin protection

Hand Protection: Material: Nitrile butyl rubber (NBR). Avoid long-term and repeated skin

contact. Suitable gloves can be recommended by the glove supplier. Use skin protection cream for preventive skin protection. Protective gloves, where permitted in acc. to safety directions. The exact break through time has to be found out by the manufacturer of the protective gloves and has to

be observed.

Other: Do not carry cleaning cloths impregnated with the product in trouser

pockets. Wear suitable protective clothing.

Respiratory Protection: Ensure good ventilation/exhaustion at the workplace. Avoid breathing

vapour/ aerosol.

Thermal hazards: Not known.

Hygiene measures: Always observe good personal hygiene measures, such as washing after

handling the material and before eating, drinking, and/or smoking. Routinely

wash work clothing to remove contaminants. Discard contaminated

footwear that cannot be cleaned.

Environmental Controls: No data available.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Appearance

Physical state: liquid
Color: Amber

Odor: Characteristic

Odor Threshold: Not applicable for mixtures

pH: not applicable

Freezing point: Not applicable for mixtures

Boiling Point: Value not relevant for classification

Flash Point: 194 °C

Evaporation Rate: Not applicable for mixtures

Flammability (solid, gas): Value not relevant for classification

Flammability Limit - Upper (%)—:

Flammability Limit - Lower (%)—:

Vapor pressure:

Not applicable for mixtures

Not applicable for mixtures

Not applicable for mixtures

Not applicable for mixtures

Density: 0,85 g/cm3 (20 °C)

Solubility(ies)

Solubility in Water:Insoluble in waterSolubility (other):No data available.

Partition coefficient (n-octanol/water): Not applicable for mixtures

Autoignition Temperature: Value not relevant for classification

Decomposition Temperature: Value not relevant for classification

Issue Date: 22.01.2016 Revision Date: 22.01.2016

Print date:: 02.03.2016 SDS DE - EN - 00000000601104282

5/14

Version: 1.0



Kinematic viscosity: 70 mm2/s (40 °C)

Explosive properties: Value not relevant for classification
Oxidizing properties: Value not relevant for classification

9.2 Other information No data available.

SECTION 10: Stability and reactivity

10.1 Reactivity: Stable under normal use conditions.

10.2 Chemical Stability: Stable under normal use conditions.

10.3 Possibility of hazardous

reactions:

Stable under normal use conditions.

10.4 Conditions to avoid: Stable under normal use conditions.

10.5 Incompatible Materials: Strong oxidizing substances. Strong acids. Strong bases.

10.6 Hazardous Decomposition

Products:

Thermal decomposition or combustion may liberate carbon oxides and

other toxic gases or vapors.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity

Oral

Product: ATEmix: 78.802,21 mg/kg

Specified substance(s)

baseoil, low viscous LD 50 (Rat): > 2.001 mg/kg

alkarylamine, LD 50 (Rat): > 5.001 mg/kg (OECD 423)

longchained

Phenol derivative LD 50 (Rat): 2.200 mg/kg

Alkylated phenol No data available.

Diphenylamine LD 50 (Rat): > 5.000 mg/kg

Dermal

Product: ATEmix: 236.406,62 mg/kg

Specified substance(s)

baseoil, low viscous LD 50 (Rabbit): > 2.001 mg/kg

alkarylamine, LD 50 (Rat): > 2.001 mg/kg (OECD 402)

longchained

Phenol derivative LD 50 (Rabbit): 15.000 mg/kg

Alkylated phenol No data available.

Diphenylamine No data available.

Inhalation Product:

Not classified for acute toxicity based on available data.

Issue Date: 22.01.2016

Revision Date: 22.01.2016

Version: 1.0

Print date:: 02.03.2016 SDS DE - EN - 000000000601104282



Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Repeated dose toxicity

Product: No data available.

Specified substance(s)

baseoil, low viscous

alkarylamine,

No data available.

No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Skin Corrosion/Irritation:

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, OECD 404 (Rabbit):

longchained Not irritant.

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Serious Eye Damage/Eye Irritation:

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, OECD 405 (Rabbit):

longchained Not irritant.

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Respiratory or Skin Sensitization:

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, (Guinea Pig)

longchained No sensitizing effect (guinea pig); OECD 406

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Issue Date: 22.01.2016
Revision Date: 22.01.2016
Version: 1.0
Print date:: 02.03.2016

SDS DE - EN - 000000000601104282



Germ Cell Mutagenicity

In vitro

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarvlamine. No data available.

longchained

Phenol derivative No data available. Alkylated phenol No data available. Diphenylamine No data available.

In vivo

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available. Alkylated phenol No data available. Diphenylamine No data available.

Carcinogenicity

Product: No data available.

Specified substance(s)

baseoil. low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available. Alkylated phenol No data available. Diphenylamine No data available.

Reproductive toxicity

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available. Alkylated phenol No data available. Diphenylamine No data available.

Specific Target Organ Toxicity - Single Exposure Product: No data available.

Issue Date: 22.01.2016 Revision Date: 22.01.2016

Version: 1.0 Print date:: 02.03.2016 SDS DE - EN - 000000000601104282



Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Specific Target Organ Toxicity - Repeated Exposure

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Aspiration Hazard

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Other Adverse Effects: No data available.

SECTION 12: Ecological information

12.1 Toxicity

Acute toxicity

Fish

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available.

alkarylamine, LC 50 (Fish, 96 h): > 101 mg/l (OECD 203)

longchained

Phenol derivative LC 50 (Fish, 96 h): 40 mg/l

Alkylated phenol No data available. Diphenylamine No data available.

Aquatic Invertebrates

Product: No data available.

Issue Date: 22.01.2016 Revision Date: 22.01.2016 Print date:: 02.03.2016

SDS DE - EN - 000000000601104282

Version: 1.0



Specified substance(s)

baseoil, low viscous No data available.

alkarylamine, EC 50 (Water Flea, 48 h): > 101 mg/l (OECD 202)

longchained

Phenol derivative No data available.
Alkylated phenol No data available.

Diphenylamine EC 50 (Water Flea, 48 h): 0,31 mg/l

Chronic Toxicity

Fish

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available. alkarylamine, No data available.

longchained

Phenol derivative NOEC (Fish): 25 mg/l Alkylated phenol No data available. Diphenylamine No data available.

Aquatic Invertebrates

Product: No data available.

Specified substance(s)

baseoil, low viscous

No data available.

alkarylamine,

No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

Toxicity to Aquatic Plants

Product: No data available.

Specified substance(s)

baseoil, low viscous No data available.

alkarylamine, EC 50 (Alga, 72 h): > 101 mg/l (OECD 201)

longchained

Phenol derivative EC 50 (Alga, 72 h): 0,15 mg/l

Alkylated phenol No data available.

Diphenylamine EC 50 (Alga, 72 h): 1,51 mg/l

12.2 Persistence and Degradability

Biodegradation

Product: No data available.

Specified substance(s)

Issue Date: 22.01.2016
Revision Date: 22.01.2016
Version: 1.0
Print date:: 02.03.2016

SDS DE - EN - 000000000601104282



alkarylamine, The product is slightly biodegradable.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

12.3 Bioaccumulative Potential

Product: No data available.

Specified substance(s)

baseoil, low viscous

No data available.

alkarylamine,

No data available.

longchained

Phenol derivative No data available.
Alkylated phenol No data available.
Diphenylamine No data available.

12.4 Mobility in Soil: No data available.

Known or predicted distribution to environmental compartments

baseoil, low viscous
alkarylamine, longchained
Phenol derivative
Alkylated phenol
Diphenylamine

No data available.
No data available.
No data available.
No data available.

12.5 Results of PBT and vPvB

assessment:

The product does not contain any substances fulfilling the PBT/vPvB criteria.

12.6 Other Adverse Effects: Harmful to aquatic life with long lasting effects.

Water Hazard Class

(WGK):

WGK 2: water-endangering.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

General information: Dispose in accordance with all applicable regulations.

Disposal methods: Discharge, treatment, or disposal may be subject to national, state, or local

laws.

European Waste Codes

13 02 05*: mineral-based non-chlorinated engine, gear and lubricating oils

11/14

Issue Date: 22.01.2016

Revision Date: 22.01.2016

Version: 1.0

Print date:: 02.03.2016 SDS DE - EN - 00000000601104282



SECTION 14: Transport information

ADR/RID 14.1 UN Number: 14.2 UN Proper Shipping Name: 14.3 Transport Hazard Class(es) Class: Non-dangerous goods Label(s): Hazard No. (ADR): Tunnel restriction code: 14.4 Packing Group: 14.5 Environmental hazards: 14.6 Special precautions for user: ADN 14.1 UN Number: 14.2 UN Proper Shipping Name: 14.3 Transport Hazard Class(es) Class: Non-dangerous goods Label(s): 14.3 Packing Group: 14.5 Environmental hazards: 14.6 Special precautions for user: **IMDG** 14.1 UN Number: 14.2 UN Proper Shipping Name: 14.3 Transport Hazard Class(es) Class: Non-dangerous goods Label(s): EmS No.: 14.3 Packing Group: 14.5 Environmental hazards: 14.6 Special precautions for user: **IATA** 14.1 UN Number: 14.2 Proper Shipping Name: 14.3 Transport Hazard Class(es): Class: Non-dangerous goods Label(s): 14.4 Packing Group: 14.5 Environmental hazards: 14.6 Special precautions for user:

14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code: not applicable.

SECTION 15: Regulatory information

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture:

Issue Date: 22.01.2016 Revision Date: 22.01.2016 Version: 1.0 Print date:: 02.03.2016

SDS DE - EN - 000000000601104282



EU Regulations

Regulation (EC) No. 2037/2000 Substances that deplete the ozone layer: none

Regulation (EC) No. 850/2004 on persistent organic pollutants: none

National Regulations

Water Hazard Class

(WGK):

WGK 2: water-endangering.

15.2 Chemical safety assessment:

No Chemical Safety Assessment has been carried out.

SECTION 16: Other information

Revision Information: Vertical lines in the margin indicate an amendment.

Wording of the H-statements in section 2 and 3

H301	Toxic if swallowed.
H304	May be fatal if swallowed and enters airways.
H311	Toxic in contact with skin.
H315	Causes skin irritation.
H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H361f	Suspected of damaging fertility.
H373	May cause damage to organs through prolonged or repeated
	exposure.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.
H413	May cause long lasting harmful effects to aquatic life.

Other information: The classification is in line with current EC lists. It is expanded, however, by

information from technical literature and by information furnished by supplier

companies. The classification results from the Conventional Method

mentioned in regulation EU 1272/2008 (CLP).

Revision Date: 22.01.2016

Issue Date: 22.01.2016
Revision Date: 22.01.2016
Print date:: 02.03.2016

SDS DE - EN - 000000000601104282

Version: 1.0



Disclaimer:

The data contained in this safety data sheet are based on our current knowledge and experience and are given to the best of our knowledge and belief. It characterizes the product only with regard to safety requirements for handling, transport and disposal. The data do not describe the product's properties (tech. product specification). Neither should any agreed property nor the suitability of the product for any specific technical application be deduced from the data contained in this safety data sheet. Modifications on this document are not allowed. The data are not transferable to other products. In the case of mixing the product with other products or in the case of processing, the data in this safety data sheet are not necessarily valid for the new-made material. It is the responsibility of the recipient of the product to observe federal, state and local law. Please contact us to obtain up-to-date safety data sheets. This document was issued electronically and has no signature.

Issue Date: 22.01.2016 Revision Date: 22.01.2016 Print date:: 02.03.2016

SDS DE - EN - 000000000601104282