Safety Data Sheet
Hempel's Antifouling Globic 9000 78900

HSNO 2017 - New Zealand

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

1.1 Product identifier

Product name :	Hempel's Antifouling Globic 9000 78900
Product identity :	7890019990
Product type :	antifouling paint self polishing

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

Field of application :	ships and shipyards.
Identified uses :	Industrial applications, Professional applications, Used by spraying.

1.3 Details of the supplier of the safety data sheet

Company details :

Hempel (Wattyl) New Zealand Limited
16A Wickham Street
Frankton, Hamilton 3204
New Zealand
Tel.: +(64) 800 928 895
Email: sales.nz@hempel.com

Date of Preparation : 29 October 2026

Date of previous issue 24 June 2026.

1.4 Emergency telephone number

Emergency telephone number (with hours of operation)

Poisons Centre New Zealand: 0800 764 766 (24 hour)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Product definition : Mixture

GHS Classification

FLAMMABLE LIQUIDS - Category 3
ACUTE TOXICITY (oral) - Category 4
ACUTE TOXICITY (inhalation) - Category 4
SKIN IRRITATION - Category 2
SERIOUS EYE DAMAGE - Category 1
RESPIRATORY SENSITIZATION - Category 1
SKIN SENSITIZATION - Category 1
TOXIC TO REPRODUCTION - Category 2
SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 2
SPECIFIC TARGET ORGAN TOXICITY (REPEATED EXPOSURE) - Category 2
AQUATIC HAZARD (ACUTE) - Category 1
AQUATIC HAZARD (LONG-TERM) - Category 1
HAZARDOUS TO TERRESTRIAL VERTEBRATES

2.2 Label elements

Hazard pictograms :



Signal word : Danger

Hazard statements :

H226 - Flammable liquid and vapor.
H302 + H332 - Harmful if swallowed or if inhaled.
H315 - Causes skin irritation.
H317 - May cause an allergic skin reaction.
H318 - Causes serious eye damage.
H334 - May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H361 - Suspected of damaging fertility or the unborn child.
H371 - May cause damage to organs. (oral, inhalation)
H373 - May cause damage to organs through prolonged or repeated exposure. (oral, inhalation)
H410 - Very toxic to aquatic life with long lasting effects.

Precautionary statements :

General : Do not apply directly into or onto water. Take all reasonable steps to ensure that the substance does not cause any significant adverse effects to the environment beyond the application area.

SECTION 2: Hazards identification

Prevention :	Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. Wear protective gloves, protective clothing, eye protection, face protection, or hearing protection. Wear respiratory protection. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Use only outdoors or in a well-ventilated area. Avoid release to the environment. Do not breathe vapor, mist or spray. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace.
Response :	Collect spillage. IF exposed or concerned: Call a POISON CENTER or doctor. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor if you feel unwell. If experiencing respiratory symptoms: Call a POISON CENTER or doctor. IF SWALLOWED: Call a POISON CENTER or doctor if you feel unwell. Rinse mouth. IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water. IF ON SKIN: Wash with plenty of water. If skin irritation or rash occurs: Get medical advice or attention. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor.
Storage :	Store locked up.
Disposal :	Dispose of contents and container in accordance with all local, regional, national and international regulations.

2.3 Other hazards

Other hazards which do not result in classification :	Prolonged or repeated contact may dry skin and cause irritation.

SECTION 3: Composition/information on ingredients

3.2 Mixtures

Product/ingredient name	Identifiers	%
copper (I) oxide	CAS: 1317-39-1	≥30 - ≤60
xylene	CAS: 1330-20-7	≥10 - ≤30
zinc oxide	CAS: 1314-13-2	≥10 - ≤30
bis(1-hydroxy-1H-pyridine-2-thionato-O,S)copper	CAS: 14915-37-8	≤5
ethylbenzene	CAS: 100-41-4	≤5
Kerosine (petroleum), hydrodesulfurized	CAS: 64742-81-0	≤3
cupric oxide	CAS: 1317-38-0	≤3
4-methylpentan-2-one	CAS: 108-10-1	≤3
2,5-di-tert-butylhydroquinone	CAS: 88-58-4	≤1
toluene	CAS: 108-88-3	≤0.3

Occupational exposure limits, if available, are listed in Section 8.

