

WÜRTH GULF SUBMITTAL WEATHER SEALANT

Art. No. 0892 538###



➤ **Material Safety Data sheets**

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

1. PRODUCT AND COMPANY IDENTIFICATION

Product name : SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Product code : 0892 538531

Manufacturer or supplier's detailsCompany : Würth Gulf FZE
Jebel Ali Free Zone-SouthAddress : POBox 17036
Dubai

Telephone : 00971 4 880 9991

Emergency telephone number : Emergency telephone. Advisory office in case of poisoning
+9714 8834229. Telephone number of the company in case of
emergencies +97150 5646023

E-mail address : prodsafe@wuerth.com

Telefax : 00971 4 880 9255

Recommended use of the chemical and restrictions on use

Recommended use : Sealant

Restrictions on use :

Not applicable

2. HAZARDS IDENTIFICATION**GHS Classification**

Flammable liquids : Category 4

Serious eye damage/eye irritation : Category 1

Skin sensitisation : Category 1

Carcinogenicity : Category 1B

GHS label elements

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
 Date of first issue: 16.08.2022

Hazard pictograms :



Signal word : Danger

Hazard statements : H227 Combustible liquid.
 H317 May cause an allergic skin reaction.
 H318 Causes serious eye damage.
 H350 May cause cancer.

Precautionary statements :

Prevention:

P203 Obtain, read and follow all safety instructions before use.
 P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
 P261 Avoid breathing vapours.
 P271 Use only outdoors or in a well-ventilated area.
 P272 Contaminated work clothing should not be allowed out of the workplace.
 P280 Wear protective gloves/ protective clothing/ eye protection/ face protection.

Response:

P302 + P352 IF ON SKIN: Wash with plenty of water.
 P305 + P354 + P338 + P317 IF IN EYES: Immediately rinse with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical help.
 P318 IF exposed or concerned, get medical advice.
 P333 + P317 If skin irritation or rash occurs: Get medical help.
 P362 + P364 Take off contaminated clothing and wash it before reuse.

Storage:

P405 Store locked up.

Disposal:

P501 Dispose of contents/ container to an approved waste disposal plant.

Other hazards which do not result in classification

Vapours may form explosive mixture with air.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance / Mixture : Mixture

Components

Chemical name	CAS-No.	Concentration (% w/w)
Butan-2-one O,O',O''-(methylsilyldiyl)trioxime	22984-54-9	>= 2.5 - < 5
Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime	2224-33-1	>= 1 - < 2.5
3-(2-Aminoethylamino) propyltrimethoxysilane	1760-24-3	>= 1 - < 2.5

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

4. FIRST AID MEASURES

- General advice : In the case of accident or if you feel unwell, seek medical advice immediately.
When symptoms persist or in all cases of doubt seek medical advice.
- If inhaled : If inhaled, remove to fresh air.
Get medical attention.
- In case of skin contact : In case of contact, immediately flush skin with soap and plenty of water.
Remove contaminated clothing and shoes.
Get medical attention.
Wash clothing before reuse.
Thoroughly clean shoes before reuse.
- In case of eye contact : In case of contact, immediately flush eyes with plenty of water for at least 15 minutes.
If easy to do, remove contact lens, if worn.
Get medical attention immediately.
- If swallowed : If swallowed, DO NOT induce vomiting.
Get medical attention.
Rinse mouth thoroughly with water.
- Most important symptoms and effects, both acute and delayed : May cause an allergic skin reaction.
Causes serious eye damage.
May cause cancer.
- Protection of first-aiders : First Aid responders should pay attention to self-protection, and use the recommended personal protective equipment when the potential for exposure exists (see section 8).
- Notes to physician : Treat symptomatically and supportively.
-

5. FIREFIGHTING MEASURES

- Suitable extinguishing media : Water spray
Alcohol-resistant foam
Carbon dioxide (CO₂)
Dry chemical
- Unsuitable extinguishing media : High volume water jet
- Specific hazards during fire-fighting : Do not use a solid water stream as it may scatter and spread fire.
Flash back possible over considerable distance.
Vapours may form explosive mixtures with air.
Exposure to combustion products may be a hazard to health.
- Hazardous combustion products : Carbon oxides
Silicon oxides
-

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

Nitrogen oxides (NO_x)
Metal oxides

- Specific extinguishing methods : Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
Use water spray to cool unopened containers.
Remove undamaged containers from fire area if it is safe to do so.
Evacuate area.
- Special protective equipment for firefighters : In the event of fire, wear self-contained breathing apparatus.
Use personal protective equipment.

