

## Safety Data Sheet

Conforms to – Regulation (EC) No. 1907/2006 (REACH), Article 31, Annex II, as amended by UK SI 2021/904

### NANODEFENSE ECO

Date of first edition: 1/5/2026

Safety Data Sheet dated 05/01/2026 version 1

# kerakoll

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

### 1.1. Product identifier

Mixture identification:

Trade name: NANODEFENSE ECO

Trade code: S100B0191

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

Recommended use: Waterproofing product

Uses advised against: All uses other than recommended ones

### 1.3. Details of the supplier of the safety data sheet

Kerakoll UK Ltd

Tomlinson Road, Leyland, Lancashire, PR25 2DY,

United Kingdom

Tel. 01772 456831

safety@kerakoll.co.uk

### 1.4. Emergency telephone number

UK National Poisons Information Service.

E-mail: npis.birmingham@nhs.net; Tel: +44 (0)344 892 0111

## SECTION 2: Hazards identification

### 2.1. Classification of the substance or mixture

#### GB CLP regulation:

No specific hazards are encountered under normal product use.

Adverse physicochemical, human health and environmental effects:

No other hazards

### 2.2. Label elements

#### Special Provisions:

EUH210 Safety data sheet available on request.

#### Contains

1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one May produce an allergic reaction.

reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1) May produce an allergic reaction.

#### Special provisions according to Annex XVII of UK REACH:

None.

### 2.3. Other hazards

When mixtures containing cement react with water, for instance when making concrete or mortar, or when the cement becomes wet, a strong alkaline solution is produced (high pH caused by the formation of calcium, sodium and potassium hydroxides).

Cement and mixtures containing cement may irritate the eyes, the mucous system, the throat and the respiratory system and cause coughing. Frequent inhalation of cement dust or mixtures containing cement over a long period of time increases the risk of developing lung diseases.

In case of prolonged contact with the skin, both cement and mixtures containing cement, including pastes, may cause skin sensitisation due to the presence of trace amounts of chromium VI salts. Where necessary, such an effect can be minimized by incorporating a special reducing agent to maintain the water-soluble chromium VI content to concentration rates below 0.0002% (2 ppm) on the total dry weight of cement.

No PBT or vPvB substances present in concentration  $\geq 0.1\%$

Other Hazards: No other hazards

## SECTION 3: Composition/information on ingredients

### 3.1. Substances

N.A.

### 3.2. Mixtures

Mixture identification: NANODEFENSE ECO

#### Hazardous components within the meaning of GB CLP regulation and related classification:

| Qty       | Name                                                                                          | Ident. Numb.                                         | Classification                                                                                                                                                                                             | Registration Number |
|-----------|-----------------------------------------------------------------------------------------------|------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------|
| ≥1-<3 %   | Titanium dioxide                                                                              | CAS:13463-67-7<br>EC:236-675-5<br>Index:022-006-00-2 | Carc. 2, H351                                                                                                                                                                                              |                     |
| <0.01 %   | 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one                                      | CAS:2634-33-5<br>EC:220-120-9<br>Index:613-088-00-6  | Skin Irrit. 2, H315; Eye Dam. 1, H318; Aquatic Acute 1, H400; Acute Tox. 4, H302; Skin Sens. 1, H317; Aquatic Chronic 2, H411, M-Acute:1                                                                   |                     |
| <0.0015 % | reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1) | CAS:55965-84-9<br>Index:613-167-00-5                 | Acute Tox. 2, H330; Acute Tox. 2, H310; Acute Tox. 3, H301; Skin Corr. 1C, H314; Eye Dam. 1, H318; Skin Sens. 1A, H317; Aquatic Acute 1, H400; Aquatic Chronic 1, H410, M-Chronic:100, M-Acute:100, EUH071 |                     |

## SECTION 4: First aid measures

### 4.1. Description of first aid measures

In case of skin contact:

Wash with plenty of water and soap.

In case of eyes contact:

Wash immediately with water.

In case of Ingestion:

Do not induce vomiting, get medical attention showing the SDS and label hazardous.

In case of Inhalation:

Remove casualty to fresh air and keep warm and at rest.

### 4.2. Most important symptoms and effects, both acute and delayed

N.A.

### 4.3. Indication of any immediate medical attention and special treatment needed

N.A.

## SECTION 5: Firefighting measures

### 5.1. Extinguishing media

Suitable extinguishing media:

Water.