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment and hence require reporting in this section.

SECTION 4: First aid measures

4.1 Description of first aid measures

General :	In all cases of doubt, or when symptoms persist, seek medical attention. Never give anything by mouth to an unconscious person. If breathing is irregular, drowsiness, loss of consciousness or cramps: Call 112 and give immediate treatment (first aid).
Eye contact :	Check for and remove any contact lenses. Immediately flush eyes with plenty of water for at least 15 minutes, occasionally lifting the upper and lower eyelids. Seek immediate medical attention/advice.
Inhalation :	Remove to fresh air and keep at rest in a position comfortable for breathing. Give nothing by mouth. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. If unconscious, place in recovery position and get medical attention immediately.
Skin contact :	Wash skin thoroughly with soap and water or use recognized skin cleanser. Do NOT use solvents or thinners. Remove contaminated clothing and shoes.
Ingestion :	If swallowed, seek medical advice immediately and show this container or label. Keep person warm and at rest. Do not induce vomiting unless directed to do so by medical personnel. Lower the head so that vomit will not re-enter the mouth and throat.
Protection of first-aiders :	No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

SECTION 4: First aid measures

4.2 Most important symptoms and effects, both acute and delayed

Potential acute health effects

Eye contact :	Causes serious eye damage.
Inhalation :	Harmful if inhaled.
Skin contact :	Causes skin irritation.
Ingestion :	No known significant effects or critical hazards.

Over-exposure signs/symptoms

Eye contact :	Adverse symptoms may include the following: pain watering redness
Inhalation :	No specific data.
Skin contact :	Adverse symptoms may include the following: pain or irritation redness blistering may occur
Ingestion :	Adverse symptoms may include the following: stomach pains

4.3 Indication of any immediate medical attention and special treatment needed

Notes to physician :	If gasses have been inhaled, from the decomposition of the product, symptoms may be delayed. Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.
Specific treatments :	No specific treatment.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Extinguishing media :	Recommended: alcohol resistant foam, CO_2, powders, water spray. Not to be used: waterjet.

5.2 Special hazards arising from the substance or mixture

Hazards from the substance or mixture :	Flammable liquid and vapor. Runoff to sewer may create fire or explosion hazard. In a fire or if heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. This material is very toxic to aquatic life with long lasting effects. Fire water contaminated with this material must be contained and prevented from being discharged to any waterway, sewer or drain.
Hazardous combustion products :	Decomposition products may include the following materials: carbon oxides nitrogen oxides sulfur oxides metal oxide/oxides

5.3 Advice for firefighters

Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training. Fire will produce dense black smoke. Exposure to decomposition products may cause a health hazard. Cool closed containers exposed to fire with water. Do not release runoff from fire to drains or watercourses. Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode. Clothing for fire-fighters (including helmets, protective boots and gloves) conforming to European standard EN 469 will provide a basic level of protection for chemical incidents.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Avoid all direct contact with the spilled material. Exclude sources of ignition and be aware of explosion hazard. Ventilate the area. Avoid breathing vapor or mist. Refer to protective measures listed in sections 7 and 8. No action shall be taken involving any personal risk or without suitable training. If the product contaminates lakes, rivers, or sewers, inform the appropriate authorities in accordance with local regulations.

6.2 Environmental precautions

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air). Water polluting material. May be harmful to the environment if released in large quantities.

SECTION 6: Accidental release measures

6.3 Methods and materials for containment and cleaning up

Stop leak if without risk. Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with non-combustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations (see Section 13). Use spark-proof tools and explosion-proof equipment. Contaminated absorbent material may pose the same hazard as the spilled product.