6. ACCIDENTAL RELEASE MEASURES

- Personal precautions, protective equipment and emergency procedures : Remove all sources of ignition.
Use personal protective equipment.
Follow safe handling advice (see section 7) and personal protective equipment recommendations (see section 8).
- Environmental precautions : Avoid release to the environment.
Prevent further leakage or spillage if safe to do so.
Prevent spreading over a wide area (e.g. by containment or oil barriers).
Retain and dispose of contaminated wash water.
Local authorities should be advised if significant spillages cannot be contained.
- Methods and materials for containment and cleaning up : Non-sparking tools should be used.
Soak up with inert absorbent material.
Suppress (knock down) gases/vapours/mists with a water spray jet.
For large spills, provide dyking or other appropriate containment to keep material from spreading. If dyked material can be pumped, store recovered material in appropriate container.
Clean up remaining materials from spill with suitable absorbent.
Local or national regulations may apply to releases and disposal of this material, as well as those materials and items employed in the cleanup of releases. You will need to determine which regulations are applicable.
Sections 13 and 15 of this SDS provide information regarding certain local or national requirements.

7. HANDLING AND STORAGE

- Technical measures : See Engineering measures under EXPOSURE CONTROLS/PERSONAL PROTECTION section.
- Local/Total ventilation : If sufficient ventilation is unavailable, use with local exhaust ventilation.
- Advice on safe handling : Do not get on skin or clothing.

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

Do not breathe vapours.
Do not swallow.
Do not get in eyes.
Handle in accordance with good industrial hygiene and safety practice, based on the results of the workplace exposure assessment
Keep container tightly closed.
Keep away from water.
Protect from moisture.
Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
Take precautionary measures against static discharges.
Take care to prevent spills, waste and minimize release to the environment.

Conditions for safe storage : Keep in properly labelled containers.
Store locked up.
Keep tightly closed.
Keep in a cool, well-ventilated place.
Store in accordance with the particular national regulations.
Keep away from heat and sources of ignition.

Materials to avoid : Do not store with the following product types:
Strong oxidizing agents
Self-reactive substances and mixtures
Organic peroxides
Explosives
Gases

Recommended storage temperature : -5 - 27 °C

Storage period : 12 Months

8. EXPOSURE CONTROLS/PERSONAL PROTECTION**Components with workplace control parameters**

Contains no substances with occupational exposure limit values.

Occupational exposure limits of decomposition products

Components	CAS-No.	Value type (Form of exposure)	Control parameters / Permissible concentration	Basis
Methanol	67-56-1	TWA	200 ppm	ACGIH
		STEL	250 ppm	ACGIH

Engineering measures : Processing may form hazardous compounds (see section 10).
Minimize workplace exposure concentrations.
If sufficient ventilation is unavailable, use with local exhaust ventilation.

