

**Material Safety Data Sheet**

According to 91/155 EEC

Printing date 04.04.2007

Reviewed on 21.03.2007

**1 Identification of the substance/preparation and of the company/undertaking****Product details**Trade name Plastikol Multipox K Komp.A

Safety data sheet no.: 49PD10446-a/6

Application of the substance / the preparation Epoxy resin adhesive

**Manufacturer/Supplier:**

maxit France s.a.s  
 4 rue de Mulhouse  
 Boîte Postale 27  
 F-68180 Horbourg-Wihr  
 Tel.: ++33(0)3 89 20 10 80  
 FAX: ++33(0)3 89 20 10 92

**Information in case of emergency:**

maxit France s.a.s  
 Tel.: ++33(0)3 89 20 10 80

**2 Composition/information on ingredients****Chemical characterization****Description:** Reaction resin based on bisphenol-A and F**Dangerous components:**

|            |                                                                                                                                                                                                                                                                                                       |          |
|------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|
| 14808-60-7 | Siliciumdioxide (Quartzsand)                                                                                                                                                                                                                                                                          | 25 - 50% |
| 14808-60-7 | Siliciumdioxide (Quartz flour in a liquid recipe)                                                                                                                                                                                                                                                     | 25 - 50% |
| 25068-38-6 | reaction product: bisphenol-A-(epichlorhydrin) epoxy resin (number average molecular weight = 700)<br> Xi,  N; R 36/38-43-51/53 | 10 - 20% |
| 28064-14-4 | Bisphenole-F-Epichlorhydrine-Resin $MG \leq 700$<br> Xi,  N; R 36/38-43-51/53                                                   | 5 - 10%  |
| 68609-97-2 | oxirane, mono[(C12-14-alkyloxy)methyl] derivs<br> Xi,  N; R 36/38-43-51/53                                                      | 2 - 5%   |
| 67762-90-7 | Siliciumdioxid, hochdispers, amorph, hydrophob, oberflächenbehandelt                                                                                                                                                                                                                                  | 2 - 5%   |

**Additional information** For the wording of the listed risk phrases refer to section 16.**3 Hazards identification****Hazard description:**

Xi Irritant

**Information concerning particular hazards for human and environment:**

The product has to be labelled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

R 36/38 Irritating to eyes and skin.

R 43 May cause sensitisation by skin contact.

R 52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Contains epoxy constituents. See information supplied by the manufacturer.

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**Trade name** Plastikol Multipox K Komp.A

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## Classification system:

The classification is according to the latest editions of the EU-lists, and extended by company and literature data.

## 4 First aid measures

### General information

Immediately remove any clothing soiled by the product.

Remove the victim immediately from the danger area. If the patient is unwell consult a doctor and present this data sheet.

**After inhalation** Supply fresh air and to be sure call for a doctor.

### After skin contact

Immediately wash with water and soap and rinse thoroughly.

If skin irritation continues, consult a doctor.

### After eye contact

Rinse opened eye for several minutes under running water. Then consult doctor. Rinse liquid should be tempered (20-30°C).

### After swallowing

Rinse out mouth with water. Do not induce vomiting. Seek medical attention and present this data sheet.

**Information for doctor** None

## 5 Fire fighting measures

### Suitable extinguishing agents

CO<sub>2</sub>, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

**For safety reasons unsuitable extinguishing agents** Water with full jet

### Special hazards caused by the substance, its products of combustion or resulting gases:

Carbon monoxide (CO)

### Protective equipment:

Wear self-contained respiratory protective device.

Wear fully protective suit.

### Additional information

Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

Collect contaminated fire fighting water separately. It must not enter the sewage system.

## 6 Accidental release measures

### Person-related safety precautions:

Wear protective equipment. Keep unprotected persons away.

Ensure adequate ventilation.

### Measures for environmental protection:

The product must not get into watercourses or into the soil.

Inform respective authorities in case of seepage into water course or sewage system.

### Measures for cleaning/collecting:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

Dispose of the material collected according to regulations.

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**Trade name Plastikol Multipox K Komp.A****Additional information:** See Section 13 for disposal information.