6.4 Reference to other sections

See Section 1 for emergency contact information.
See Section 8 for information on appropriate personal protective equipment.
See Section 13 for additional waste treatment information.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Vapors are heavier than air and may spread along floors. Vapors may form explosive mixtures with air. Prevent the creation of flammable or explosive concentrations of vapors in air and avoid vapor concentrations higher than the occupational exposure limits. In addition, the product should be used only in areas from which all naked lights and other sources of ignition have been excluded. Electrical equipment should be protected to the appropriate standard. To dissipate static electricity during transfer, ground drum and connect to receiving container with bonding strap. No sparking tools should be used.
Avoid inhalation of vapour, dust and spray mist. Avoid contact with skin and eyes. Eating, drinking and smoking should be prohibited in area where this material is handled, stored and processed. Appropriate personal protective equipment: see Section 8. Always keep in containers made from the same material as the original one.

7.2 Conditions for safe storage, including any incompatibilities

Store in accordance with local regulations. Store in a cool, well-ventilated area away from incompatible materials and ignition sources. Keep out of the reach of children. Keep away from: Oxidizing agents, strong alkalis, strong acids. No smoking. Prevent unauthorized access. Containers that are opened must be carefully resealed and kept upright to prevent leakage.

7.3 Specific end use(s)

See separate Product Data Sheet for recommendations or industrial sector specific solutions.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits

Product/ingredient name	Exposure limit values
xylene	**HSWA 2015 - HSW (GRWM) 2016. Workplace exposure standards (WES) (New Zealand, 2/2025) [xylene (o-, m-, p-isomers)]** Ototoxicant. WES-TWA 8 hours: 50 ppm. WES-TWA 8 hours: 217 mg/m³.
ethylbenzene	**HSWA 2015 - HSW (GRWM) 2016. Workplace exposure standards (WES) (New Zealand, 2/2025)** Absorbed through skin , Ototoxicant. WES-TWA 8 hours: 20 ppm. WES-TWA 8 hours: 88 mg/m³. WES-STEL 15 minutes: 176 mg/m³. WES-STEL 15 minutes: 40 ppm.
Kerosine (petroleum), hydrodesulfurized	**ACGIH TLV (United States, 1/2026) [Kerosene]** A3. Absorbed through skin. TWA 8 hours: 200 mg/m³ (as total hydrocarbon vapor).
4-methylpentan-2-one	**HSWA 2015 - HSW (GRWM) 2016. Workplace exposure standards (WES) (New Zealand, 2/2025)** Absorbed through skin. WES-TWA 8 hours: 20 ppm. WES-TWA 8 hours: 82 mg/m³. WES-STEL 15 minutes: 307 mg/m³. WES-STEL 15 minutes: 75 ppm.
toluene	**HSWA 2015 - HSW (GRWM) 2016. Workplace exposure standards (WES) (New Zealand, 2/2025)** Absorbed through skin , Ototoxicant. WES-TWA 8 hours: 20 ppm. WES-TWA 8 hours: 75 mg/m³. WES-STEL 15 minutes: 377 mg/m³. WES-STEL 15 minutes: 100 ppm.

Biological exposure indices

SECTION 8: Exposure controls/personal protection

Product/ingredient name	Exposure limit values
xylene	**HSWA 2015 - HSW (GRWM) 2016. Biological exposure indices (BEI) (New Zealand, 2/2025) [xylene]** BEI: 1.5 g/l, methylhippuric acid [in urine]. Sampling time: end of shift.
ethylbenzene	**HSWA 2015 - HSW (GRWM) 2016. Biological exposure indices (BEI) (New Zealand, 2/2025)** BEI: 0.25 g/g creatinine, sum of mandelic acid and phenylglyoxylic acids [in urine]. Sampling time: end of shift or end of exposure.
4-methylpentan-2-one	**HSWA 2015 - HSW (GRWM) 2016. Biological exposure indices (BEI) (New Zealand, 2/2025)** BEI: 0.7 mg/l, MIBK [in urine]. Sampling time: end of shift.
toluene	**HSWA 2015 - HSW (GRWM) 2016. Biological exposure indices (BEI) (New Zealand, 2/2025)** BEI: 0.3 mg/g creatinine, o-cresol (following hydrolysis) [in urine]. Sampling time: end of shift or end of exposure. BEI: 0.03 mg/l, toluene [in urine]. Sampling time: end of shift or end of exposure.

