Conforms to Regulation (EC) No. 1907/2006 (REACH), Annex II, as amended by UK REACH Regulation SI 2019/758

SAFETY DATA SHEET

Date of issue/Date of revision

: 9 November 2022

Version

• 1



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

| NOVAGUARD 840/890 HRD CREAM |
|---|
| 40840-BHARD |
| |
| Liquid. |
| Not available. |
| the substance or mixture and uses advised against |
| Industrial applications, Used by spraying. |
| Coating. |
| Product is not intended, labelled or packaged for consumer use. |
| |

1.3 Details of the supplier of the safety data sheet

PPG France Business Support SAS, 3, ZAE "Les Dix Muids", B.P. 89, 59583 Marly Cedex, France, 33 (0)3 27 19 35 00

- Technical contact : Product Compliance EMEA
- Tel : +33 (0)3 27 19 35 00
- e-mail address of person responsible for this SDS
- PPG Architectural Coatings UK Ltd, Huddersfield Road, Birstall, West Yorkshire WF17 9XA, Tel: +44 (0) 1924 354000

: Product.Stewardship.EMEA@ppg.com

1.4 Emergency telephone number

Supplier

+33 (0)3 27 19 35 00 (0800-1700)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Product definition : Mixture Classification according to UK CLP/GHS

Acute Tox. 4, H302 Acute Tox. 3, H311 Acute Tox. 3, H331 Skin Corr. 1A, H314 Eye Dam. 1, H318 Skin Sens. 1, H317 Aquatic Chronic 2, H411

The product is classified as hazardous according to UK CLP Regulation SI 2019/720 as amended.

See Section 16 for the full text of the H statements declared above.

See Section 11 for more detailed information on health effects and symptoms.

2.2 Label elements Hazard pictograms



Signal word

: Danger

English (GB)

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| SECTION 2: Hazards identification | | |

| Hazard statements | : | Harmful if swallowed. Toxic in contact with skin or if inhaled. Causes severe skin burns and eye damage. May cause an allergic skin reaction. Toxic to aquatic life with long lasting effects. |
|---|-----|--|
| Precautionary statements | | |
| Prevention | : | Wear protective gloves, protective clothing and eye or face protection. Avoid release to the environment. |
| Response | : | Collect spillage. IF INHALED: Immediately call a POISON CENTER or doctor. IF SWALLOWED: Immediately call a POISON CENTER or doctor. |
| Storage | : | Not applicable. |
| Disposal | : | Dispose of contents and container in accordance with all local, regional, national and international regulations. |
| | | P280, P273, P391, P304 + P310, P301 + P310, P501 |
| Supplemental label elements | 1 | Not applicable. |
| Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles | : | Not applicable. |
| Special packaging requirem | nen | <u>ts</u> |
| Containers to be fitted with child-resistant fastenings | : | Not applicable. |
| Tactile warning of danger | : | Not applicable. |
| 2.3 Other hazards | | |
| Product meets the criteria for PBT or vPvB according to Regulation (EC) No. 1907/2006, Annex XIII | : | This mixture does not contain any substances that are assessed to be a PBT or a vPvB. |
| Other hazards which do not result in classification | : | None known. |

SECTION 3: Composition/information on ingredients

3.2 Mixtures

Mixture

| Product/ingredient name | Identifiers | % | Classification | Туре |
|--|---|-------------|---|------|
| 2,2'-dimethyl-4,4'-methylenebis (cyclohexylamine) | EC: 229-962-1 CAS: 6864-37-5 Index: 612-110-00-1 | ≥75 - ≤90 | Acute Tox. 4, H302 Acute Tox. 3, H311 Acute Tox. 3, H331 Skin Corr. 1A, H314 Eye Dam. 1, H318 Aquatic Chronic 2, H411 | [1] |
| benzyl alcohol | REACH #: 01-2119492630-38 EC: 202-859-9 CAS: 100-51-6 Index: 603-057-00-5 | ≥10 - ≤15 | Acute Tox. 4, H302 Acute Tox. 4, H332 Eye Irrit. 2, H319 | [1] |
| N-(3-(trimethoxysilyl)propyl) ethylenediamine | EC: 217-164-6 CAS: 1760-24-3 | ≥1.0 - ≤5.0 | Acute Tox. 4, H332 Eye Dam. 1, H318 Skin Sens. 1, H317 Aquatic Chronic 3, H412 | [1] |

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|--|--|---------------------------|---|------|
| SECTION 3: Composition | on/information o | on ingredients | | |
| 2,4,6-tris(dimethylaminomethyl) phenol | REACH #: 01-2119560597-27 EC: 202-013-9 CAS: 90-72-2 Index: 603-069-00-0 | ≥1.0 - ≤3.7 | Acute Tox. 4, H302 Acute Tox. 4, H312 Skin Corr. 1C, H314 Eye Dam. 1, H318 | [1] |
| | | | See Section 16 for the full text of the H statements declared above. | |

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, are PBTs, vPvBs or Substances of equivalent concern, or have been assigned a workplace exposure limit and hence require reporting in this section. <u>Type</u>

[1] Substance classified with a health or environmental hazard

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

SUB codes represent substances without registered CAS Numbers.

SECTION 4: First aid measures

4.1 Description of first aid measures

| Eye contact | : Check for and remove any contact lenses. Immediately flush eyes with running water for at least 15 minutes, keeping eyelids open. Seek immediate medical attention. |
|----------------------------|---|
| Inhalation | Remove to fresh air. Keep person warm and at rest. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. |
| Skin contact | : Remove contaminated clothing and shoes. Wash skin thoroughly with soap and water or use recognised skin cleanser. Do NOT use solvents or thinners. |
| Ingestion | : If swallowed, seek medical advice immediately and show the container or label. Keep person warm and at rest. Do NOT induce vomiting. |
| 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. |

| 4.2 Most important sympt | oms and effects, both acute and delayed |
|--------------------------------|--|
| Potential acute health effe | ects |
| Eye contact | : Causes serious eye damage. |
| Inhalation | : Toxic if inhaled. |
| Skin contact | : Causes severe burns. Toxic in contact with skin. May cause an allergic skin reaction. |
| Ingestion | : Harmful if swallowed. |
| <u>Over-exposure signs/syr</u> | nptoms |
| 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

| Enalish (CD) | ۱. |
|--------------|----|
| English (GB) | |

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|--|--|
| SECTION 4: First aid | measures |
| Notes to physician | : In case of inhalation of decomposition products in a fire, symptoms may be delayed. The exposed person may need to be kept under medical surveillance for 48 hours. |
| Specific treatments | : No specific treatment. |
| SECTION 5: Firefigh | ing measures |
| 5.1 Extinguishing media | |
| Suitable extinguishing media | : Use an extinguishing agent suitable for the surrounding fire. |
| Unsuitable extinguishing media | : None known. |
| 5.2 Special hazards arising f | om the substance or mixture |
| Hazards from the substance or mixture | : In a fire or if heated, a pressure increase will occur and the container may burst. This material is 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 metal oxide/oxides Formaldehyde. |
| 5.3 Advice for firefighters | |
| Special protective actions for fire-fighters | : Promptly isolate the scene by removing all persons from the vicinity of the incident there is a fire. No action shall be taken involving any personal risk or without suitable training. |
| Special protective equipment for fire-fighters | : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode. |
| SECTION 6: Acciden | al release measures |

| 6.1 Personal precautions, pro | tective equipment and emergency procedures | |
|--|--|--|
| For non-emergency personnel | : No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilt material. Do not breathe vapour or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment. | |
| For emergency responders | : If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel". | |
| 6.2 Environmental precautions | : Avoid dispersal of spilt 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. Collect spillage. | |
| 6.3 Methods and material for containment and cleaning up | | |
| Small spill | : Stop leak if without risk. Move containers from spill area. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor. | |

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| | | | |

SECTION 6: Accidental release measures

| Large spill | : Stop leak if without risk. Move containers from spill area. Approach the 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). Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilt product. Note: see Section 1 for emergency contact information and Section 13 for waste disposal. |
|---------------------------------|---|
| 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

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

7.1 Precautions for safe handling

| Protective measures | : Put on appropriate personal protective equipment (see Section 8). Persons with a history of skin sensitization problems should not be employed in any process in which this product is used. Do not get in eyes or on skin or clothing. Do not breathe vapour or mist. Do not ingest. Avoid release to the environment. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container. |
|--|---|
| Advice on general occupational hygiene | : Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures. |

7.2 Conditions for safe storage, including any incompatibilities

Store between the following temperatures: 0 to 35°C (32 to 95°F). Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store locked up. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

7.3 Specific end use(s)

See Section 1.2 for Identified uses.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

Occupational exposure limits

No exposure limit value known.