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

Personal protective equipment

- Respiratory protection : If adequate local exhaust ventilation is not available or exposure assessment demonstrates exposures outside the recommended guidelines, use respiratory protection.
- Filter type : Combined particulates, ammonia/amines and organic vapour type
- Hand protection
Material : Polyethylene
- Remarks : Choose gloves to protect hands against chemicals depending on the concentration and quantity of the hazardous substance and specific to place of work. For special applications, we recommend clarifying the resistance to chemicals of the aforementioned protective gloves with the glove manufacturer. Wash hands before breaks and at the end of workday. Breakthrough time is not determined for the product. Change gloves often!
- Eye protection : Wear the following personal protective equipment:
Chemical resistant goggles must be worn.
If splashes are likely to occur, wear:
Face-shield
- Skin and body protection : Select appropriate protective clothing based on chemical resistance data and an assessment of the local exposure potential.
Wear the following personal protective equipment:
If assessment demonstrates that there is a risk of explosive atmospheres or flash fires, use flame retardant antistatic protective clothing.
Skin contact must be avoided by using impervious protective clothing (gloves, aprons, boots, etc).
- Hygiene measures : If exposure to chemical is likely during typical use, provide eye flushing systems and safety showers close to the working place.
When using do not eat, drink or smoke.
Contaminated work clothing should not be allowed out of the workplace.
Wash contaminated clothing before re-use.

9. PHYSICAL AND CHEMICAL PROPERTIES

- Appearance : paste
- Colour : coloured
- Odour : characteristic

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

Odour Threshold	:	No data available
pH	:	substance/mixture is non-soluble (in water)
Melting point/freezing point	:	No data available
Initial boiling point and boiling range	:	No data available
Flash point	:	70 - 90 °C
Evaporation rate	:	No data available
Flammability (solid, gas)	:	Not applicable
Flammability (liquids)	:	No data available
Upper explosion limit / Upper flammability limit	:	No data available
Lower explosion limit / Lower flammability limit	:	No data available
Vapour pressure	:	No data available
Relative vapour density	:	No data available
Relative density	:	No data available
Density	:	1.42 g/cm ³
Solubility(ies) Water solubility	:	insoluble
Partition coefficient: n-octanol/water	:	Not applicable
Auto-ignition temperature	:	No data available
Decomposition temperature	:	No data available
Viscosity Viscosity, kinematic	:	No data available
Explosive properties	:	Not explosive
Oxidizing properties	:	The substance or mixture is not classified as oxidizing.
Particle size	:	Not applicable

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
Date of first issue: 16.08.2022

10. STABILITY AND REACTIVITY

- Reactivity : Not classified as a reactivity hazard.
- Chemical stability : Stable under normal conditions.
- Possibility of hazardous reactions : Combustible liquid.
Vapours may form explosive mixture with air.
Use at elevated temperatures may form highly hazardous compounds.
Can react with strong oxidizing agents.
Methyl Ethyl Ketoxime (MEKO) is formed upon contact with water or humid air.
Hazardous decomposition products will be formed upon contact with water or humid air.
- Conditions to avoid : Exposure to moisture
Heat, flames and sparks.
- Incompatible materials : Oxidizing agents
Water

Hazardous decomposition products

- Contact with water or humid air : Methanol
Ethyl methyl ketoxime
-

11. TOXICOLOGICAL INFORMATION

- Information on likely routes of exposure : Inhalation
Skin contact
Ingestion
Eye contact

Acute toxicity

Not classified based on available information.

Product:

- Acute oral toxicity : Acute toxicity estimate: > 5,000 mg/kg
Method: Calculation method
- Acute inhalation toxicity : Acute toxicity estimate: > 10 mg/l
Exposure time: 4 h
Test atmosphere: dust/mist
Method: Calculation method

Components:**Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

- Acute oral toxicity : LD50 (Rat): 2,453 mg/kg
Method: OECD Test Guideline 401
- Acute dermal toxicity : LD50 (Rat): > 2,000 mg/kg
-

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
Date of first issue: 16.08.2022

Method: OECD Test Guideline 402

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Acute oral toxicity : LD50 (Rat): > 2,000 mg/kg
Method: OECD Test Guideline 425

Acute dermal toxicity : LD50 (Rat): > 2,009 mg/kg
Method: OECD Test Guideline 402

3-(2-Aminoethylamino) propyltrimethoxysilane:

Acute oral toxicity : LD50 (Rat, female): 1,897 mg/kg
Method: OPPTS 870.1100

Acute inhalation toxicity : LC50 (Rat): 1.49 - 2.44 mg/l
Exposure time: 4 h
Test atmosphere: dust/mist
Method: OPPTS 870.1300

Acute dermal toxicity : LD50 (Rabbit): > 2,000 mg/kg
Method: OPPTS 870.1200

Skin corrosion/irritation

Not classified based on available information.