Recommended monitoring procedures

Reference should be made to appropriate monitoring standards. Reference to national guidance documents for methods for the determination of hazardous substances will also be required.

8.2 Exposure controls

Appropriate engineering controls

Arrange sufficient ventilation by local exhaust ventilation and good general ventilation to keep the airborne concentrations of vapors or dust lowest possible and below their respective threshold limit value. Ensure that eyewash stations and safety showers are proximal to the work-station location.

Individual protection measures

General :

Gloves must be worn for all work that may result in soiling. Apron/coveralls/protective clothing must be worn when soiling is so great that regular work clothes do not adequately protect skin against contact with the product. Safety eyewear should be used when there is a likelihood of exposure.



Hygiene measures :

Wash hands, forearms, and face thoroughly after handling compounds and before eating, smoking, using lavatory, and at the end of day.

Eye/face protection :

Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles and/or face shield. If inhalation hazards exist, a full-face respirator may be required instead.

Hand protection :

Wear chemically resistant gloves (tested to EN374) in combination with 'basic' employee training. The quality of the chemical-resistant protective gloves must be chosen as a function of the specific workplace concentrations and quantity of hazardous substances.

Since the actual work situation is unknown. Supplier of gloves should be contacted in order to find the appropriate type. Below listed glove(s) should be regarded as generic advice:

Recommended: Silver Shield / Barrier / 4H gloves, polyvinyl alcohol (PVA), Viton®
May be used: nitrile rubber (>0.3 mm)
Short term exposure: neoprene rubber (>0.1 mm), butyl rubber (>0.5 mm), natural rubber (latex) (>0.4 mm), polyvinyl chloride (PVC), nitrile rubber (>0.1 mm), butyl rubber (>0.3 mm)

Body protection :

Personal protective equipment for the body should be selected based on the task being performed and the risks involved handling this product.
Wear suitable protective clothing. Always wear protective clothing when spraying.
Chemical-resistant apron.

Respiratory protection :

When the product is applied by spraying and for continuous or prolonged work always wear an air-fed respirator e.g. hood with supply of fresh or compressed air or a full face, powered air purifying filter. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the selected respirator. If working areas have insufficient ventilation: When the product is applied by means that will not generate an aerosol such as, brush or roller wear half or totally covering mask equipped with gas filter of type A, when grinding use particle filter of type P. (EN140) Be sure to use an approved/certified respirator or equivalent.

SECTION 8: Exposure controls/personal protection

Environmental exposure controls

Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state :	Liquid.
Color :	Black
Odor :	Solvent-like
pH :	Testing not relevant or not possible due to nature of the product.
Melting point/freezing point :	Testing not relevant or not possible due to nature of the product.
Boiling point/boiling range :	Testing not relevant or not possible due to nature of the product.
Flash point :	Closed cup: 23°C (73.4°F)
Evaporation rate :	Testing not relevant or not possible due to nature of the product.
Flammability :	Highly flammable in the presence of the following materials or conditions: open flames, sparks and static discharge and heat. Flammable in the presence of the following materials or conditions: oxidizing materials. Slightly flammable in the presence of the following materials or conditions: reducing materials.
Lower and upper explosive (flammable) limits :	Lower: 0.6% Upper: 7.5%
Vapor pressure :	Not applicable. [50°C (122°F)]
Vapor density :	Not available.
Specific gravity :	1.82 g/cm³
Partition coefficient (LogKow) :	Testing not relevant or not possible due to nature of the product.

Auto-ignition temperature :

Ingredient name	°C	°F	Method
xylene	432	809.6	

Decomposition temperature :	Testing not relevant or not possible due to nature of the product.
Viscosity :	Aspiration hazard (H304) Not classified. Testing not relevant due to nature of the product.
Explosive properties :	Slightly explosive in the presence of the following materials or conditions: open flames, sparks and static discharge and heat.
Oxidizing properties :	Testing not relevant or not possible due to nature of the product.