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SECTION 8: Exposure controls/personal protection

Recommended monitoring procedures : If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. 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.

DNELs/DMELs

| Product/ingredient name | Туре | Exposure | Value | Population | Effects |
|--|------|-----------------------|------------------------|--------------------|----------|
| 2,2'-dimethyl-4,4'- | DNEL | Long term Inhalation | 0.6 mg/m³ | Workers | Systemic |
| methylenebis | | | | | |
| (cyclohexylamine) | | | | | |
| | DNEL | Long term Inhalation | 0.96 mg/m ³ | Workers | Local |
| | DNEL | Long term Oral | 0.008 mg/kg bw/day | General population | Systemic |
| | DNEL | Long term Dermal | 0.05 mg/kg bw/day | Workers | Systemic |
| benzyl alcohol | DNEL | Long term Oral | 4 mg/kg bw/day | General population | Systemic |
| | DNEL | Long term Dermal | 4 mg/kg bw/day | General population | Systemic |
| | DNEL | Long term Inhalation | 5.4 mg/m³ | General population | |
| | DNEL | Long term Dermal | 8 mg/kg bw/day | Workers | Systemic |
| | DNEL | Short term Oral | 20 mg/kg bw/day | General population | Systemic |
| | DNEL | Short term Dermal | 20 mg/kg bw/day | General population | Systemic |
| | DNEL | Long term Inhalation | 22 mg/m³ | Workers | Systemic |
| | DNEL | Short term Inhalation | 27 mg/m³ | General population | Systemic |
| | DNEL | Short term Dermal | 40 mg/kg bw/day | Workers | Systemic |
| | DNEL | Short term Inhalation | 110 mg/m³ | Workers | Systemic |
| N-(3-(trimethoxysilyl)propyl) ethylenediamine | DNEL | Long term Oral | 2.5 mg/kg bw/day | General population | Systemic |
| - | DNEL | Long term Dermal | 2.5 mg/kg bw/day | General population | Systemic |
| | DNEL | Short term Dermal | 5 mg/kg bw/day | Workers | Systemic |
| | DNEL | Long term Dermal | 5 mg/kg bw/day | Workers | Systemic |
| | DNEL | Long term Inhalation | 8.7 mg/m ³ | General population | Systemic |
| | DNEL | Short term Dermal | 17 mg/kg bw/day | General population | Systemic |
| | DNEL | Long term Inhalation | 35.3 mg/m ³ | Workers | Systemic |
| | DNEL | Long term Inhalation | 0.1 mg/m ³ | General population | Local |
| | DNEL | Long term Inhalation | 0.6 mg/m ³ | Workers | Local |
| | DNEL | Short term Inhalation | 4 mg/m ³ | General population | Local |
| | DNEL | Short term Inhalation | 5.36 mg/m ³ | Workers | Local |
| | DNEL | Short term Inhalation | 50 mg/m ³ | General population | Systemic |
| | DNEL | Short term Inhalation | 260 mg/m ³ | Workers | Systemic |
| 2,4,6-tris | DNEL | Long term Oral | 0.075 mg/kg bw/day | General population | Systemic |
| (dimethylaminomethyl)phenol | | | | | - |
| | DNEL | Short term Dermal | 0.075 mg/kg bw/day | General population | Systemic |
| | DNEL | Long term Dermal | 0.075 mg/kg bw/day | General population | Systemic |
| | DNEL | Short term Inhalation | 0.13 mg/m ³ | General population | Systemic |
| | DNEL | Long term Inhalation | 0.13 mg/m ³ | General population | Systemic |
| | DNEL | Long term Dermal | 0.15 mg/kg bw/day | Workers | Systemic |
| | DNEL | Long term Inhalation | 0.53 mg/m ³ | Workers | Systemic |
| | DNEL | Short term Dermal | 0.6 mg/kg bw/day | Workers | Systemic |
| | DNEL | Short term Inhalation | 2.1 mg/m ³ | Workers | Systemic |

PNECs

No PNECs available

8.2 Exposure controls

Appropriate engineering controls

: Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits.

Individual protection measures

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|--|---|---|--|
| SECTION 8: Expos | sure controls/ | personal protection | |
| Hygiene measures | eating, smo Appropriate Contaminat contaminate | Is, forearms and face thoroughly after handli oking and using the lavatory and at the end c e techniques should be used to remove pote ted work clothing should not be allowed out c ed clothing before reusing. Ensure that eyes e close to the workstation location. | of the working period. ntially contaminated clothing. of the workplace. Wash |

Eye/face protection : Chemical splash goggles and face shield.

Skin protection

| <u>onin proteotion</u> | | |
|------------------------|---|--|
| Hand protection | Chemical-resistant, impervious gloves complying with an approved st worn at all times when handling chemical products if a risk assessment necessary. Considering the parameters specified by the glove manu during use that the gloves are still retaining their protective properties noted that the time to breakthrough for any glove material may be diffi- glove manufacturers. In the case of mixtures, consisting of several s protection time of the gloves cannot be accurately estimated. When frequently repeated contact may occur, a glove with a protection class (breakthrough time greater than 480 minutes according to EN 374) is When only brief contact is expected, a glove with a protection class of (breakthrough time greater than 30 minutes according to EN 374) is r The user must check that the final choice of type of glove selected for product is the most appropriate and takes into account the particular as included in the user's risk assessment. nitrile neoprene | nt indicates this is facturer, check . It should be ferent for different ubstances, the prolonged or s of 6 recommended. f 2 or higher ecommended. r handling this |
| Body protection | Personal protective equipment for the body should be selected based performed and the risks involved and should be approved by a specia handling this product. | |
| Other skin protection | Appropriate footwear and any additional skin protection measures sh based on the task being performed and the risks involved and should specialist before handling this product. | |
| Respiratory protection | Respirator selection must be based on known or anticipated exposur hazards of the product and the safe working limits of the selected res are exposed to concentrations above the exposure limit, they must us certified respirators. Use a properly fitted, air-purifying or air-fed resp with an approved standard if a risk assessment indicates this is nece respirator conforming to EN140. Filter type: organic vapour (Type A filter P3 | pirator. If workers appropriate, irator complying ssary. Wear a |

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

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

9.1 Information on basic physical and chemical properties

| English (GB) | United Kingdom (UK) 7/14 |
|--|---|
| Flammability (solid, gas) Upper/lower flammability or explosive limits | liquid Greatest known range: Lower: 1.3% Upper: 13% (benzyl alcohol) |
| Initial boiling point and boiling range | : >37.78°C (>100°F) |
| Melting point/freezing point | May start to solidify at the following temperature: -7.1°C (19.2°F) This is based on data for the following ingredient: 2,2'-dimethyl-4,4'-methylenebis(cyclohexylamine). Weighted average: -8.53°C (16.6°F) |
| Odour threshold | : Not available. |
| Odour | : Amine-like. |
| Colour | : Beige. |
| Physical state | : Liquid. |
| <u>Appearance</u> | |

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SECTION 9: Physical and chemical properties

Flash point

: Closed cup: Not applicable.

| Α | Auto-ignition temperature : | | | | | |
|---|--|-----|-----|--------|--|--|
| | Ingredient name | °C | °F | Method | | |
| | 2,2'-dimethyl-4,4'-methylenebis(cyclohexylamine) | 275 | 527 | | | |

| Decomposition temperature | : | |
|---------------------------|--|--|
| рН | Not applicable. | |
| | Not applicable. insoluble in water. | |
| Viscosity | : Kinematic (40°C): >21 mm ² /s | |
| Solubility(ies) | · · · · · · · · · · · · · · · · · · · | |

| | | | Method |
|---|-------------------------|-------------|--------|
| | Media | Result | |
| | cold water | Not soluble | |
| Ν | Aiscible with water : N | lo. | |

| Miscible | with | water | 2 |
|----------|------|-------|---|
| | | | |

Partition coefficient: n-octanol/ : Not applicable. water

ŝ

Vapour pressure

| | Vapour Pressure at 20°C | | Va | apour pressure at 50°C | |
|--|---|-------------|---------------------|------------------------|-------|
| Ingredient name | mm Hg | kPa | Method | mm Hg | kPa |
| N-(3-(trimethoxysilyl)propyl) ethylenediamine | 0.3000246 | 0.04 | | | |
| Relative density | : 0.97 | , | ŀ | | |
| Vapour density | : High | nest known | value: 3.7 (Air = | 1) (benzyl alco | hol). |
| Explosive properties | The product itself is not explosive, but the formation of an explosible mixture of vapour or dust with air is possible. | | | | |
| Oxidising properties | : Proc | duct does r | not present an oxid | dizing hazard. | |
| Particle characteristics | | | | | |
| Median particle size | : Not | applicable | | | |

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 | : When exposed to high temperatures may produce hazardous decomposition products. Refer to protective measures listed in sections 7 and 8. |
| 10.5 Incompatible materials | : Keep away from the following materials to prevent strong exothermic reactions: oxidising agents, strong alkalis, strong acids. |
| 10.6 Hazardous decomposition products | : Depending on conditions, decomposition products may include the following materials: carbon oxides nitrogen oxides Formaldehyde. metal oxide/oxides |

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SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute toxicity

| Product/ingredient name | Result | Species | Dose | Exposure |
|--|---------------------------------|---------|-------------------------|----------|
| 2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine) | LC50 Inhalation Dusts and mists | Rat | 420 mg/m³ | 4 hours |
| | LD50 Dermal | Rabbit | >0.2 g/kg | - |
| | LD50 Oral | Rat | >0.32 g/kg | - |
| benzyl alcohol | LC50 Inhalation Dusts and mists | Rat | >4178 mg/m ³ | 4 hours |
| | LD50 Dermal | Rabbit | 2000 mg/kg | - |
| | LD50 Oral | Rat | 1.23 g/kg | - |
| N-(3-(trimethoxysilyl)propyl) ethylenediamine | LD50 Oral | Rat | 2413 mg/kg | - |
| 2,4,6-tris (dimethylaminomethyl) phenol | LD50 Dermal | Rabbit | 1.28 g/kg | - |
| | LD50 Dermal | Rat | 1280 mg/kg | - |
| | LD50 Oral | Rat | 1200 mg/kg | - |

Conclusion/Summary Acute toxicity estimates : There are no data available on the mixture itself.

| Product/ingredient name | Oral (mg/ kg) | Dermal (mg/kg) | Inhalation (gases) (ppm) | Inhalation (vapours) (mg/l) | Inhalation (dusts and mists) (mg/l) |
|--|------------------|-------------------|--------------------------------|-----------------------------------|--|
| NOVAGUARD 840/890 HRD CREAM | 583.8 | 374.3 | N/A | 312.1 | 0.6 |
| 2,2'-dimethyl-4,4'-methylenebis(cyclohexylamine) | 500 | 300 | N/A | N/A | 0.5 |
| benzyl alcohol | 1230 | N/A | N/A | N/A | 1.5 |
| N-(3-(trimethoxysilyl)propyl)ethylenediamine | 2413 | N/A | N/A | 11 | N/A |
| 2,4,6-tris(dimethylaminomethyl)phenol | 1200 | 1280 | N/A | N/A | N/A |

Irritation/Corrosion

| Product/ingredient name | Result | Species | Score | Exposure | Observation |
|---|----------------------------------|-----------------|-------|----------|-------------|
| 2,4,6-tris (dimethylaminomethyl)phenol | Skin - Visible necrosis | Rabbit | - | 4 hours | 7 days |
| Conclusion/Summary | Not available. | | | | • |
| Skin | : There are no data available on | the mixture its | self. | | |
| Eyes | : There are no data available on | the mixture its | self. | | |
| Respiratory | : There are no data available on | the mixture its | self. | | |
| <u>Sensitisation</u> | | | | | |
| Conclusion/Summary | | | | | |
| | : There are no data available on | | | | |
| Respiratory | : There are no data available on | the mixture its | self. | | |
| <u>Mutagenicity</u> | | | | | |
| Conclusion/Summary | : There are no data available on | the mixture its | self. | | |
| Carcinogenicity | | | | | |
| Conclusion/Summary | : There are no data available on | the mixture its | self. | | |
| Reproductive toxicity | | | | | |
| Conclusion/Summary | : There are no data available on | the mixture its | self. | | |
| Teratogenicity | | | | | |
| Conclusion/Summary | : | | | | |
| | There are no data available on | the mixture its | self. | | |

Specific target organ toxicity (single exposure)

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|---|--|
| SECTION 11: Toxico | logical information |
| Not available. | |
| Specific target organ toxici | ity (repeated exposure) |
| Not available. | |
| Aspiration hazard Not available. | |
| Information on likely routes of exposure | : Not available. |
| Potential acute health effect | <u>s</u> |
| Eye contact | : Causes serious eye damage. |
| Inhalation | : Toxic if inhaled. |
| Skin contact | : Causes severe burns. Toxic in contact with skin. May cause an allergic skin reaction. |
| Ingestion | : Harmful if swallowed. |
| Symptoms related to the phy | vsical, chemical and toxicological characteristics |
| 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 |
| Delayed and immediate offe | cts as well as chronic effects from short and long-term exposure |
| Short term exposure | ste de trei, de enterne enterte nom entert und teng term exposure |
| Potential immediate effects | : Not available. |
| Potential delayed effects | : Not available. |
| Long term exposure | |
| Potential immediate effects | : Not available. |
| Potential delayed effects | : Not available. |
| Potential chronic health eff | ects |
| Not available. | |
| Conclusion/Summary | : Not available. |
| General | : Once sensitized, a severe allergic reaction may occur when subsequently expose to very low levels. |
| Carainaganiaitu | No known aignificant affacts or aritical bozarda |

- Carcinogenicity: No known significant effects or critical hazards.Mutagenicity: No known significant effects or critical hazards.
- **Reproductive toxicity** : No known significant effects or critical hazards.

Other information : Not available.

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|-----------|---------------------|--------------------------------|-------------------|
| NOVAGUARI | 0 840/890 HRD CREAM | | |

SECTION 12: Ecological information

12.1 Toxicity

| Product/ingredient name | Result | Species | Exposure |
|---|---------------------|---------|----------|
| 2,4,6-tris (dimethylaminomethyl) phenol | Acute LC50 175 mg/l | Fish | 96 hours |

Conclusion/Summary

: Not available.

12.2 Persistence and degradability

| Conclusion/Summary | Not available. |
|---------------------|----------------|
| ounclusion/ounnully | |

| Product/ingredient name | Aquatic half-life | Photolysis | Biodegradability |
|-------------------------|-------------------|------------|------------------|
| benzyl alcohol | - | - | Readily |

12.3 Bioaccumulative potential

| Product/ingredient name | LogPow | BCF | Potential |
|---|----------------------|-----|-------------------|
| 2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine) benzyl alcohol 2,4,6-tris (dimethylaminomethyl) phenol | 1.8 0.87 0.219 | - | low low low |

12.4 Mobility in soil

| Soil/water partition coefficient (Koc) | : Not available. |
|--|------------------|
| Mobility | : Not available. |

12.5 Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be a PBT or a vPvB.

12.6 Other adverse effects : No known significant effects or critical hazards.

SECTION 13: Disposal considerations

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

13.1 Waste treatment methods

| Product | |
|---------------------|--|
| Methods of disposal | : The generation of waste should be avoided or minimised wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non- recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. |
| Hazardous waste | : Yes. |
| Waste catalogue | |
| Waste code | Waste designation |
| 08 01 11* | waste paint and varnish containing organic solvents or other hazardous substances |

Packaging _____

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| NOVAGUA | ARD 840/890 HRD CREAM | | |
| | | | |

| SECTION 13: Disposal considerations | | |
|-------------------------------------|--|--|
| Methods of disposal | : The generation of waste should be avoided or minimised wherever possible. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. | |
| Special precautions | This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. | |

SECTION 14: Transport information

| | ADR/RID | ADN | IMDG | ΙΑΤΑ |
|------------------------------------|---|---|---|---|
| 14.1 UN number | UN2922 | UN2922 | UN2922 | UN2922 |
| 14.2 UN proper shipping name | CORROSIVE LIQUID, TOXIC, N.O.S. (2,2'- dimethyl-4,4'- methylenebis (cyclohexylamine), 2,4,6-tris (dimethylaminomethyl) phenol) |
| | (2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine), 2,4,6-tris (dimethylaminomethyl) phenol) | (2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine), 2,4,6-tris (dimethylaminomethyl) phenol) | (2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine), 2,4,6-tris (dimethylaminomethyl) phenol) | (2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine), 2,4,6-tris (dimethylaminomethyl) phenol) |
| 14.3 Transport hazard class(es) | 8 (6.1) | 8 (6.1) | 8 (6.1) | 8 (6.1) |
| 14.4 Packing group | II | 11 | 11 | II |
| 14.5 Environmental hazards | Yes. | Yes. | Yes. | Yes. The environmentally hazardous substance mark is not required. |
| Marine pollutant substances | Not applicable. | Not applicable. | (2,2'-dimethyl-4,4'- methylenebis (cyclohexylamine)) | Not applicable. |

| Additional mormation | | |
|--|--|--|
| ADR/RID | The environmentally hazardous substance mark is not required when transported in sizes of ≤5 L or ≤5 kg. | |
| ADN | The environmentally hazardous substance mark is not required when transported in sizes of ≤5 L or ≤5 kg. | |
| IMDG | : The marine pollutant mark is not required when transported in sizes of $\leq 5 \text{ L}$ or $\leq 5 \text{ kg}$. | |
| ΙΑΤΑ | : The environmentally hazardous substance mark may appear if required by other transportation regulations. | |
| 14.6 Special precautions for user : Transport within user's premises: always transport in closed containers that a upright and secure. Ensure that persons transporting the product know what to d the event of an accident or spillage. | | |
| 14.7 Transport according to IN instruments | | |

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|-----------|---------------------|--------------------------------|-------------------|
| NOVAGUARI | D 840/890 HRD CREAM | | |

SECTION 15: Regulatory information

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture <u>UK (GB) /REACH</u>

Annex XIV - List of substances subject to authorisation

Annex XIV

None of the components are listed.

Substances of very high concern

None of the components are listed.

Ozone depleting substances

Not listed.

Annex XVII - Restrictions : Not applicable. on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles

Seveso Directive

This product is controlled under the Seveso Directive.

Danger criteria

Category

H2 E2

SECTION 16: Other information

Indicates information that has changed from previously issued version.

| Abbreviations and acronyms | ATE = Acute Toxicity Estimate GB CLP = UK CLP (EC No 1272/2008) on the Classification, Labelling and Packaging of Substances and Mixtures as amended by (EU Exit) Regulations 2019 No. 720 and amendments DMEL = Derived Minimal Effect Level DNEL = Derived No Effect Level EUH statement = GB CLP-specific Hazard statement N/A = Not available PBT = Persistent, Bioaccumulative and Toxic PNEC = Predicted No Effect Concentration |
|-------------------------------|--|
| | |

Procedure used to derive the classification

| Classification | Justification |
|-------------------------|--------------------|
| Acute Tox. 4, H302 | Calculation method |
| Acute Tox. 3, H311 | Calculation method |
| Acute Tox. 3, H331 | Calculation method |
| Skin Corr. 1A, H314 | Calculation method |
| Eye Dam. 1, H318 | Calculation method |
| Skin Sens. 1, H317 | Calculation method |
| Aquatic Chronic 2, H411 | Calculation method |

Full text of abbreviated H statements

| <mark>Code</mark> NOVAGUA | : 40840-BHARD RD 840/890 HRD CREAM | Date of issue/Date of revision | : 9 November 2022 |
|------------------------------|---------------------------------------|--------------------------------|-------------------|
| SECTIO | N 16: Other information | | |
| H302 | Harmful if swallowed. | | |

| H311 | Toxic in contact with skin. |
|------|--|
| H312 | Harmful in contact with skin. |
| H314 | Causes severe skin burns and eye damage. |
| H317 | May cause an allergic skin reaction. |
| H318 | Causes serious eye damage. |
| H319 | Causes serious eye irritation. |
| H331 | Toxic if inhaled. |
| H332 | Harmful if inhaled. |
| H411 | Toxic to aquatic life with long lasting effects. |
| H412 | Harmful to aquatic life with long lasting effects. |
| | |

Full text of classifications

| Acute Tox. 3 | ACUTE TOXICITY - Category 3 |
|------------------------|---|
| Acute Tox. 4 | ACUTE TOXICITY - Category 4 |
| Aquatic Chronic 2 | LONG-TERM (CHRONIC) AQUATIC HAZARD - Category 2 |
| Aquatic Chronic 3 | LONG-TERM (CHRONIC) AQUATIC HAZARD - Category 3 |
| Eve Dam. 1 | SERIOUS EYE DAMAGE/EYE IRRITATION - Category 1 |
| Eye Irrit. 2 | SERIOUS EYE DAMAGE/EYE IRRITATION - Category 2 |
| Skin Corr. 1A | SKIN CORROSION/IRRITATION - Category 1A |
| Skin Corr. 1C | SKIN CORROSION/IRRITATION - Category 1C |
| Skin Sens. 1 | SKIN SENSITISATION - Category 1 |
| | |
| <u>History</u> | |
| Date of issue/ Date of | : 11/9/2022 |
| revision | |
| | |
| Date of previous issu | e : No previous validation |
| Prepared by | : EHS |

Version

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