Carbon dioxide (CO2).

Extinguishing media which must not be used for safety reasons:

None in particular.

### 5.2. Special hazards arising from the substance or mixture

Do not inhale explosion and combustion gases.

Burning produces heavy smoke.

### 5.3. Advice for firefighters

Use suitable breathing apparatus .

Collect contaminated fire extinguishing water separately. This must not be discharged into drains.

Move undamaged containers from immediate hazard area if it can be done safely.

## SECTION 6: Accidental release measures

### 6.1. Personal precautions, protective equipment and emergency procedures

#### For non emergency personnel:

Wear personal protection equipment.

Remove persons to safety.

See protective measures under point 7 and 8.

#### For emergency responders:

Wear personal protection equipment.

### 6.2. Environmental precautions

Do not allow to enter into soil/subsoil. Do not allow to enter into surface water or drains.  
Retain contaminated washing water and dispose it.  
In case of gas escape or of entry into waterways, soil or drains, inform the responsible authorities.  
Suitable material for taking up: absorbing material, organic, sand

### 6.3. Methods and material for containment and cleaning up

Suitable material for taking up: absorbing material, organic, sand  
Wash with plenty of water.

### 6.4. Reference to other sections

See also section 8 and 13

---

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

Avoid contact with skin and eyes, inhalation of vapours and mists.  
Don't use empty container before they have been cleaned.  
Before making transfer operations, assure that there aren't any incompatible material residuals in the containers.  
See also section 8 for recommended protective equipment.

### Advice on general occupational hygiene:

Contaminated clothing should be changed before entering eating areas.  
Do not eat or drink while working.

### 7.2. Conditions for safe storage, including any incompatibilities

The product must be stored in waterproof, dry, clean conditions and protected from contamination. Do not use aluminium containers due to incompatibility of the materials.

The product contains cement with an addition of a Chromium reducing agent (VI) and its effectiveness decreases with time. Consequently, packaging's of the material indicate information about the production date, storing conditions and the appropriate storage period for the maintaining of the activity of the reducing agent and for maintaining the soluble Chromium (VI) amount under 2ppm over the total dry weight referred to cement (BS EN 196-10).

Incompatible materials:

None in particular.

Instructions as regards storage premises:

Adequately ventilated premises.

### 7.3. Specific end use(s)

Recommendation(s)

None in particular

Industrial sector specific solutions:

None in particular

---

## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

#### Community Occupational Exposure Limits (OEL)

|                                     | OEL Type | Country                                              | Occupational Exposure Limit                                                                          |
|-------------------------------------|----------|------------------------------------------------------|------------------------------------------------------------------------------------------------------|
| Titanium dioxide<br>CAS: 13463-67-7 | ACGIH    |                                                      | Long Term: 2.5 mg/m <sup>3</sup> (8h)<br>Finescale particles; R ; A3 - LRT irr, pneumoconiosis       |
|                                     | WEL-EH40 | UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND | Long Term: 10 mg/m <sup>3</sup><br>Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020) |
| Aluminium oxide<br>CAS: 1344-28-1   | WEL-EH40 | UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND | Long Term: 10 mg/m <sup>3</sup><br>Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020) |
|                                     | WEL-EH40 | UNITED KINGDOM OF GREAT BRITAIN AND NORTHERN IRELAND | Long Term: 4 mg/m <sup>3</sup><br>Source: EH40/2005 Workplace exposure limits (Fourth Edition 2020)  |
| Kaolin<br>CAS: 1332-58-7            | ACGIH    |                                                      | Long Term: 2 mg/m <sup>3</sup> (8h)<br>E,R, A4 - Pneumoconiosis                                      |