9.2 Other information

Solvent(s) % by weight :	Weighted average: 21 %
Water % by weight :	Weighted average: 0 %
VOC content :	378.7 g/l
TOC Content :	Weighted average: 338 g/l
Solvent Gas :	Weighted average: 0.084 m³/l

SECTION 10: Stability and reactivity

10.1 Reactivity

No specific test data related to reactivity available for this product or its ingredients.

10.2 Chemical stability

The product is stable.

10.3 Possibility of hazardous reactions

Under normal conditions of storage and use, hazardous reactions will not occur.

10.4 Conditions to avoid

Avoid all possible sources of ignition (spark or flame). Do not pressurize, cut, weld, braze, solder, drill, grind or expose containers to heat or sources of ignition.

SECTION 10: Stability and reactivity

10.5 Incompatible materials

Highly reactive or incompatible with the following materials: oxidizing materials and reducing materials.

10.6 Hazardous decomposition products

When exposed to high temperatures (i.e. in case of fire) harmful decomposition products may be formed:

Decomposition products may include the following materials: carbon oxides nitrogen oxides sulfur oxides metal oxide/oxides

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Exposure to component solvent vapor concentrations may result in adverse health effects such as mucous membrane and respiratory system irritation and adverse effects on the kidneys, liver and central nervous system. Solvents may cause some of the above effects by absorption through the skin. Symptoms and signs include headaches, dizziness, fatigue, muscular weakness, drowsiness and, in extreme cases, loss of consciousness. Repeated or prolonged contact with the preparation may cause removal of natural fat from the skin, resulting in non-allergic contact dermatitis and absorption through the skin. If splashed in the eyes, the liquid may cause irritation and reversible damage. Accidental swallowing may cause stomach pain. Chemical lung inflammation may occur if the product is taken into the lungs via vomiting.
Direct contact with the eyes can cause irreversible damage, including blindness.

Acute toxicity

Product/ingredient name	Result	Dose / Exposure	Effects
7890019990	Rat - Dermal - LD50	>2000 mg/kg	
	Rat - Oral - LD50	>2000 mg/kg	
copper (I) oxide	Rat - Dermal - LD50	>2000 mg/kg	
	Rat - Oral - LD50	1340 mg/kg	
	Rat - Inhalation - LC50 Dusts and mists	3.34 mg/l [4 hours]	
xylene	Rabbit - Dermal - LD50	>4200 mg/kg	
	Rat - Oral - LD50	3523 mg/kg	
	Rat - Inhalation - LC50 Vapor	6350 ppm [4 hours]	
	Rat - Inhalation - LC50 Gas.	5000 ppm [4 hours]	
zinc oxide	Rat - Oral - LD50	>5000 mg/kg	
	Rat - Dermal - LD50	>2000 mg/kg	
	Rat - Inhalation - LC50 Dusts and mists	>5.7 mg/l [4 hours]	
bis(1-hydroxy-1H-pyridine-2-thionato-O,S)copper	Rabbit - Dermal - LD50	>2000 mg/kg	
	Rat - Oral - LD50	500 mg/kg	
	Rat - Inhalation - LC50 Dusts and mists	0.1 mg/l [4 hours]	
ethylbenzene	Rat - Oral - LD50	3500 mg/kg	Liver - Other changes Kidney, Ureter, and Bladder - Other changes
	Rabbit - Dermal - LD50	>5000 mg/kg	
Kerosine (petroleum), hydrodesulfurized	Rat - Oral - LD50	>5000 mg/kg	
4-methylpentan-2-one	Rabbit - Dermal - LD	>3 g/kg	
	Rat - Inhalation - LC50 Vapor	16.4 mg/l [4 hours]	
2,5-di-tert-butylhydroquinone	Rat - Dermal - LD50	>4000 mg/kg	
	Rat - Oral - LD50	50 - 300 mg/kg	
toluene	Rat - Oral - LD50	636 mg/kg	
	Rat - Inhalation - LC50 Vapor	>20 mg/l [4 hours]	