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**7 Handling and storage****Handling****Information for safe handling:**

Store in cool, dry place in tightly closed receptacles.

Ensure good ventilation/exhaustion at the workplace.

**Information about fire - and explosion protection:** No special measures required.**Storage****Requirements to be met by storerooms and receptacles:** Store in a cool location.**Information about storage in one common storage facility:**

Do not store together with alkalis (caustic solutions).

Do not store together with acids.

**Further information about storage conditions:**

Protect from heat and direct sunlight.

Store in cool, dry conditions in well sealed receptacles.

Protect from frost.

**8 Exposure controls and personal protection****Additional information about design of technical facilities:** No further data; see item 7.**Ingredients with limit values that require monitoring at the workplace:****Additional information:**

The applicable TRGS 900 (MAK list) was used as the basis for the preparation and/or revision of this safety data sheet.

**Personal protective equipment:****General protective and hygienic measures:**

The usual precautionary measures are to be adhered to when handling chemicals.

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing.

Wash hands before breaks and at the end of work.

Avoid contact with the eyes and skin.

Use a moisturising skin cream after processing the product.

**Respiratory protection:**

Use suitable respiratory protective device in case of insufficient ventilation.

In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use self-contained respiratory protective device.

Short term filter device:

Filter AX.

**Protection of hands:**

Protective gloves.

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

**Material of gloves**

Nitrile rubber, NBR

Butyl rubber, BR

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has

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therefore to be checked prior to the application.

## Penetration time of glove material

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

**Eye protection:** Tightly sealed goggles

**Body protection:** Protective work clothing.

## 9 Physical and chemical properties:

### General Information

**Form:** Fluid  
**Colour:** According to product specification  
**Odour:** Characteristic

### Change in condition

**Melting point/Melting range:** Undetermined.

**Boiling point/Boiling range:** Not determined

**Flash point:** > 100°C (> 212°F) (DIN ISO 2592)

**Ignition temperature:** >400°C (>752°F) (DIN 51794)

**Self-igniting:** Product is not selfigniting.

**Danger of explosion:** Product does not present an explosion hazard.

**Density at 20°C (68°F):** 1,85 g/cm<sup>3</sup> (DIN 51757)

**Bulk density:** Not applicable.

### Solubility in / Miscibility with

**Water:** Insoluble

**pH-value:** Not applicable.

### Viscosity:

**dynamic:** Not determined.

**kinematic:** Not determined.

**Solvent separation test:** Not determined

### Solvent content:

**Organic solvents:** <0,2 %

**Additional information:** None.

## 10 Stability and reactivity

### Thermal decomposition / Conditions to be avoided:

To avoid thermal decomposition do not overheat.

### Dangerous reactions:

Reacts with oxidizing agents

Reacts with alcohols, amines, aqueous acids and alkalis

**Dangerous decomposition products:** No dangerous decomposition products known.

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## 11 Toxicological information

### Acute toxicity:

LD/LC50 values relevant for classification:

| Components                                                                                                           | Type | Value                 | Species |
|----------------------------------------------------------------------------------------------------------------------|------|-----------------------|---------|
| <b>25068-38-6 reaction product: bisphenol-A-(epichlorhydrin) epoxy resin (number average molecular weight = 700)</b> |      |                       |         |
| Oral                                                                                                                 | LD50 | 11400 mg/kg (rat)     |         |
| Dermal                                                                                                               | LD50 | > 2000 mg/kg (rabbit) |         |
| <b>28064-14-4 Bisphenole-F-Epichlorhydrine-Resin MG ≤ 700</b>                                                        |      |                       |         |
| Oral                                                                                                                 | LD50 | 23800 mg/kg (rat)     |         |
| Dermal                                                                                                               | LD50 | > 2000 mg/kg (rabbit) |         |
| <b>68609-97-2 oxirane, mono[(C12-14-alkyloxy)methyl] derivs</b>                                                      |      |                       |         |
| Oral                                                                                                                 | LD50 | > 5000 mg/kg (rat)    |         |

### Primary irritant effect:

**on the skin:** Irritant to skin and mucous membranes.

**on the eye:** Irritating effect.

**Sensitization:** Sensitization possible through skin contact.

### Additional toxicological information:

The product shows the following dangers according to the calculation method of the General EC Classification Guidelines for Preparations as issued in the latest version:

Irritant

## 12 Ecological information:

### Information about elimination (persistence and degradability):

**Other information:** The product is difficultly biodegradable.

### Behaviour in environmental systems:

#### Mobility and bioaccumulation potential:

|                                                                                                                      |                                   |
|----------------------------------------------------------------------------------------------------------------------|-----------------------------------|
| <b>25068-38-6 reaction product: bisphenol-A-(epichlorhydrin) epoxy resin (number average molecular weight = 700)</b> |                                   |
| EBAB (dynamic)                                                                                                       | 3,5 - 4 log Pow (Bioakkumulation) |

### Ecotoxicological effects:

#### Aquatic toxicity:

| Type of test Effective concentration Method Assessment                                                               |                                                      |
|----------------------------------------------------------------------------------------------------------------------|------------------------------------------------------|
| <b>25068-38-6 reaction product: bisphenol-A-(epichlorhydrin) epoxy resin (number average molecular weight = 700)</b> |                                                      |
| EC50/24h                                                                                                             | 1,1 - 3,6 mg/l (Daphnia magna (großer Wasserfloh))   |
| EC50/96h                                                                                                             | 220 mg/l (Selenastrum capricornutum (Grünalge))      |
| LC50/96h                                                                                                             | 1,5 - 7,7 mg/l (Oncorhynchus mykiss (rainbow trout)) |
| <b>68609-97-2 oxirane, mono[(C12-14-alkyloxy)methyl] derivs</b>                                                      |                                                      |
| EC50/48h                                                                                                             | 1-10 mg/l (Daphnia magna (großer Wasserfloh))        |
| LC50/96h                                                                                                             | 1-10 mg/l (fish)                                     |

**Remark:** Harmful to fish

### General notes:

Do not allow product to reach ground water, water course or sewage system.

Harmful to aquatic organisms

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Danger to drinking water if even small quantities leak into the ground.

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## 13 Disposal considerations

**Product:**
**Recommendation**

Curing of the product by mixing with the curing component. Cured epoxy resin products are waste that requires no particular supervision and can as a rule be disposed of as commercial waste that is similar to household rubbish.

**European waste catalogue**

07 02 08 other still bottoms and reaction residues

**Uncleaned packaging:**
**Recommendation:**

Empty contaminated packagings thoroughly. They may be recycled after thorough and proper cleaning.

## 14 Transport information

**Land transport ADR/RID and GGVS/GGVE (cross-border/domestic)**

ADR/RID-GGVS/E Class: -

**Maritime transport IMDG/GGVSea:**


IMDG/GGVSea Class: 9

UN Number: 3082

Label 9

Packaging group: III

EMS Number: F-A,S-F

Marine pollutant: Yes (P)

Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Epoxy Resin)

**Air transport ICAO-TI and IATA-DGR:**

ICAO/IATA Class: -

## 15 Regulatory information

**Labelling according to EU guidelines:**

The product has been classified and marked in accordance with EU Directives / Ordinance on Hazardous Materials. Observe the general safety regulations when handling chemicals.

**Code letter and hazard designation of product:**


Xi Irritant

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## Hazard-determining components of labelling:

reaction product: bisphenol-A-(epichlorhydrin) epoxy resin (number average molecular weight = 700)

Bisphenole-F-Epichlorhydrine-Resin  $MG \leq 700$

oxirane, mono[(C12-14-alkyloxy)methyl] derivs

## Risk phrases:

36/38 Irritating to eyes and skin.

43 May cause sensitisation by skin contact.

52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

## Safety phrases:

2 Keep out of the reach of children.

23 Do not breathe fumes.

26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

28 After contact with skin, wash immediately with plenty of water.

36/37/39 Wear suitable protective clothing, gloves and eye/face protection.

46 If swallowed, seek medical advice immediately and show this container or label.

## Special labelling of certain preparations:

Contains epoxy constituents. See information supplied by the manufacturer.

## 16 Other information:

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

### Relevant R-phrases

36/38 Irritating to eyes and skin.

43 May cause sensitisation by skin contact.

51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

**Department issuing MSDS:** Product safety department

**Contact:** Mr Gilles Weber, Tel.: ++33(0)3 89 20 10 93

\* Data compared to the previous version altered.

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## 1 Identification of the substance/preparation and of the company/undertaking

### Product details

Trade name **Plastikol Multipox K Komp. B**

Safety data sheet no.: 49PD10446-b/4

Application of the substance / the preparation Hardening agent/ Curing agent

### Manufacturer/Supplier:

maxit France s.a.s  
4 rue de Mulhouse  
Boîte Postale 27  
F-68180 Horbourg-Wihr  
Tel.: ++33(0)3 89 20 10 80  
FAX: ++33(0)3 89 20 10 92

### Information in case of emergency:

maxit France s.a.s  
Tel.: ++33(0)3 89 20 10 80

## 2 Composition/information on ingredients

### Chemical characterization

Description: Reaction resin curer based on amines and polyamines.

### Dangerous components:

|            |                                                                                                                                                                                                                                                                                                          |          |
|------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|
| 4067-16-7  | 3,6,9,12-tetra-azatetradecamethylenediamine<br> C,  N; R 34-43-50/53                                                               | 10 - 25% |
| 1477-55-0  | m-Xylylendiamine<br> C,  Xn; R 20/22-34-43-52/53                                                                                   | 10 - 20% |
| 98-54-4    | 4-tert-butylphenol<br> Xi,  N; R 36/37/38-43-51/53                                                                                 | 10 - 20% |
| 100-51-6   | Benzyl alcohol<br> Xn; R 20/22                                                                                                                                                                                        | 5 - 10%  |
| 2855-13-2  | 3-aminomethyl-3,5,5-trimethylcyclohexylamine<br> C,  Xn; R 21/22-34-43-52/53                                                       | 5 - 10%  |
| 112-24-3   | 3,6-diazaoctanethylenediamin<br> C,  Xn; R 21-34-43-52/53                                                                          | 2 - 5%   |
|            | Alkylphenol<br> C,  Xn; R 22-34                                                                                                    | 1 - 2%   |
| 25513-64-8 | trimethylhexane-1,6-diamine<br> C,  Xn; R 22-34-43-52/53                                                                           | 1 - 2%   |
| 25154-52-3 | nonylphenol<br> C,  Xn,  N; R 22-34-62-50/53-63 | 0,1 - 1% |

Additional information For the wording of the listed risk phrases refer to section 16.

## 3 Hazards identification

### Hazard description:



C Corrosive  
N Dangerous for the environment

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## Information concerning particular hazards for human and environment:

The product has to be labelled due to the calculation procedure of the "General Classification guideline for preparations of the EU" in the latest valid version.

R 22 Harmful if swallowed.

R 34 Causes burns.

R 43 May cause sensitisation by skin contact.

R 51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

## Classification system:

The classification is according to the latest editions of the EU-lists, and extended by company and literature data.

## 4 First aid measures

### General information

Immediately remove any clothing soiled by the product.

Symptoms of poisoning may even occur after several hours; therefore medical observation for at least 48 hours after the accident.

Remove the victim immediately from the danger area. If the patient is unwell consult a doctor and present this data sheet.

**After inhalation** Supply fresh air and to be sure call for a doctor.

**After skin contact** Immediately wash with water and soap and rinse thoroughly.

### After eye contact

Rinse opened eye for several minutes under running water. Then consult doctor. Rinse liquid should be tempered (20-30°C).

**After swallowing** Drink plenty of water and provide fresh air. Call for a doctor immediately.

### Information for doctor

**The following symptoms may occur:**

Headache

Dizziness

Dizziness

**Treatment** If swallowed, gastric irrigation with added, activated carbon.

## 5 Fire fighting measures

### Suitable extinguishing agents

CO<sub>2</sub>, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

**For safety reasons unsuitable extinguishing agents** Water with full jet

### Special hazards caused by the substance, its products of combustion or resulting gases:

Carbon monoxide (CO)

Under certain fire conditions, traces of other toxic gases cannot be excluded.

**Protective equipment:** Wear self-contained respiratory protective device.

### Additional information

Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

Collect contaminated fire fighting water separately. It must not enter the sewage system.

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## 6 Accidental release measures

### Person-related safety precautions:

Wear protective equipment. Keep unprotected persons away.

Use respiratory protective device against the effects of fumes/dust/aerosol.

### Measures for environmental protection:

The product must not get into watercourses or into the soil.

Inform respective authorities in case of seepage into water course or sewage system.

### Measures for cleaning/collecting:

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

Dispose of the material collected according to regulations.

Ensure adequate ventilation.

**Additional information:** See Section 13 for disposal information.

## 7 Handling and storage

### Handling

#### Information for safe handling:

Keep receptacles tightly sealed.

Ensure good ventilation/exhaustion at the workplace.

**Information about fire - and explosion protection:** No special measures required.

### Storage

#### Requirements to be met by storerooms and receptacles:

Store only in unopened original receptacles.

#### Information about storage in one common storage facility:

Store away from foodstuffs.

Do not store together with acids.

**Further information about storage conditions:** Protect from heat and direct sunlight.

## 8 Exposure controls and personal protection

**Additional information about design of technical facilities:** No further data; see item 7.

### Ingredients with limit values that require monitoring at the workplace:

#### Additional information:

Te applicable TRGS 900 (MAK list) was used as the basis for the preparation and/or revision of this safety data sheet.

### Personal protective equipment:

#### General protective and hygienic measures:

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing.

Wash hands before breaks and at the end of work.

Avoid contact with the eyes and skin.

Use a moisturising skin cream after processing the product.

Do not eat, drink, smoke or sniff while working.

#### Respiratory protection:

Use suitable respiratory protective device in case of insufficient ventilation.

#### Protection of hands:

Protective gloves.

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

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Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

## Material of gloves

Nitrile rubber, NBR

Butyl rubber, BR

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

## Penetration time of glove material

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

**Eye protection:** Tightly sealed goggles

**Body protection:** Protective work clothing.

## 9 Physical and chemical properties:

### General Information

|                |                       |
|----------------|-----------------------|
| <b>Form:</b>   | Fluid                 |
| <b>Colour:</b> | Yellowish-transparent |
| <b>Odour:</b>  | Characteristic        |

### Change in condition

|                                     |                         |
|-------------------------------------|-------------------------|
| <b>Melting point/Melting range:</b> | Undetermined.           |
| <b>Boiling point/Boiling range:</b> | > 200°C (> 392°F) (DIN) |

**Flash point:** > 100°C (> 212°F) (DIN ISO 2592)

**Ignition temperature:** >300°C (>572°F) (DIN 51794)

**Self-igniting:** Product is not selfigniting.

**Danger of explosion:** Product does not present an explosion hazard.

**Vapour pressure at 20°C (68°F):** <1,0 hPa (<1 mm Hg) (DIN 51640)

**Density at 20°C (68°F):** 1,006 g/cm<sup>3</sup> (DIN 51757)

**Bulk density:** Not applicable.

### Solubility in / Miscibility with

**Water:** Not miscible or difficult to mix

**pH-value:** Not applicable.

### Viscosity:

|                   |                 |
|-------------------|-----------------|
| <b>dynamic:</b>   | Not determined. |
| <b>kinematic:</b> | Not determined. |

**Solvent separation test:** Not determined

**Additional information:** None.

## 10 Stability and reactivity

### Thermal decomposition / Conditions to be avoided:

No decomposition if used according to specifications.

**Dangerous reactions:** Reacts with acids

**Dangerous decomposition products:** No dangerous decomposition products known.

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**11 Toxicological information****Acute toxicity:****LD/LC50 values relevant for classification:**

| Components                                                    | Type     | Value               | Species |
|---------------------------------------------------------------|----------|---------------------|---------|
| <b>1477-55-0 m-Xylylendiamine</b>                             |          |                     |         |
| Oral                                                          | LD50     | 930 mg/kg (rat)     |         |
| Dermal                                                        | LD50     | 2000 mg/kg (rabbit) |         |
| Inhalative                                                    | LC50/4 h | 2,4 mg/l (rat)      |         |
| <b>98-54-4 4-tert-butylphenol</b>                             |          |                     |         |
| Oral                                                          | LD50     | 2951 mg/kg (rat)    |         |
| Dermal                                                        | LD50     | 2288 mg/kg (rbt)    |         |
| <b>100-51-6 Benzyl alcohol</b>                                |          |                     |         |
| Oral                                                          | LD50     | 1230 mg/kg (rat)    |         |
| Dermal                                                        | LD50     | 2000 mg/kg (rabbit) |         |
| Inhalative                                                    | LC50/4 h | 4178 mg/l (rat)     |         |
| <b>2855-13-2 3-aminomethyl-3,5,5-trimethylcyclohexylamine</b> |          |                     |         |
| Oral                                                          | LD50     | 1030 mg/kg (rat)    |         |
| Dermal                                                        | LD50     | 1840 mg/kg (rabbit) |         |
| <b>25620-58-0 Trimethylhexan-1,6-diamin</b>                   |          |                     |         |
| Oral                                                          | LD50     | 910 mg/kg (rat)     |         |

**Primary irritant effect:****on the skin:** Caustic effect on skin and mucous membranes.**on the eye:** Strong caustic effect.**Sensitization:** Sensitization possible through skin contact.**Additional toxicological information:**

The product shows the following dangers according to the calculation method of the General EC Classification Guidelines for Preparations as issued in the latest version:

Harmful

Corrosive

Swallowing will lead to a strong caustic effect on mouth and throat and to the danger of perforation of esophagus and stomach.

**12 Ecological information:****Information about elimination (persistence and degradability):****Other information:** The product is difficultly biodegradable.**Behaviour in environmental systems:****Mobility and bioaccumulation potential:****100-51-6 Benzyl alcohol**

EBAB 1,1 log Pow (Bioakkumulation)

**2855-13-2 3-aminomethyl-3,5,5-trimethylcyclohexylamine**

EBAB 0,79 log Pow (-)

**Ecotoxicological effects:****Aquatic toxicity:****Type of test Effective concentration Method Assessment****1477-55-0 m-Xylylendiamine**

EC50/48h &gt;10-100&lt; mg/l (Daphnia magna (großer Wasserfloh))

EC50/72h &gt;10-100&lt; mg/l (Alge)

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|                                                               |                                                 |
|---------------------------------------------------------------|-------------------------------------------------|
| LC50/96h                                                      | >100 mg/l (Oncorhynchus mykiss (rainbow trout)) |
| <b>100-51-6 Benzyl alcohol</b>                                |                                                 |
| EC 10                                                         | 400 mg/l (pseudomonas putida)                   |
| EC50/24h                                                      | 400 mg/l (Daphnia magna (großer Wasserfloh))    |
| EC50/96h                                                      | 640 mg/l (scenedesmus quadricauda (Alge))       |
| LC50/48h                                                      | 645 mg/l (Leuciscus idus (Goldorfe))            |
| LC50/96h                                                      | 10 mg/l (Lepomis macrochirus (Sonnenbarsch))    |
|                                                               | 460 mg/l (Pimephales promelas (Elritze))        |
| <b>2855-13-2 3-aminomethyl-3,5,5-trimethylcyclohexylamine</b> |                                                 |
| EC 10/18h                                                     | 1120 mg/l (pseudomonas putida)                  |
| EC50/24h                                                      | 42 mg/l (Daphnia magna (großer Wasserfloh))     |
| EC50/72h                                                      | 37 mg/l (scenedesmus subspicatus (Alge))        |
| LC50/48h                                                      | 185 mg/l (Leuciscus idus (Goldorfe))            |
| LC50/96h                                                      | 110 mg/l (Brachydanio rerio (Zebrabärbling))    |
| <b>25620-58-0 Trimethylhexan-1,6-diamin</b>                   |                                                 |
| EC 10/16h                                                     | 72 mg/l (pseudomonas putida)                    |
| EC50/24h                                                      | 31,5 mg/l (Daphnia magna (großer Wasserfloh))   |
| EC50/72h                                                      | 29,5 mg/l (scenedesmus subspicatus (Alge))      |
| LC0/48h                                                       | 150 mg/l (Leuciscus idus (Goldorfe))            |
| LC50/48h                                                      | 174 mg/l (Leuciscus idus (Goldorfe))            |

## Remark:

The product contains substances which cause a local pH change and thus have a detrimental effect on fish and bacteria.

The product contains substances which are toxic to fishes and bacteria.

## Behaviour in sewage processing plants:

**Type of test Effective concentration Method Assessment**

**100-51-6 Benzyl alcohol**

EC 50 (3h) 79 mg/l (scenedesmus quadricauda (Alge))

**Remark:** The product causes a significant pH change. Neutralise before introduction.

## Other information:

**100-51-6 Benzyl alcohol**

BSB (5) 1550 mg O2/g (-)

## General notes:

Must not reach sewage water or drainage ditch undiluted or unneutralized.

Also poisonous for fish and plankton in water bodies.

Toxic for aquatic organisms

Danger to drinking water if even small quantities leak into the ground.

## 13 Disposal considerations

### Product:

### Recommendation

After mixing with the resin component pour a partial amount back into the curing agent barrel, stir well and pour the mass back once more. Cured epoxy resin products are waste that requires no particular supervision and can as a rule be disposed of as commercial waste that is similar to household rubbish.

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## European waste catalogue

07 02 08 other still bottoms and reaction residues

### Uncleaned packaging:

#### Recommendation:

Empty contaminated packagings thoroughly. They may be recycled after thorough and proper cleaning.

Disposal must be made according to official regulations.

## 14 Transport information

### Land transport ADR/RID and GGVS/GGVE (cross-border/domestic)



ADR/RID-GGVS/E Class: 8 (C7) Corrosive substances.

Danger code (Kemler): 80

UN-Number: 2735

Packaging group: II

Hazard label: 8

Description of goods: 2735 POLYAMINES, LIQUID, CORROSIVE, N.O.S. (m-Xylylendiamine, TRIETHYLENETETRAMINE)

### Maritime transport IMDG/GGVSea:



IMDG/GGVSea Class: 8

UN Number: 2735

Label: 8

Packaging group: II

EMS Number: F-A,S-B

Marine pollutant: No

Proper shipping name: POLYAMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), TRIETHYLENETETRAMINE)

### Air transport ICAO-TI and IATA-DGR:



ICAO/IATA Class: 8

UN/ID Number: 2735

Label: 8

Packaging group: II

Proper shipping name: POLYAMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), TRIETHYLENETETRAMINE)

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**15 Regulatory information****Labelling according to EU guidelines:**

The product has been classified and marked in accordance with EU Directives / Ordinance on Hazardous Materials.

Observe the general safety regulations when handling chemicals.

**Code letter and hazard designation of product:**

C Corrosive

N Dangerous for the environment

**Hazard-determining components of labelling:**

3,6,9,12-tetra-azatetradecamethylenediamine

m-Xylylendiamine

4-tert-butylphenol

3-aminomethyl-3,5,5-trimethylcyclohexylamine

3,6-diazaoctanethylenediamin

trimethylhexane-1,6-diamine

**Risk phrases:**

22 Harmful if swallowed.

34 Causes burns.

43 May cause sensitisation by skin contact.

51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

**Safety phrases:**

25 Avoid contact with eyes.

26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

36/37/39 Wear suitable protective clothing, gloves and eye/face protection.

45 In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).

57 Use appropriate container to avoid environmental contamination.

**16 Other information:**

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

**Relevant R-phrases**

20/22 Harmful by inhalation and if swallowed.

21 Harmful in contact with skin.

21/22 Harmful in contact with skin and if swallowed.

22 Harmful if swallowed.

34 Causes burns.

36/37/38 Irritating to eyes, respiratory system and skin.

43 May cause sensitisation by skin contact.

50/53 Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

62 Possible risk of impaired fertility.

63 Possible risk of harm to the unborn child.

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**Department issuing MSDS:** Product safety department**Contact:** Mr Gilles Weber, Tel.: ++33(0)3 89 20 10 93**\* Data compared to the previous version altered.**

EU