

SAFETY DATA SHEET

Date of issue : September 2021

SIMAGUARD PHENOCOAT COATING 2402-00 BASE
SECTION 1 Identification of the substance

| | |
|-------------------------|--|
| Trade Name | SIMAGUARD PHENOCOAT COATING BASE |
| Product Code | 2402-00 |
| Product Type | Solvent based |
| Manufacturer's data | PT. SIGMA UTAMA Jl. Landbouw No.1 Citeureup – Bogor, INDONESIA + 62-21-87 3042 (Fax) |
| Emergency Telephone No. | + 62-21-87 6310 (Office Hours) |

SECTION 2 Hazard identification

OSHA/HCS Status Considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200)

Classification of the substance or mixture FLAMMABLE LIQUIDS – Category 3
 SKIN CORROSION/IRRITATION - Category 2
 SERIOUS EYE DAMAGE/EYE IRRITATION - Category 2
 SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) (Respiratory tract irritation) – Category 3
 AQUATIC TOXICITY (CHRONIC) – Category 2

Label elements

Hazard pictograms



Signal Word Warning

Hazard Statements H226- Flammable liquid and vapor
 H318- Causes serious eye damage
 H315- Causes skin irritation
 H317- May cause an allergic skin reaction
 H312-Harmful in contact with skin
 H319-Causes serious Irritation
 H335-May cause respiratory irritation
 H304-May be fatal if swallowed and enters airways
 H360-May damage fertility or the unborn child

Precautionary statements

Prevention Avoid breathing vapors, spray or mists. Wear protective gloves/protective clothing/eye protection/face protection. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Keep out of reach of children. Keep container tightly closed. Use personal protective equipment as required.

Response IF IN EYES : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If skin irritation occurs : get medical attention

Storage Store in a cool, well-ventilated area Store in a cool, well-ventilated area

Disposal Dispose of contents and container in accordance with all local, regional, national and international regulation

Hazardous ingredients Xylene, bisphenol A-epichlorhydrin
 Other Hazards None Known

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SIMAGUARD PHENOCOAT COATING 2402-00 BASE
SECTION 3 Composition

| Ingredient | CAS No | Conc. range (%) | GHS Classification |
|------------------------------|--------------|-----------------|--|
| Xylene | 1330-20-7 | 5 - 15 | Flam. Liq. 3;H226 Acute Tox. 4;H332 Acute Tox. 4;H312 Skin Irrit. 2;H315 Eye Irrit. 2;H319 STOT SE 3;H335 Asp. Tox. 1;H304 |
| Bisphenol A -epichlorohydrin | 25068-38-6 | 20 - 35 | Skin Irrit H317 Eye Irrit H318 Asp. Tox. H335 Fertility Dam H360 |
| Titanium dioxide | 0013463-67-7 | 17-19 | ----- |
| Silica Flour | 14808-6-7 | 18-20 | ----- |
| Barium Sulfate | 7727-43-7 | 13-18 | ----- |

Concentrations shown as range to protect confidentiality or due to batch variation.

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

SECTION 4 First Aid Measure

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. |
| 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. Give nothing by mouth. If unconscious, place in recovery position and get medical attention immediately |
| Skin contact | Remove contaminated clothing and shoes. Wash skin thoroughly with soap and water or use recognized skin cleanser. Do NOT use solvents or thinners |
| 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. |

SECTION 5 Fire Fighting Measure

| | |
|--|--|
| Extinguishing media | Recommended : Alcohol resistant foam, CO2 ,powder, water spray (foam) Not to be used : water jet |
| Hazards from the substance or mixture | Flammable liquid and vapor. In a fire or heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. Runoff to sewer may create fire or explosion hazard. |

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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 metal oxide/oxides.

Special equipment for fire fighter

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 Accidental release measurement
Personal precautions, protective equipment and emergency procedures

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. 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.

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

Methods for 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.

SECTION 7 Handling and storage
Handling

Vapor 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.

Storage

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. Store in accordance with local regulations.