Acute toxicity estimates

Route	ATE value
Oral	500 mg/kg
Inhalation (vapors)	11 mg/l

Irritation/Corrosion

SECTION 11: Toxicological information

Product/ingredient name	Result	Species	Exposure
copper (I) oxide	Rabbit - Eyes - Irritant		
xylene	Rabbit - Eyes - Severe irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 5 milligrams Duration of treatment/exposure: 24 hours
	Rabbit - Skin - Moderate irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 500 milligrams Duration of treatment/exposure: 24 hours
	Rabbit - Skin - Irritant		
zinc oxide	Rabbit - Eyes - Mild irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 500 milligrams Duration of treatment/exposure: 24 hours
	Rabbit - Skin - Mild irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 500 milligrams Duration of treatment/exposure: 24 hours
bis(1-hydroxy-1H-pyridine-2-thionato-O,S)copper	Rabbit - Eyes - Severe irritant		
ethylbenzene	Rabbit - Skin - Mild irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 15 milligrams Duration of treatment/exposure: 24 hours
	Rabbit - Respiratory - Mild irritant		
	Rabbit - Eyes - Mild irritant		
Kerosine (petroleum), hydrodesulfurized	Rabbit - Skin - Moderate irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 500 milligrams Duration of treatment/exposure: 24 hours
4-methylpentan-2-one	Rabbit - Eyes - Moderate irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 100 microliters Duration of treatment/exposure: 24 hours
	Rabbit - Skin - Mild irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 500 milligrams Duration of treatment/exposure: 24 hours
toluene	Rabbit - Eyes - Mild irritant	Duration of treatment/ exposure: 0.5 minutes	Amount/concentration applied: 100 mg Duration of treatment/exposure: 0.5 minutes
	Rabbit - Skin - Moderate irritant	Duration of treatment/ exposure: 24 hours	Amount/concentration applied: 20 mg Duration of treatment/exposure: 24 hours

Sensitizer

Product/ingredient name	Species - Route of exposure	Result
2,5-di-tert-butylhydroquinone	Mouse - skin	Sensitizing

Mutagenic effects

No known data available in our database.

Carcinogenicity

No known data available in our database.

Reproductive toxicity

No known data available in our database.

Specific target organ toxicity (single exposure)

Product/ingredient name	Category	Route of exposure	Target organs
7890019990	Category 2	oral, inhalation	
copper (I) oxide	Category 3	Copper (I) oxide	Respiratory tract irritation
Kerosine (petroleum), hydrodesulfurized	Category 3		Respiratory tract irritation
	Category 3		Narcotic effects
2,5-di-tert-butylhydroquinone	Category 3		Respiratory tract irritation

SECTION 11: Toxicological information

Specific target organ toxicity (repeated exposure)

Product/ingredient name	Category	Route of exposure	Target organs
7890019990	Category 2	oral, inhalation	-
copper (I) oxide	Category 2	-	-
xylene	Category 2	-	-
ethylbenzene	Category 2	-	-
Kerosine (petroleum), hydrodesulfurized	Category 2	-	-
cupric oxide	Category 2	-	-
2,5-di-tert-butylhydroquinone	Category 2	-	-
toluene	Category 2	-	-

Aspiration hazard

Product/ingredient name	Result
Kerosine (petroleum), hydrodesulfurized	ASPIRATION HAZARD - Category 1

Information on the likely routes of exposure

Routes of entry anticipated: Oral, Dermal, Inhalation.

Potential chronic health effects

No known significant effects or critical hazards.

Other information : No additional known significant effects or critical hazards.

SECTION 12: Ecological information

12.1 Toxicity

Do not allow to enter drains or watercourses. Very toxic to aquatic life with long lasting effects.