Components:**Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Species : Rabbit
Method : OECD Test Guideline 404
Result : No skin irritation

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Species : Rabbit
Method : OECD Test Guideline 404
Result : No skin irritation

3-(2-Aminoethylamino) propyltrimethoxysilane:

Species : Rabbit
Method : OECD Test Guideline 404
Result : Mild skin irritation

Serious eye damage/eye irritation

Causes serious eye damage.

Components:**Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Species : Rabbit
Method : OECD Test Guideline 405
Result : Irritation to eyes, reversing within 21 days

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version Revision Date: SDS Number: Date of last issue: -
1.0 16.08.2022 10831171-00001 Date of first issue: 16.08.2022

Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime:

Species : Rabbit
Method : OECD Test Guideline 405
Result : Irreversible effects on the eye

3-(2-Aminoethylamino) propyltrimethoxysilane:

Species : Rabbit
Method : OECD Test Guideline 405
Result : Irreversible effects on the eye

Respiratory or skin sensitisation**Skin sensitisation**

May cause an allergic skin reaction.

Respiratory sensitisation

Not classified based on available information.

Components:**Butan-2-one O,O',O''-(methylsilyldiyl)trioxime:**

Test Type : Maximisation Test
Exposure routes : Skin contact
Species : Guinea pig
Result : positive

Assessment : Probability or evidence of skin sensitisation in humans

Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime:

Test Type : Maximisation Test
Exposure routes : Skin contact
Species : Guinea pig
Result : positive
Remarks : Based on data from similar materials

Assessment : Probability or evidence of skin sensitisation in humans

3-(2-Aminoethylamino) propyltrimethoxysilane:

Test Type : Maximisation Test
Exposure routes : Skin contact
Species : Guinea pig
Method : OECD Test Guideline 406
Result : positive

Assessment : Probability or evidence of low to moderate skin sensitisation rate in humans

Germ cell mutagenicity

Not classified based on available information.

Components:**Butan-2-one O,O',O''-(methylsilyldiyl)trioxime:**

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

Genotoxicity in vitro : Test Type: Bacterial reverse mutation assay (AMES)
Result: negative

Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime:

Genotoxicity in vitro : Test Type: Chromosome aberration test in vitro
Method: OECD Test Guideline 473
Result: positive

Test Type: Bacterial reverse mutation assay (AMES)
Method: OECD Test Guideline 471
Result: negative

Genotoxicity in vivo : Test Type: Mammalian erythrocyte micronucleus test (in vivo cytogenetic assay)
Species: Mouse
Application Route: Intraperitoneal injection
Method: OECD Test Guideline 474
Result: negative

3-(2-Aminoethylamino) propyltrimethoxysilane:

Genotoxicity in vitro : Test Type: Bacterial reverse mutation assay (AMES)
Method: OECD Test Guideline 471
Result: negative

Test Type: In vitro mammalian cell gene mutation test
Result: negative

Test Type: In vitro sister chromatid exchange assay in mammalian cells
Method: OPPTS 870.5900
Result: negative

Genotoxicity in vivo : Test Type: Mammalian erythrocyte micronucleus test (in vivo cytogenetic assay)
Species: Mouse
Application Route: Intraperitoneal injection
Result: negative

Carcinogenicity

May cause cancer.

Components:**Butan-2-one O,O',O''-(methylsilyldiyl)trioxime:**

Species : Rat
Application Route : inhalation (vapour)
Exposure time : 26 Months
Result : positive
Remarks : Based on data from similar materials

Carcinogenicity - Assessment : Sufficient evidence of carcinogenicity in animal experiments

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
Date of first issue: 16.08.2022

Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime:

Species : Rat
Application Route : inhalation (vapour)
Exposure time : 26 Months
Result : positive
Remarks : Based on data from similar materials

Carcinogenicity - Assessment : Sufficient evidence of carcinogenicity in animal experiments

Reproductive toxicity

Not classified based on available information.