SECTION 8 Exposure control/personal protection

| Ingredient | Exposure limit |
|-------------------|---|
| Organophilic clay | OSHA PEL TWA : 10 mg/m ³ |
| Xylene | OSHA 2013 TWA : ppm (435 mg/m ³) |
| Titanium Dioxide | OSHA PEL |

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| | |
|--|--------------------------|
| | TWA 15 mg/m ³ |
|--|--------------------------|

Personal Protection


Use a NIOSH APPROVED RESPIRATOR
 Use GOGGLES OR FACE SHIELD
 RUBBER GLOVES AS NEEDED
 USE APRON OR OTHER CLOTHING TO AVOID SKIN CONTACT

Personal protective equipment should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. Use a properly fitted, air-purifying or air fed respirator complying with an approved standard. 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.

Engineering controls

Keep gas, vapor, or dust concentration below any lower explosive limit. 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

Hygiene measures

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

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, filter or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels

SECTION 9 Physical and chemical properties

| | |
|------------------|-------------------------|
| Physical | Liquid- White, and Grey |
| Odor | Solvent-like |
| Flash point | Closed up ; 78°C |
| Vapor density | Heavier than air |
| Specific density | 1.50 ± 0.15 kg /litre |
| Viscosity | 30-35 Poise/Str |
| Solubilities | Insoluble in water |

SECTION 10 Stability and reactivity

| | |
|-----------------------------------|---|
| Reactivity and chemical stability | <p>Conditions to avoid : Avoid temperatures above 60°C (140 F), direct sunlight and contact with sources of heat.</p> <p>Hazardous reactions : Keep away from oxidising agents, strongly alkaline and strongly acid materials in order to avoid exothermic reactions.</p> |
| Hazardous decomposition products | Under normal conditions of storage and use, hazardous decomposition products should not be produced |
| Conditions to avoid | Avoid all possible sources of ignition (spark or flame). Do not pressurized, cut, weld, braze, solder, drill, grind or expose containers to heat or sources of ignition |

SECTION 11 Toxicological information

| | | | |
|------------|-------------------|-------------------|--------------------------------------|
| Ingredient | Oral LD 50, mg/kg | Skin LD 50, mg/kg | Inhalation vapor LD 50, mg/l/4 hours |
|------------|-------------------|-------------------|--------------------------------------|

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| | | | |
|------------------------------|-----------------|---------------------|---------------|
| Bisphenol A –epichlorohydrin | 4000 rat | 20000 rabbit | No data |
| Xylene | 4300 mg/kg, rat | >2000 mg/kg, rabbit | 6350 ppm, rat |
| Titanium dioxide | 10,000, Rat | 10,000 Rabbit | No data |
| Limestone | No data | No data | No data |
| Silica flour | No data | No data | No data |

SECTION 12 Ecological information

| Ingredient | 96 hr LC50 fish, mg/l | 48 hr EC50 crustacea, mg/l | 96 hr EC50 algae, mg/l |
|-------------------------------|---------------------------------|------------------------------|---|
| Bisphenol A – epichlorohydrin | 9.4, Marinewater fish | 21 days: 3.16, Daphnia magna | 96 hours: 1.1 Marinewater algae |
| Titanium dioxide | 1,000.00, Fundulus heteroclitus | 5.50, Daphnia magna | 5.83 (72 hr), Pseudokirchneriella subcapitata |
| Xylene | 3.30, Oncorhynchus mykiss | 8.50, Palaemonetes pugio | 100.00 (72 hr), Chlorococcales |
| Limestone | Not Available | Not Available | Not Available |
| Silica flour | Not Available | Not Available | Not Available |

Environmental precaution : harmful to aquatic organism, may cause long term adverse effect in the aquatic environment.

SECTION 13 Disposal consideration


The generation of waste should be avoided or minimized 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. 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.

The information presented below only applies to the material as supplied. The identification based on characteristic or listing may not apply if the material has been used or otherwise contaminated.

SECTION 14 Transport information

| | |
|----------------------------------|---|
| 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 |
|----------------------------------|---|

| | UN no. | Proper shipping name | | Transport hazard class(es) | PG* | Env* | Additional information |
|---------------|---------|----------------------|---|--|-----|------|------------------------|
| ADR/RID Class | UN 1263 | Paint | 3 |  | III | Yes | |
| IMDG Class | UN1263 | Paint | 3 | | III | Yes | |
| IATA Class | UN1263 | Paint | 3 | | III | Yes | |

PG* : Packing group

Env* : Environmental hazards

SECTION 15 Regulatory information

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

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SIMAGUARD PHENOCOAT COATING 2402-00 BASE

SECTION 16 Other informationAbbreviation and
acronymsGHS = Globally Harmonized System of Classification and Labelling of
Chemicals

Disclaimer

TO THE BEST OF OUR KNOWLEDGE, THE INFORMATION CONTAINED HEREIN IS ACCURATE. HOWEVER, NEITHER PT. SIGMA UTAMA NOR ANY 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 HAZARD AND SHOULD BE USED IN CAUTION. ALTHOUGH CERTAIN HAZARDS ARE DESCRIBED HEREIN, WE CAN NOT GUARANTEE THAT THESE ARE THE ONLY HAZARDS, WHICH EXIST.

SAFETY DATA SHEET

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SIMAGUARD PHENOCOAT COATING 2402-00 HARDENER
SECTION 1 Identification of the substance

| | |
|-------------------------|--|
| Trade Name | SIMAGUARD PHENOCOAT COATING HARDENER |
| Product Code | 2402-00 |
| Product Type | Solvent based |
| Manufacturer's data | PT. SIGMA UTAMA Jl. Landbouw No.1 Citeureup – Bogor, INDONESIA + 62-21-87 3042 (Fax) |
| Emergency Telephone No. | + 62-21-87 6310 (Office Hours) |

SECTION 2 Hazard identification

OSHA/HCS Status Considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200)

Classification of the substance or mixture FLAMMABLE LIQUIDS – Category 3
 SKIN CORROSION/IRRITATION - Category 2
 SERIOUS EYE DAMAGE/EYE IRRITATION - Category 2
 SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) (Respiratory tract irritation) – Category 3
 AQUATIC TOXICITY (CHRONIC) – Category 2

Label elements

Hazard pictograms



Signal Word Warning

Hazard Statements H226- Flammable liquid and vapor
 H318- Causes serious eye damage
 H315- Causes skin irritation
 H317- May cause an allergic skin reaction
 H312-Harmful in contact with skin
 H319-Causes serious Irritation
 H335-May cause respiratory irritation
 H304-May be fatal if swallowed and enters airways
 H360-May damage fertility or the unborn child

Precautionary statements

Prevention Avoid breathing vapors, spray or mists. Wear protective gloves/protective clothing/eye protection/face protection. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking. Keep out of reach of children. Keep container tightly closed. Use personal protective equipment as required.

Response IF IN EYES : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. If skin irritation occurs : get medical attention

Storage Store in a cool, well-ventilated area Store in a cool, well-ventilated area

Disposal Dispose of contents and container in accordance with all local, regional, national and international regulation

Hazardous ingredients Ethylendiamine
 Other Hazards None Known

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SIMAGUARD PHENOCOAT COATING 2402-00 HARDENER
SECTION 3 Composition

| Ingredient | CAS No | Conc. range (%) | GHS Classification |
|---|------------|-----------------|--|
| Ethylenediamine | 107-15-3 | <15 | Flam. Liq. 3;H226 Acute Tox. 4;H312 Skin Irrit H317 Skin Irrit. 2;H315 Eye Irrit. 2;H319 STOT SE 3;H335 Asp. Tox. 1;H304 Asp. Tox. 2;H302 Skin Irrit. 1;H314 STOT SE 2;H334 |
| Cashew, nutshell liq, polymer with ethylenediamine and formaldehyde | 68413-28-5 | >85% | Skin Irrit H317 Skin Irrit. 2;H315 Eye Irrit. 2;H319 STOT SE 2;H334 |

Concentrations shown as range to protect confidentiality or due to batch variation.

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

SECTION 4 First Aid Measure

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.

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. Give nothing by mouth. If unconscious, place in recovery position and get medical attention immediately

Skin contact Remove contaminated clothing and shoes. Wash skin thoroughly with soap and water or use recognized skin cleanser. Do NOT use solvents or thinners

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-aider 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.

SECTION 5 Fire Fighting Measure

Extinguishing media Recommended : Alcohol resistant foam, CO2 ,powder, water spray (foam)
Not to be used : water jet

Hazards from the substance or mixture Flammable liquid and vapor. In a fire or heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion. Runoff to sewer may create fire or explosion hazard.
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.

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SIMAGUARD PHENOCOAT COATING 2402-00 HARDENER

| | |
|---|---|
| Hazardous combustion products | Decomposition products may include the following materials : carbon oxides metal oxide/oxides. |
| Special equipment for fire fighter | 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 Accidental release measurement

| | |
|--|---|
| Personal precautions, protective equipment and emergency procedures | 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. 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. |
| 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 |
| Methods for 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. |

SECTION 7 Handling and storage

| | |
|-----------------|--|
| Handling | Vapor 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. |
| Storage | 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. Store in accordance with local regulations. |

SECTION 8 Exposure control/personal protection

| Ingredient | Exposure limit |
|---|--|
| Ethylenediamine | OSHA PEL TWA : 25 mg/m ³ |
| Cashew, nutshell liq, polymer with ethylenediamine and formaldehyde | NE |

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SIMAGUARD PHENOCOAT COATING 2402-00 HARDENER
Personal Protection


Use a NIOSH APPROVED RESPIRATOR
 Use GOGGLES OR FACE SHIELD
 RUBBER GLOVES AS NEEDED
 USE APRON OR OTHER CLOTHING TO AVOID SKIN CONTACT

Personal protective equipment should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. Use a properly fitted, air-purifying or air fed respirator complying with an approved standard. 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.

Engineering controls

Keep gas, vapor, or dust concentration below any lower explosive limit. 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

Hygiene measures

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

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, filter or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels

SECTION 9 Physical and chemical properties

| | |
|------------------|------------------------------|
| Physical | Reddish Brown Viscous liquid |
| Odor | Solvent-like |
| Flash point | Closed cup ; 97 °C |
| Vapor density | Heavier than air |
| Specific density | 1.00 ± 0.15 kg /litre |
| Viscosity | 25.000-35.000 cPs |
| Solubilities | Insoluble in water |

SECTION 10 Stability and reactivity

| | |
|-----------------------------------|---|
| Reactivity and chemical stability | <p>Conditions to avoid : Avoid temperatures above 60°C (140 F), direct sunlight and contact with sources of heat.</p> <p>Hazardous reactions : Keep away from oxidising agents, strongly alkaline and strongly acid materials in order to avoid exothermic reactions.</p> |
| Hazardous decomposition products | Under normal conditions of storage and use, hazardous decomposition products should not be produced |
| Conditions to avoid | Avoid all possible sources of ignition (spark or flame). Do not pressurized, cut, weld, braze, solder, drill, grind or expose containers to heat or sources of ignition |

SECTION 11 Toxicological information

| Ingredient | Oral LD 50, mg/kg | Skin LD 50, mg/kg | Inhalation vapor LD 50, mg/l/4 hours |
|-----------------|-------------------|-------------------|--------------------------------------|
| Ethylenediamine | 1200 mg/kg, rat | 730 mg/kg, rabbit | 300 mg/m ³ , mouse |

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| | | | |
|---|-----------------------|---------|---------|
| Cashew, nutshell liq, polymer with ethylenediamine and formaldehyde | 2001 mg/kg, oral, rat | No data | No data |
|---|-----------------------|---------|---------|

SECTION 12 Ecological information

| Ingredient | 96 hr LC50 fish, mg/l | 48 hr EC50 crustacea, mg/l | 96 hr EC50 algae, mg/l |
|---|------------------------|----------------------------|------------------------|
| Ethylenediamine | 115,7, Fathead minnow; | 16.7 mg/l (Daphnia Magna) | 71 mg/l (green algae) |
| Cashew, nutshell liq, polymer with ethylenediamine and formaldehyde | Not Available | Not Available | Not Available |

Environmental precaution : harmful to aquatic organism, may cause long term adverse effect in the aquatic environment.

SECTION 13 Disposal consideration

The generation of waste should be avoided or minimized 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. 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.

The information presented below only applies to the material as supplied. The identification based on characteristic or listing may not apply if the material has been used or otherwise contaminated.

SECTION 14 Transport information

| | |
|----------------------------------|---|
| 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 |
|----------------------------------|---|

| | UN no. | Proper shipping name | | Transport hazard class(es) | PG* | Env* | Additional information |
|---------------|---------|----------------------|---|--|-----|------|------------------------|
| ADR/RID Class | UN 1263 | Paint | 3 |  | III | Yes | |
| IMDG Class | UN1263 | Paint | 3 | | III | Yes | |
| IATA Class | UN1263 | Paint | 3 | | III | Yes | |

PG* : Packing group

Env* : Environmental hazards

SECTION 15 Regulatory information

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

SECTION 16 Other information

Abbreviation and acronyms GHS = Globally Harmonized System of Classification and Labelling of Chemicals

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