Product/ingredient name	Result	Species	Exposure
copper (I) oxide	Acute - EC50	Algae	65 mg/l [96 hours]
	Acute - LC50	Fish - *Pimephales promelas*	0.0081 mg/l [96 hours]
	Acute - EC50	Daphnia - Daphnia - *Daphnia Magna*	0.51 mg/l [48 hours]
zinc oxide	Acute - LC50 - Fresh water	Daphnia - Water flea - *Daphnia magna* - Neonate	24600 µg/l [48 hours]
	Acute - EC50	Algae - Green algae - *Pseudokirchneriella subcapitata* - Exponential growth phase	0.17 mg/l [72 hours]
	Acute - EC50	Daphnia - Green algae - *Pseudokirchneriella subcapitata* - Exponential growth phase	1 mg/l [48 hours]
	EC50	Daphnia	0.413 mg/l [48 hours]
	LC50	Fish	0.1169 mg/l [96 hours]
	Chronic - EC50	Algae	0.136 mg/l [72 hours]
bis(1-hydroxy-1H-pyridine-2-thionato-O,S)copper	Acute - LC50	Fish	0.0043 mg/l [96 hours]
	Acute - EC50	Daphnia	0.022 mg/l [48 hours]
ethylbenzene	Chronic - NOEC - Fresh water	Algae - Green algae - *Pseudokirchneriella subcapitata*	<1000 µg/l [96 hours]
4-methylpentan-2-one	Chronic - NOEC - Fresh water	Daphnia - Water flea - *Daphnia magna*	7800 - 39000 µg/l [21 days]
	Chronic - NOEC - Fresh water	Fish - Fathead minnow - *Pimephales promelas* - Embryo	168 mg/l [33 days]
2,5-di-tert-butylhydroquinone	Acute - EC50	Daphnia	0.4 mg/l [48 hours]
	Acute - EC50	Algae	0.038 mg/l [72 hours]
toluene	Chronic - NOEC - Fresh water	Daphnia - Water flea - *Daphnia magna*	1000 µg/l [21 days]
	Chronic - NOEC - Fresh water	Algae - Green algae - *Pseudokirchneriella subcapitata*	<500000 µg/l [96 hours]

12.2 Persistence and degradability

Product/ingredient name	Test	Result
xylene	OECD Ready Biodegradability - Manometric Respirometry Test	>60% [28 days] - Readily
		90 - 98% [28 days] - Readily
ethylbenzene		>70% [28 days] - Readily
4-methylpentan-2-one		84% [14 days]
toluene		100% [14 days] - Readily

SECTION 12: Ecological information

Product/ingredient name	Aquatic half-life	Photolysis	
xylene			Readily
zinc oxide			Not readily
ethylbenzene			Readily
4-methylpentan-2-one			Readily
toluene			Readily

12.3 Bioaccumulative potential

Product/ingredient name	$LogP_{ow}$	BCF	Potential
xylene	3.12	8.1 - 25.9	Low
zinc oxide	2.2	60960	High
bis(1-hydroxy-1H-pyridine-2-thionato-O,S)copper	-	50	Low
ethylbenzene	3.6	-	Low
4-methylpentan-2-one	1.9	2	Low
2,5-di-tert-butylhydroquinone	4.85	440	Low
toluene	2.73	90	Low

12.4 Mobility in soil

Product/ingredient name	logKoc	Koc
xylene	1.6 - 2.6	39 - 365
ethylbenzene	2.2	170.406
4-methylpentan-2-one	1.6	40.9047
2,5-di-tert-butylhydroquinone	3.7	5563.03
toluene	2.1	117.115

Mobility : No known data available in our database.

Other adverse effects

No known significant effects or critical hazards.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

The generation of waste should be avoided or minimized wherever possible. Residues of the product is listed as hazardous waste. Dispose of according to all state and local applicable regulations. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Spillage, remains, discarded clothes and similar should be discarded in a fireproof container.

Packaging

The generation of waste should be avoided or minimized wherever possible. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible.

SECTION 14: Transport information

Transport may take place according to national regulation NZS for transport by road and train, IMDG for transport by sea, IATA for transport by air.