### Predicted No Effect Concentration (PNEC) values

|                                                                                                                  |                                                                             |
|------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------|
| Titanium dioxide<br>CAS: 13463-67-7                                                                              | Exposure Route: Fresh Water; PNEC Limit: 0.184 mg/l                         |
|                                                                                                                  | Exposure Route: Marine water; PNEC Limit: 0.018 mg/l                        |
|                                                                                                                  | Exposure Route: Intermittent releases (fresh water); PNEC Limit: 1 mg/kg    |
|                                                                                                                  | Exposure Route: Intermittent releases (marine water); PNEC Limit: 100 mg/kg |
|                                                                                                                  | Exposure Route: Microorganisms in sewage treatments; PNEC Limit: 100 mg/kg  |
| 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one<br>CAS: 2634-33-5                                       | Exposure Route: Fresh Water; PNEC Limit: 4.03 µg/l                          |
|                                                                                                                  | Exposure Route: Intermittent releases (fresh water); PNEC Limit: 1.1 µg/l   |
|                                                                                                                  | Exposure Route: Marine water; PNEC Limit: 403 ng/L                          |
|                                                                                                                  | Exposure Route: Intermittent releases (marine water); PNEC Limit: 110 ng/L  |
|                                                                                                                  | Exposure Route: Microorganisms in sewage treatments; PNEC Limit: 1.03 mg/l  |
|                                                                                                                  | Exposure Route: Freshwater sediments; PNEC Limit: 49.9 µg/kg                |
|                                                                                                                  | Exposure Route: Marine water sediments; PNEC Limit: 4.99 µg/kg              |
|                                                                                                                  | Exposure Route: Soil; PNEC Limit: 3 mg/kg                                   |
| reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1)<br>CAS: 55965-84-9 | Exposure Route: Fresh Water; PNEC Limit: 3.39 µg/l                          |
|                                                                                                                  | Exposure Route: Intermittent releases (fresh water); PNEC Limit: 3.39 µg/l  |
|                                                                                                                  | Exposure Route: Marine water; PNEC Limit: 3.39 µg/l                         |
|                                                                                                                  | Exposure Route: Intermittent releases (marine water); PNEC Limit: 3.39 µg/l |
|                                                                                                                  | Exposure Route: Microorganisms in sewage treatments; PNEC Limit: 230 µg/l   |
|                                                                                                                  | Exposure Route: Freshwater sediments; PNEC Limit: 27 µg/l                   |
|                                                                                                                  | Exposure Route: Marine water sediments; PNEC Limit: 27 µg/l                 |
|                                                                                                                  | Exposure Route: Soil; PNEC Limit: 10 µg/l                                   |

### Derived No Effect Level (DNEL) values

|                                                                                                                  |                                                                                                                                                                    |
|------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Titanium dioxide<br>CAS: 13463-67-7                                                                              | Exposure Route: Human Inhalation; Exposure Frequency: Long Term, local effects<br>Worker Professional: 10 mg/m <sup>3</sup>                                        |
| 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one<br>CAS: 2634-33-5                                       | Exposure Route: Human Inhalation; Exposure Frequency: Long Term, systemic effects<br>Worker Professional: 6.81 mg/m <sup>3</sup> ; Consumer: 1.2 mg/m <sup>3</sup> |
|                                                                                                                  | Exposure Route: Human Dermal; Exposure Frequency: Long Term, systemic effects<br>Worker Professional: 966 µg/kg; Consumer: 345 µg/kg                               |
| reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1)<br>CAS: 55965-84-9 | Exposure Route: Human Inhalation; Exposure Frequency: Long Term, local effects<br>Worker Professional: 20 µg/m <sup>3</sup> ; Consumer: 20 µg/m <sup>3</sup>       |
|                                                                                                                  | Exposure Route: Human Inhalation; Exposure Frequency: Short Term, local effects<br>Worker Professional: 40 µg/m <sup>3</sup> ; Consumer: 20 µg/m <sup>3</sup>      |
|                                                                                                                  | Exposure Route: Human Oral; Exposure Frequency: Long Term, systemic effects<br>Consumer: 90 µg/kg                                                                  |
|                                                                                                                  | Exposure Route: Human Oral; Exposure Frequency: Short Term, systemic effects<br>Consumer: 110 µg/kg                                                                |

## 8.2. Exposure controls

Eye protection:

Eye glasses with side protection.(EN166)

Protection for skin:

No special precaution must be adopted for normal use.

Protection for hands:

Nitrile rubber .

Respiratory protection:

N.A.

Thermal Hazards:

Not expected if used as intended

Environmental exposure controls:

Prevent the product from entering sewers or surface and underground water.

Hygienic and Technical measures

N.A.

---

## SECTION 9: Physical and chemical properties

### 9.1. Information on basic physical and chemical properties

Physical State: Liquid

Appearance and colour: Pasta Light blue

Odour: Characteristic

Odour threshold: N.A.

pH: N.A.

Melting point / freezing point: N.A.

Initial boiling point and boiling range: 100 °C (212 °F)

Flash point: Not Applicable

Evaporation rate: N.A.

Upper/lower flammability or explosive limits: N.A.

Vapour density: N.A.

Vapour pressure: N.A.

Relative density: 1.48 g/cm<sup>3</sup>

Solubility in water: N.A.

Solubility in oil: N.A.

Partition coefficient (n-octanol/water): N.A.

Auto-ignition temperature: N.A.

Decomposition temperature: N.A.

Viscosity: 74,000.00 cPo

Explosive properties: N.A.

Oxidizing properties: N.A.

Solid/gas flammability: N.A.

Volatile Organic compounds - VOCs = 0.07 % ; 1.04 g/l

### 9.2. Other information

Substance Groups relevant properties N.A.

Miscibility: N.A.

Conductivity: N.A.

---

## SECTION 10: Stability and reactivity

### 10.1. Reactivity

Stable under normal conditions

### 10.2. Chemical stability

Data not available.

### 10.3. Possibility of hazardous reactions

None.

### 10.4. Conditions to avoid

Stable under normal conditions.

### 10.5. Incompatible materials

None in particular.

### 10.6. Hazardous decomposition products

None.

---

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

## Toxicological Information of the Preparation

|                                      |                                                                                    |
|--------------------------------------|------------------------------------------------------------------------------------|
| a) acute toxicity                    | Not classified<br>Based on available data, the classification criteria are not met |
| b) skin corrosion/irritation         | Not classified<br>Based on available data, the classification criteria are not met |
| c) serious eye damage/irritation     | Not classified<br>Based on available data, the classification criteria are not met |
| d) respiratory or skin sensitisation | Not classified<br>Based on available data, the classification criteria are not met |
| e) germ cell mutagenicity            | Not classified<br>Based on available data, the classification criteria are not met |
| f) carcinogenicity                   | Not classified<br>Based on available data, the classification criteria are not met |
| g) reproductive toxicity             | Not classified<br>Based on available data, the classification criteria are not met |
| h) STOT-single exposure              | Not classified<br>Based on available data, the classification criteria are not met |
| i) STOT-repeated exposure            | Not classified<br>Based on available data, the classification criteria are not met |
| j) aspiration hazard                 | Not classified<br>Based on available data, the classification criteria are not met |

## Toxicological information on main components of the mixture:

|                                                                                               |                                      |                                                                                                    |                     |
|-----------------------------------------------------------------------------------------------|--------------------------------------|----------------------------------------------------------------------------------------------------|---------------------|
| Titanium dioxide                                                                              | a) acute toxicity                    | LD50 Oral Rat > 5000 mg/kg<br>LC50 Inhalation > 6.82 mg/l<br>LD50 Skin Rat > 2000 mg/kg            |                     |
|                                                                                               | c) serious eye damage/irritation     | Eye Corrosive Negative<br><br>Eye Irritant No                                                      |                     |
|                                                                                               | d) respiratory or skin sensitisation | Skin Sensitization Negative                                                                        |                     |
|                                                                                               | i) STOT-repeated exposure            | No Observed Adverse Effect Level 1000                                                              |                     |
|                                                                                               |                                      |                                                                                                    |                     |
| 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one                                      | a) acute toxicity                    | LD50 Oral Rat = 670 mg/kg<br><br>LD50 Skin Rat > 2000 mg/kg                                        |                     |
|                                                                                               | b) skin corrosion/irritation         | Skin Irritant Rabbit Negative                                                                      |                     |
|                                                                                               | c) serious eye damage/irritation     | Eye Corrosive Positive                                                                             | irreversible damage |
|                                                                                               | d) respiratory or skin sensitisation | Skin Sensitization Guineapig Positive                                                              |                     |
|                                                                                               | f) carcinogenicity                   | Genotoxicity Rat Negative                                                                          | Oral route          |
|                                                                                               | g) reproductive toxicity             | No Observed Adverse Effect Level Oral Rat = 112 mg/kg                                              |                     |
| reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1) | a) acute toxicity                    | LD50 Oral Rat = 69 mg/kg<br><br>LD50 Skin Rabbit = 141 mg/kg<br>LC50 Inhalation Rat = 0.33 mg/l 4h |                     |
|                                                                                               | b) skin corrosion/irritation         | Skin Irritant Rabbit Positive                                                                      |                     |
|                                                                                               | c) serious eye                       | Eye Corrosive Rabbit Positive                                                                      |                     |
|                                                                                               |                                      |                                                                                                    |                     |
|                                                                                               |                                      |                                                                                                    |                     |

|                                      |                                                        |
|--------------------------------------|--------------------------------------------------------|
| damage/irritation                    |                                                        |
| d) respiratory or skin sensitisation | Skin Sensitization Positive                            |
| f) carcinogenicity                   | Genotoxicity Negative<br>Carcinogenicity Skin Negative |
| g) reproductive toxicity             | No Observed Adverse Effect Level Oral Rat = 22.7 mg/kg |

## SECTION 12: Ecological information

### 12.1. Toxicity

Adopt good working practices, so that the product is not released into the environment.

Eco-Toxicological Information:

#### List of Eco-Toxicological properties of the product

Not classified for environmental hazards.

No data available for the product

#### List of Eco-Toxicological properties of the components

| Component                                                                                     | Ident. Numb.                                              | Ecotox Data                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|-----------------------------------------------------------------------------------------------|-----------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Titanium dioxide                                                                              | CAS: 13463-67-7 - EINECS: 236-675-5 - INDEX: 022-006-00-2 | <p>a) Aquatic acute toxicity : LC50 Fish Pimephales promelas (Cavedano americano) &gt; 1000 mg/L 96h</p> <p>a) Aquatic acute toxicity : EC50 Algae Pseudokirchneriella subcapitata (alghe cloroficee) &gt; 100 mg/L 72h</p> <p>a) Aquatic acute toxicity : NOEC Algae = 5600 mg/L</p> <p>a) Aquatic acute toxicity : EC50 Daphnia  Daphnia magna (Pulce d'acqua grande) &gt; 100 mg/L 48h</p>                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |
| 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one                                      | CAS: 2634-33-5 - EINECS: 220-120-9 - INDEX: 613-088-00-6  | <p>a) Aquatic acute toxicity : LC50 Fish Oncorhynchus mykiss = 2.15 mg/L 96h OECD Guideline 203</p> <p>a) Aquatic acute toxicity : EC50 Daphnia Daphnia magna = 2.9 mg/L 48h OECD Guideline 202</p> <p>a) Aquatic acute toxicity : EC50 Algae green alga Selenastrum capricornutum freshwater algae = 110 µg/L OECD Guideline 201</p> <p>d) Terrestrial toxicity : EC50 Worm Eisenia fetida &gt; 410.6 mg/kg OECD Guideline 207 - Duration 14d</p> <p>d) Terrestrial toxicity : EC10 soil microorganisms = 263.7 mg/kg - long term</p> <p>a) Aquatic acute toxicity : NOEC Sludge activated sludge 10.3 mg/L 3h OECD Guideline 209</p> <p>e) Plant toxicity : LC50 Triticum aestivum = 200 mg/kg OECD Guideline 208</p>                                                                                                                                             |
| reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1) | CAS: 55965-84-9 - INDEX: 613-167-00-5                     | <p>a) Aquatic acute toxicity : LC50 Fish Oncorhynchus mykiss = 0.19 mg/L 96h EPA OPP 72-1 (Fish Acute Toxicity Test)</p> <p>b) Aquatic chronic toxicity : NOEC Fish Danio rerio = 0.02 mg/L „OECD Guideline 210 (Fish, Early-Life Stage Toxicity Test) - 35days</p> <p>a) Aquatic acute toxicity : LC50 Daphnia Daphnia magna = 0.16 mg/L 48h EPA OPP 72-2 (Aquatic Invertebrate Acute Toxicity Test)</p> <p>b) Aquatic chronic toxicity : NOEC Daphnia Daphnia magna = 0.1 mg/L EPA OPP 72-4 (Fish Early Life-Stage and Aquatic Invertebrate Life-Cycle Studies) - 21days</p> <p>a) Aquatic acute toxicity : EC50 Algae Skeletonema costatum = 0 mg/L 96h „OECD Guideline 201 (Alga, Growth Inhibition Test)</p> <p>a) Aquatic acute toxicity : EC50 Sludge activated sludge = 4.5 mg/L 3h „OECD Guideline 209 (Activated Sludge, Respiration Inhibition Test)</p> |

d) Terrestrial toxicity : LC50 Worm *Eisenia fetida* = 613 mg/kg „OECD Guideline 207 (Earthworm, Acute Toxicity Tests) - 14days

e) Plant toxicity : NOEC *Trifolium pratense*, *Oryza sativa*, *Brassica napus* = 1000 mg/L OECD Guideline 208 (Terrestrial Plants Test: Seedling Emergence and Seedling Growth Test) - 21days

## 12.2. Persistence and degradability

| Component                                                                                     | Persitence/Degradability: | Test           | Notes:              |
|-----------------------------------------------------------------------------------------------|---------------------------|----------------|---------------------|
| 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one                                      | Non-readily biodegradable | CO2 production | OECD Guideline 301C |
| reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1) | Non-readily biodegradable |                |                     |

## 12.3. Bioaccumulative potential

| Component                                                                                     | Bioaccumulation | Test                          | Value  | Notes: |
|-----------------------------------------------------------------------------------------------|-----------------|-------------------------------|--------|--------|
| 1,2-benzisothiazol-3(2H)-one; 1,2-benzisothiazolin-3-one                                      | Bioaccumulative | BCF - Bioconcentration factor | 6.620  |        |
| reaction mass of 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one (3:1) | Bioaccumulative | BCF - Bioconcentration factor | 54.000 | ≤ 54   |

## 12.4. Mobility in soil

N.A.

## 12.5. Results of PBT and vPvB assessment

No PBT or vPvB substances present in concentration ≥ 0.1%

## 12.6. Other adverse effects

N.A.

---

## SECTION 13: Disposal considerations

### 13.1. Waste treatment methods

Recover if possible. In so doing, comply with the local and national regulations currently in force. Disposal through discharge into wastewater is not permitted

---

## SECTION 14: Transport information

Not classified as dangerous in the meaning of transport regulations.

### 14.1. UN number

N/A

### 14.2. UN proper shipping name

ADR-Shipping Name: N/A

IATA-Shipping Name: N/A

IMDG-Shipping Name: N/A

### 14.3. Transport hazard class(es)

ADR-Class: N/A

IATA-Class: N/A

IMDG-Class: N/A

### 14.4. Packing group

ADR-Packing Group: N/A

IATA-Packing group: N/A

IMDG-Packing group: N/A

### 14.5. Environmental hazards

Toxic ingredients quantity: 0.00

Very toxic ingredients quantity: 0.00

Marine pollutant: No

Environmental Pollutant: No

### 14.6. Special precautions for user

Road and Rail (ADR-RID):

ADR exempt: No

ADR-Label: N/A

ADR - Hazard identification number: N/A

ADR-Special Provisions: N/A

ADR-Transport category (Tunnel restriction code): N/A

Air (IATA):

IATA-Passenger Aircraft: N/A

IATA-Cargo Aircraft: N/A

IATA-Label: N/A

IATA-Subsidiary hazards: N/A

IATA-Erg: N/A

IATA-Special Provisions: N/A

Sea (IMDG):

IMDG-Stowage and handling: N/A

IMDG-Segregation: N/A

IMDG-Subsidiary hazards: N/A

IMDG-Special Provisions: N/A

IMDG-EMS: N/A

#### 14.7. Transport in bulk according to Annex II of MARPOL and the IBC Code

N.A.

---

## SECTION 15: Regulatory information

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

Workplace exposure limit within the meaning of the Control of Substances Hazardous to Health Regulations 2002 (WEL-EH40)

REACH regulation as changed by the REACH etc. (Amendment etc.) (EU Exit) Regulations (UK REACH)

CLP regulation as changed by the Chemicals (Health and Safety) and Genetically Modified Organisms (Contained Use) (Amendment etc.) (EU Exit) Regulations (GB CLP)

GB PIC legislation - (Regulation (EU) No 649/2012 as changed by the Chemicals (Health and Safety) and Genetically Modified Organisms (Contained Use) (Amendment etc.) (EU Exit) Regulations

Restrictions related to the product or the substances contained according to Annex XVII of UK REACH:

Restrictions related to the product: 3

Restrictions related to the substances contained: None.

Additional Regulatory Information for Great Britain

No Additional Information

Provisions related to the Control of Major Accident Hazards Regulations 2015 (GB implementation of Seveso III):

None

GB PIC Legislation:

No substances listed

SVHC Substances:

No SVHC substances present in concentration  $\geq 0.1\%$

### UK regulations implementing Dir. 2010/75/EC (VOC directive)

Volatile Organic compounds - VOCs = 0.00 %

Volatile Organic compounds - VOCs = 0.00 g/L

### 15.2. Chemical safety assessment

No Chemical Safety Assessment has been carried out for the mixture.

---

## SECTION 16: Other information

| Code | Description |
|------|-------------|
|------|-------------|

|      |                                         |
|------|-----------------------------------------|
| H351 | Suspected of causing cancer if inhaled. |
|------|-----------------------------------------|

| Code | Hazard class and hazard category | Description |
|------|----------------------------------|-------------|
|------|----------------------------------|-------------|

|       |         |                             |
|-------|---------|-----------------------------|
| 3.6/2 | Carc. 2 | Carcinogenicity, Category 2 |
|-------|---------|-----------------------------|

This document was prepared by a competent person who has received appropriate training.

Main bibliographic sources:

ECDIN - Environmental Chemicals Data and Information Network - Joint Research Centre, Commission of the European Communities

SAX's DANGEROUS PROPERTIES OF INDUSTRIAL MATERIALS - Eight Edition - Van Nostrand Reinold

The information contained herein is based on our state of knowledge at the above-specified date. It refers solely to the product indicated and constitutes no guarantee of particular quality.

It is the duty of the user to ensure that this information is appropriate and complete with respect to the specific use intended.

This MSDS cancels and replaces any preceding release.

Legend to abbreviations and acronyms used in the safety data sheet:

ACGIH: American Conference of Governmental Industrial Hygienists

ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road.

AND: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways  
 ATE: Acute Toxicity Estimate  
 ATEmix: Acute toxicity Estimate (Mixtures)  
 BCF: Biological Concentration Factor  
 BEI: Biological Exposure Index  
 BOD: Biochemical Oxygen Demand  
 CAS: Chemical Abstracts Service (division of the American Chemical Society).  
 CAV: Poison Center  
 CE: European Community  
 CLP: Classification, Labeling, Packaging.  
 CMR: Carcinogenic, Mutagenic and Reprotoxic  
 COD: Chemical Oxygen Demand  
 COV: Volatile Organic Compound  
 CSA: Chemical Safety Assessment  
 CSR: Chemical Safety Report  
 DMEL: Derived Minimal Effect Level  
 DNEL: Derived No Effect Level.  
 DPD: Dangerous Preparations Directive  
 DSD: Dangerous Substances Directive  
 EC50: Half Maximal Effective Concentration  
 ECHA: European Chemicals Agency  
 EINECS: European Inventory of Existing Commercial Chemical Substances.  
 ES: Exposure Scenario  
 GHS: Globally Harmonized System of Classification and Labeling of Chemicals.  
 IARC: International Agency for Research on Cancer  
 IATA: International Air Transport Association.  
 IATA-DGR: Dangerous Goods Regulation by the "International Air Transport Association" (IATA).  
 IC50: half maximal inhibitory concentration  
 ICAO: International Civil Aviation Organization.  
 ICAO-TI: Technical Instructions by the "International Civil Aviation Organization" (ICAO).  
 IMDG: International Maritime Code for Dangerous Goods.  
 INCI: International Nomenclature of Cosmetic Ingredients.  
 IRCCS: Scientific Institute for Research, Hospitalization and Health Care  
 KAFH: Keep Away From Heat  
 KSt: Explosion coefficient.  
 LC50: Lethal concentration, for 50 percent of test population.  
 LD50: Lethal dose, for 50 percent of test population.  
 LDLo: Leathal Dose Low  
 N.A.: Not Applicable  
 N/A: Not Applicable  
 N/D: Not defined/ Not available  
 NA: Not available  
 NIOSH: National Institute for Occupational Safety and Health  
 NOAEL: No Observed Adverse Effect Level  
 OSHA: Occupational Safety and Health Administration  
 PBT: Persistent, Bioaccumulative and Toxic  
 PGK: Packaging Instruction  
 PNEC: Predicted No Effect Concentration.  
 PSG: Passengers  
 RID: Regulation Concerning the International Transport of Dangerous Goods by Rail.  
 STEL: Short Term Exposure limit.  
 STOT: Specific Target Organ Toxicity.  
 TLV: Threshold Limiting Value.  
 TWATLV: Threshold Limit Value for the Time Weighted Average 8 hour day. (ACGIH Standard).  
 vPvB: Very Persistent, Very Bioaccumulative.