Components:**Butan-2-one O,O',O''-(methylsilyldiyl)trioxime:**

Effects on fertility : Test Type: Combined repeated dose toxicity study with the reproduction/developmental toxicity screening test
Species: Rat
Application Route: Ingestion
Method: OECD Test Guideline 422
Result: negative

Effects on foetal development : Test Type: Combined repeated dose toxicity study with the reproduction/developmental toxicity screening test
Species: Rat
Application Route: Ingestion
Method: OECD Test Guideline 422
Result: negative

Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime:

Effects on fertility : Test Type: Combined repeated dose toxicity study with the reproduction/developmental toxicity screening test
Species: Rat
Application Route: Ingestion
Method: OECD Test Guideline 422
Result: negative
Remarks: Based on data from similar materials

Effects on foetal development : Test Type: Combined repeated dose toxicity study with the reproduction/developmental toxicity screening test
Species: Rat
Application Route: Ingestion
Method: OECD Test Guideline 422
Result: negative
Remarks: Based on data from similar materials

3-(2-Aminoethylamino) propyltrimethoxysilane:

Effects on fertility : Test Type: Combined repeated dose toxicity study with the reproduction/developmental toxicity screening test

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

Species: Rat
Application Route: Ingestion
Result: negative

Effects on foetal development : Test Type: Embryo-foetal development
Species: Rat
Application Route: Ingestion
Method: OECD Test Guideline 414
Result: negative

STOT - single exposure

Not classified based on available information.

Components:**Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Assessment : May cause drowsiness or dizziness.
Remarks : Based on data from similar materials

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Assessment : May cause drowsiness or dizziness.
Remarks : Based on data from similar materials

STOT - repeated exposure

Not classified based on available information.

Components:**Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Exposure routes : Ingestion
Target Organs : Blood
Assessment : Shown to produce significant health effects in animals at concentrations of 10 mg/kg bw or less.
Remarks : Based on data from similar materials

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Exposure routes : Ingestion
Target Organs : Blood
Assessment : Shown to produce significant health effects in animals at concentrations of >10 to 100 mg/kg bw.
Remarks : Based on data from similar materials

3-(2-Aminoethylamino) propyltrimethoxysilane:

Exposure routes : inhalation (dust/mist/fume)
Target Organs : Respiratory Tract
Assessment : Shown to produce significant health effects in animals at concentrations of >0.02 to 0.2 mg/l/6h/d.

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
Date of first issue: 16.08.2022

Repeated dose toxicity**Components:****Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Species : Rat
LOAEL : > 1.7 mg/l
Application Route : inhalation (vapour)
Exposure time : 26 Months
Remarks : Based on data from similar materials

Species : Rat, male
NOAEL : > 10 - 100 mg/kg
Application Route : Ingestion
Exposure time : 13 Weeks
Remarks : Based on data from similar materials

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Species : Rat
LOAEL : > 1.7 mg/l
Application Route : inhalation (vapour)
Exposure time : 26 Months
Remarks : Based on data from similar materials

Species : Rat, male
NOAEL : > 10 - 100 mg/kg
Application Route : Ingestion
Exposure time : 13 Weeks
Remarks : Based on data from similar materials

3-(2-Aminoethylamino) propyltrimethoxysilane:

Species : Rat
NOAEL : >= 500 mg/kg
Application Route : Ingestion
Exposure time : 44 Days

Species : Rat
NOAEL : 0.015 mg/l
LOAEL : 0.045 mg/l
Application Route : inhalation (dust/mist/fume)
Exposure time : 13 Weeks
Method : OECD Test Guideline 413

Aspiration toxicity

Not classified based on available information.

12. ECOLOGICAL INFORMATION**Ecotoxicity****Components:****Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

- Toxicity to fish : EC50 (Oncorhynchus mykiss (rainbow trout)): > 120 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203
- Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): > 120 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202
- Toxicity to algae/aquatic plants : ErC50 (Pseudokirchneriella subcapitata (green algae)): 94 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
- NOEC (Pseudokirchneriella subcapitata (green algae)): 30 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
- Toxicity to microorganisms : EC50: > 1,000 mg/l
Exposure time: 3 h
Method: OECD Test Guideline 209
- Toxicity to fish (Chronic toxicity) : NOEC: > 1 mg/l
Exposure time: 14 d
Species: Oryzias latipes (Orange-red killifish)
Method: OECD Test Guideline 204
Remarks: Based on data from similar materials
- Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : NOEC: > 1 mg/l
Exposure time: 21 d
Species: Daphnia magna (Water flea)
Method: OECD Test Guideline 211
Remarks: Based on data from similar materials

Butan-2-one O,O',O''-(vinylsilyldiyl)trioxime:

- Toxicity to fish : LC50 (Oryzias latipes (Japanese medaka)): > 100 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203
Remarks: Based on data from similar materials
- Toxicity to daphnia and other aquatic invertebrates : EC50 (Daphnia magna (Water flea)): > 100 mg/l
Exposure time: 48 h
Method: OECD Test Guideline 202
Remarks: Based on data from similar materials
- Toxicity to algae/aquatic plants : ErC50 (Scenedesmus capricornutum (fresh water algae)): > 10 - 100 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
Remarks: Based on data from similar materials
- NOEC (Scenedesmus capricornutum (fresh water algae)): > 1 mg/l
Exposure time: 72 h

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
Date of first issue: 16.08.2022

Method: OECD Test Guideline 201
Remarks: Based on data from similar materials

Toxicity to microorganisms : EC50 (Pseudomonas putida): > 100 mg/l
Exposure time: 17 h
Remarks: Based on data from similar materials

Toxicity to fish (Chronic toxicity) : NOEC: > 1 mg/l
Exposure time: 14 d
Species: Oryzias latipes (Orange-red killifish)
Method: OECD Test Guideline 204
Remarks: Based on data from similar materials

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : NOEC: > 1 mg/l
Exposure time: 21 d
Species: Daphnia magna (Water flea)
Method: OECD Test Guideline 211
Remarks: Based on data from similar materials

3-(2-Aminoethylamino) propyltrimethoxysilane:

Toxicity to fish : LC50 (Danio rerio (zebra fish)): > 100 mg/l
Exposure time: 96 h
Method: Directive 67/548/EEC, Annex V, C.1.
Remarks: Based on data from similar materials

Toxicity to daphnia and other aquatic invertebrates : EL50 (Daphnia magna (Water flea)): > 10 - 100 mg/l
Exposure time: 48 h
Test substance: Water Accommodated Fraction
Method: Directive 67/548/EEC, Annex V, C.2.
Remarks: Based on data from similar materials

Toxicity to algae/aquatic plants : ErC50 (Pseudokirchneriella subcapitata (green algae)): > 1 - 10 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
Remarks: Based on data from similar materials

NOEC (Pseudokirchneriella subcapitata (green algae)): > 1 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
Remarks: Based on data from similar materials

Toxicity to microorganisms : EC10 (Pseudomonas putida): > 1 mg/l
Exposure time: 16 h
Method: DIN 38 412 Part 8
Remarks: Based on data from similar materials

Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity) : NOEC: >= 1 mg/l
Exposure time: 21 d
Species: Daphnia magna (Water flea)
Remarks: Based on data from similar materials

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version 1.0 Revision Date: 16.08.2022 SDS Number: 10831171-00001 Date of last issue: -
Date of first issue: 16.08.2022

Persistence and degradability**Components:****Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Biodegradability : Result: Not readily biodegradable.
Biodegradation: 28 %
Exposure time: 28 d
Method: OECD Test Guideline 301C

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Biodegradability : Result: not rapidly degradable
Biodegradation: 0 %
Exposure time: 28 d
Method: OECD Test Guideline 301A
Remarks: Based on data from similar materials

3-(2-Aminoethylamino) propyltrimethoxysilane:

Biodegradability : Result: Not readily biodegradable.
Method: Regulation (EC) No. 440/2008, Annex, C.4-A
Remarks: Based on data from similar materials

Bioaccumulative potential**Components:****Butan-2-one O,O',O''-(methylsilylidyne)trioxime:**

Partition coefficient: n-octanol/water : log Pow: 0.59 - 0.65

Butan-2-one O,O',O''-(vinylsilylidyne)trioxime:

Bioaccumulation : Species: Cyprinus carpio (Carp)
Bioconcentration factor (BCF): 0.5 - 2.5
Remarks: Based on data from similar materials

Partition coefficient: n-octanol/water : log Pow: 0.59 - 0.65

3-(2-Aminoethylamino) propyltrimethoxysilane:

Partition coefficient: n-octanol/water : log Pow: -3.3
Remarks: Calculation

Mobility in soil

No data available

Other adverse effects

No data available

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

13. DISPOSAL CONSIDERATIONS**Disposal methods**

- Waste from residues : Dispose of in accordance with local regulations.
- Contaminated packaging : Empty containers should be taken to an approved waste handling site for recycling or disposal.
Empty containers retain residue and can be dangerous.
Do not pressurize, cut, weld, braze, solder, drill, grind, or expose such containers to heat, flame, sparks, or other sources of ignition. They may explode and cause injury and/or death.
If not otherwise specified: Dispose of as unused product.
-

14. TRANSPORT INFORMATION**International Regulations****UNRTDG**

Not regulated as a dangerous good

IATA-DGR

Not regulated as a dangerous good

IMDG-Code

Not regulated as a dangerous good

Transport in bulk according to IMO instruments

Not applicable for product as supplied.

Special precautions for user

Not applicable

15. REGULATORY INFORMATION

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

16. OTHER INFORMATION**Further information**

Sources of key data used to compile the Safety Data Sheet : Internal technical data, data from raw material SDSs, OECD eChem Portal search results and European Chemicals Agency, <http://echa.europa.eu/>

Full text of other abbreviations

ACGIH : USA. ACGIH Threshold Limit Values (TLV)

ACGIH / TWA : 8-hour, time-weighted average

ACGIH / STEL : Short-term exposure limit

SILSEAL-GLZNG-NEU-RAL9016-WHITE-600ML

Version	Revision Date:	SDS Number:	Date of last issue: -
1.0	16.08.2022	10831171-00001	Date of first issue: 16.08.2022

AIIIC - Australian Inventory of Industrial Chemicals; ANTT - National Agency for Transport by Land of Brazil; ASTM - American Society for the Testing of Materials; bw - Body weight; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardisation; DSL - Domestic Substances List (Canada); ECx - Concentration associated with x% response; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; ERG - Emergency Response Guide; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; n.o.s. - Not Otherwise Specified; Nch - Chilean Norm; NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NOM - Official Mexican Norm; NTP - National Toxicology Program; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; SADT - Self-Accelerating Decomposition Temperature; SDS - Safety Data Sheet; TCSI - Taiwan Chemical Substance Inventory; TDG - Transportation of Dangerous Goods; TECI - Thailand Existing Chemicals Inventory; TSCA - Toxic Substances Control Act (United States); UN - United Nations; UNRTDG - United Nations Recommendations on the Transport of Dangerous Goods; vPvB - Very Persistent and Very Bioaccumulative; WHMIS - Workplace Hazardous Materials Information System

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and shall not be considered a warranty or quality specification of any type. The information provided relates only to the specific material identified at the top of this SDS and may not be valid when the SDS material is used in combination with any other materials or in any process, unless specified in the text. Material users should review the information and recommendations in the specific context of their intended manner of handling, use, processing and storage, including an assessment of the appropriateness of the SDS material in the user's end product, if applicable.

AE / EN