	14.1 UN no.	14.2 Proper shipping name	14.3 Transport hazard class(es)	14.4 PG*	14.5 Env*	Additional information
NZS Class	UN2929	TOXIC LIQUID FLAMMABLE, ORGANIC, N.O.S. (xylene, copper (I) oxide)	6.1 3 	II	Yes.	**Hazchem code** 3WE
IMDG Class	UN2929	TOXIC LIQUID FLAMMABLE, ORGANIC, N.O.S. (xylene, copper (I) oxide). (copper (I) oxide)	6.1 3 	II	Yes.	The marine pollutant mark is not required when transported in sizes of ≤5 L or ≤5 kg. **Emergency schedules** F-E, S-D
IATA Class	UN2929	TOXIC LIQUID FLAMMABLE, ORGANIC, N.O.S. (xylene, copper (I) oxide)	6.1 3 	II	Yes.	The environmentally hazardous substance mark may appear if required by other transportation regulations.

SECTION 14: Transport information

PG* : Packing group
Env.* : Environmental hazards

14.6 Special precautions for user

Transport within user's premises: always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

14.7 Transport in bulk according to IMO instruments

Not applicable.

SECTION 15: Regulatory information

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

This material is classified as hazardous according to criteria in the Hazardous Substances (Hazard Classification) Notice 2020.

This material is classified as DANGEROUS GOODS according to criteria in New Zealand Standard 5433:2012 Transport of Dangerous Goods on Land.

HSNO Classification

FLAMMABLE LIQUIDS - Category 3
ACUTE TOXICITY (oral) - Category 4
ACUTE TOXICITY (inhalation) - Category 4
SKIN IRRITATION - Category 2
SERIOUS EYE DAMAGE - Category 1
RESPIRATORY SENSITIZATION - Category 1
SKIN SENSITIZATION - Category 1
TOXIC TO REPRODUCTION - Category 2
SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 2
SPECIFIC TARGET ORGAN TOXICITY (REPEATED EXPOSURE) - Category 2
AQUATIC HAZARD (ACUTE) - Category 1
AQUATIC HAZARD (LONG-TERM) - Category 1
HAZARDOUS TO TERRESTRIAL VERTEBRATES

Safety, health and environmental regulations specific for the product :

HSNO Approval Number : HSR101063

International regulations

IMO Anti-fouling System Convention Compliant (AFS/CONF/26)

This product does not contain organotin compounds acting as biocides and complies with the International Convention on the Control of Harmful Anti-fouling Systems on Ships as adopted by IMO October 2001 (IMO document AFS/CONF/26)

Product type : antifouling paint self polishing

Manufacturer : Hempel A/S

Product name and/or code : Hempel's Antifouling Globic 9000 78900

7890019990

Colour : Black

Note: This name is shown on the product container. All products in HEMPEL's containers carrying this name comply with the IMO Convention (AFS/CONF/26).

Active ingredient(s) : copper (I) oxide 1317-39-1
bis(1-hydroxy-1H-pyridine-2-thionato-O,S)copper 14915-37-8

SECTION 16: Other information

Indicates information that has changed from previously issued version.

Classification	Justification
FLAMMABLE LIQUIDS - Category 3	Expert judgment
ACUTE TOXICITY (oral) - Category 4	Expert judgment
ACUTE TOXICITY (inhalation) - Category 4	Expert judgment
SKIN IRRITATION - Category 2	Expert judgment
SERIOUS EYE DAMAGE - Category 1	Expert judgment
RESPIRATORY SENSITIZATION - Category 1	Expert judgment
SKIN SENSITIZATION - Category 1	Expert judgment
TOXIC TO REPRODUCTION - Category 2	Expert judgment
SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) - Category 2	Expert judgment
SPECIFIC TARGET ORGAN TOXICITY (REPEATED EXPOSURE) - Category 2	Expert judgment
AQUATIC HAZARD (ACUTE) - Category 1	Expert judgment
AQUATIC HAZARD (LONG-TERM) - Category 1	Expert judgment

SECTION 16: Other information

HAZARDOUS TO TERRESTRIAL VERTEBRATES	Expert judgment

Notice to reader

To the best of our knowledge, the information contained herein is accurate. However, neither the above-named supplier, nor any of its subsidiaries, assumes any liability whatsoever for the accuracy or completeness of the information contained herein.
Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist.