



## 1 Identification

### GHS Product Identifier

EP 990 HS Part A

### Other means of identification

Epoxy Novolac Part A

### Recommended use of the chemical and restriction on use

Component Product. Must be used with Part B to complete reaction for urethane formation.

### Supplier's details

Lava-Liner, Ltd.  
1550 G Tiburon Blvd. Suite 418  
Tiburon, CA 94920  
Ph. 415-829-9114 Fax: 415-829-9203  
www.lava-liner.com

### Emergency phone number

Chemtrec 800-424-9300

## 2 Hazard(s) identification

### Classification of the substance or mixture

|                                   |             |  |
|-----------------------------------|-------------|--|
| Skin Corrosion/Irritation         | Category 2  | Causes skin irritation.                                  |
| Serious Eye Damage/Eye Irritation | Category 2B | Causes eye irritation                                    |
| Skin Sensitization                | Category 1B | May cause an allergic skin reaction point                |
| Aquatic Toxicity (Acute)          | Category 2  | Toxic to aquatic life                                    |
| Aquatic Toxicity (Chronic)        | Category 2  | Pollution Toxic to aquatic life with long lasting effect |

### GHS label elements

Warning



Causes skin and eye irritation

May cause an allergic skin reaction

Toxic to aquatic life

Toxic to aquatic life with long lasting effects

Avoid breathing dust/fume/gas/mist/vapours/spray.

Do not get in eyes, on skin, or on clothing.

Avoid release to the environment.

Wear protective gloves/protective clothing/eye protection/face protection.

IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

IF INHALED: If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Call a POISON CENTER/doctor/physician

If skin irritation occurs: Get medical advice/attention.

IF eye irritation persists: Get medical advice/attention.

Take off contaminated clothing.

Take off contaminated clothing and wash it before reuse.

Collect spillage.

### **Other hazards which do not result in classification**

#### **GHS Storage and Disposal Phrases**

P501 - Dispose of contents/container to local, state, and federal authority requirements.

#### **Potential Health Effects (Acute and Chronic)**

Causes skin and eye irritation. May cause skin sensitization, an allergic reaction, which becomes evident on reexposure to this material.

#### **Inhalation**

May cause respiratory irritation.

#### **Skin Contact**

Causes skin irritation. May cause skin sensitization, an allergic reaction, which becomes evident on reexposure to this material.

#### **Eye Contact**

Causes eye irritation.

#### **Ingestion**

May be harmful if swallowed.

#### **Recommended Exposure Limits**

Not established.

#### **Medical Conditions Generally Aggravated By Exposure**

Skin disorders, Respiratory disorders, Eye disorders, Skin Allergies.

## **3 Composition/information on ingredients**

| <b>Description</b>                   | <b>CAS Number</b> | <b>EINECS Number</b> | <b>%</b> | <b>Note</b> |
|--------------------------------------|-------------------|----------------------|----------|-------------|
| Phenol-Formaldehyde Polymer          | 28064-14-4        |                      | 60 - 80  |             |
| Talcum                               | 14807-96-6        |                      | 10 - 20  |             |
| Benzyl Alcohol                       | 100-51-6          |                      | 1 - 10   |             |
| Nonylphenol                          | 84852-15-3        |                      | 1 - 10   |             |
| Silicon dioxide, chemically prepared | 112945-52-5       |                      | 0 - 3    |             |
| titanium(IV) oxide                   | 13463-67-7        | 236-675-5            | 0 - 10   |             |
| C.I. Pigment Yellow 42               | 51274-00-1        |                      | 0 - 10   |             |
| iron(III) oxide                      | 1309-37-1         |                      | 0 - 10   |             |
| Carbon Black                         | 1333-86-4         | 231-153-3            | 0 - 10   |             |
| Bisphenol A epoxy resin              | 25068-38-6        |                      | 0 - 10   |             |

## **4 First-aid measures**

### **Description of necessary first-aid measures**

#### **In Case of Inhalation**

If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. If experiencing respiratory symptoms: Get medical attention immediately.

**In Case of Skin Contact**

In case of contact, immediately wash skin with soap and copious amounts of water. Remove contaminated clothing and shoes. Get medical attention if irritation develops or persists.

**In Case of Eye Contact**

In case of contact with eyes, flush with copious amounts of water for at least 15 minutes. Assure adequate flushing by separating the eyelids with fingers. Call a physician.

**In Case of Ingestion**

If swallowed, wash out mouth with water provided person is conscious. Call a physician immediately. Do not induce vomiting. For further assistance, contact your local Poison Control Center.

**Most important symptoms/effects, acute and delayed**

May cause skin, eye, and respiratory irritation. May cause allergic skin reaction.

**5 Fire-fighting measures****Suitable extinguishing media****Fire Fighting Instructions**

Protective Equipment: Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes.

**Suitable Extinguishing Media**

Dry chemical, CO<sub>2</sub>, water spray or regular foam.

**Precautions**

Do not use a direct water stream, which may spread fire.

**Specific hazards arising from the chemical**

In a fire, product may produce the following: Carbon monoxide, Carbon dioxide, Phenolics.

**Special protective actions for fire-fighters**

Do not use a direct water stream, which may spread fire.

**6 Accidental release measures****Personal precautions, protective equipment and emergency procedures**

Wear respirator, chemical safety goggles, rubber boots, and heavy rubber gloves. Where splashing is possible, full chemically resistant protective clothing, and boots are required.

**Environmental precautions**

Prevent entry into waterways, sewers, basements or confined areas.

**Methods and materials for containment and cleaning up**

Absorb with sand or vermiculite and place in closed containers for disposal. Ventilate the area.

**7 Handling and storage****Precautions for safe handling**

Provide adequate ventilation. Do not breathe vapor. Do not get in eyes, on skin or on clothing.

**Conditions for safe storage, including any incompatibilities**

Keep container tightly closed in a dry and well-ventilated place.

**8 Exposure controls/personal protection****Control parameters**

| Hazardous Components        | CAS #      | OSHA PEL         | ACGIH TLV                          | Other Limits |
|-----------------------------|------------|------------------|------------------------------------|--------------|
| Phenol-Formaldehyde Polymer | 28064-14-4 | No Data          | No Data                            | No Data      |
| Talcum                      | 14807-96-6 | 706 ppm/20 mppcf | 2 mg/m <sup>3</sup> (non-asbestos) | No Data      |

|                                  |             |                 |                       |         |
|----------------------------------|-------------|-----------------|-----------------------|---------|
| Benzenemethanol (Benzyl Alcohol) | 100-51-6    | No Data         | No Data               | No Data |
| Phenol, 4-nonyl-, branched       | 84852-15-3  | No Data         | No Data               | No Data |
| Silica, amorphous treated        | 112945-52-5 | No Data         | No Data               | No Data |
| Titanium dioxide                 | 13463-67-7  | 15 (dust) mg/m3 | 10 mg/m3              | No Data |
| C.I. Pigment Yellow 42           | 51274-00-1  | No Data         | No Data               | No Data |
| Iron oxide (Fe2O3)               | 1309-37-1   | 10 mg/m3        | 5 mg/m3 (dust & fume) | No Data |
| Carbon black                     | 1333-86-4   | 3.5 mg/m3       | 3.5 mg/m3             | No Data |
| Bisphenol-a based epoxy resin    | 25068-38-6  | No Data         | No Data               | No Data |

### Appropriate engineering controls

Good general ventilation should be sufficient to control airborne levels. Safety shower and eye bath.

### Individual protection measures

#### Protective Equipment Summary - Hazard Label Information:

Neoprene gloves Safety glasses, or goggles. Impervious clothing. Chemical resistant boots

#### Respiratory Equipment (Specify Type)

Normally when good engineering controls are used, no respiratory protection is needed. However, if cured product is abraded by sanding or grinding use a NIOSH approved air-purifying respirator. Where risk assessment shows air-purifying respirators are appropriate use a dust mask type N95 (US) or type P1 (EN 143) respirator. A NIOSH/MSHA approved air purifying respirator with an organic vapor cartridge or canister may be permissible under certain circumstances where airborne concentrations are expected to exceed exposure limits. Protection provided by air purifying respirators is limited. Use a positive pressure air supplied respirator if there is any potential for an uncontrolled release, exposure levels are not known, or any other circumstances where air purifying respirators may not provide adequate protection.

#### Eye Protection

Safety glasses, or goggles.

#### Protective Gloves

Nitrile rubber and Neoprene are recommended.

#### Other Protective Clothing

Where splashing is possible, full chemically resistant protective clothing, safety glasses or face shield and boots are required.

## 9 Physical and chemical properties

### Physical and chemical properties

|   |                 |
|---|-----------------|
| <b>Physical States:</b>                       | Liquid          |
| <b>ODOR:</b>                                  | Slight Amine    |
| <b>Melting Point:</b>                         | NE              |
| <b>Boiling Point:</b>                         | NE              |
| <b>Decomposition Temperature:</b>             | NE              |
| <b>Autoignition Pt:</b>                       | No Data         |
| <b>Flash Pt:</b>                              | >200°C          |
| <b>Explosive Limits:</b>                      | LEL: NE UEL: NE |
| <b>Specific Gravity (Water = 1): Density:</b> | 1.35            |
| <b>Vapor Pressure (vs. Air or mm Hg):</b>     | 11.26 lb/gal    |
| <b>Vapor Density (vs. Air = 1):</b>           | NE              |
| <b>Evaporation Rate:</b>                      | NE              |
| <b>Solubility in Water:</b>                   | NP              |
| <b>Percent Volatile:</b>                      | 0% by Volume    |

## 10 Stability and reactivity

### Reactivity

Avoid: acids, alkalis, oxidizing agents.

### Chemical stability

Will not undergo hazardous polymerization in normal storage conditions.

### Possibility of hazardous reactions

Will Not Occur

### Incompatible materials

Avoid strong acids, bases, and oxidizing agents. Avoid contact with amines.

### Hazardous decomposition products

Thermal decomposition may produce smoke, carbon monoxide, carbon dioxide, and phenolics.

## 11 Toxicological information

### Toxicological (health) effects

Contains: Phenol-Formaldehyde Polymer (28064-14-4)

Oral LD50 >2000 mg/kg Species:Rat/ adult

Dermal LD50>2000 mg/kg Species:Rabbit/ adult.

### Information on the likely routes of exposure

Skin - Irritating to eyes.

Eyes - Irritating

### Symptoms related to the physical, chemical and toxicological characteristics

Skin Irritation. Irritating to eyes. Species: Rabbit.

### Delayed and immediate effects and also chronic effects from short and long term exposure

No Data Available

## 12 Ecological information

### Persistence and degradability

Not readily biodegradable.

### Bioaccumulative potential

No data available.

### Mobility in soil

Not Reported, unknown.

### Other adverse effects

Avoid release to the environment. May be hazardous to the environment if released in large quantities.

## 13 Disposal considerations

### Disposal methods

Incinerate or dispose of unused material, residues and containers in a licensed facility in accordance with all applicable local, state and federal regulations. Do not discharge substance/product into sewage system.

## 14 Transport information

### UN Number

UN3082

### UN Proper Shipping Name

(Non-Bulk) Not Regulated.

(Bulk) Environmentally hazardous substance, liquid, n.o.s. (EPOXY NOVOLAC RESIN) MARINE POLLUTANT.

NOTE: Marine Pollutants - DOT requirements specific to Marine Pollutants do not apply to non-bulk packagings transported by motor vehicles, rail cars or aircraft.

### Transport hazard class(es)

CLASS 9

### Packing group, if applicable

III

### Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

#### DOT / AIR TRANSPORT (ICAO/IATA)

Marine Pollutants - DOT requirements specific to Marine Pollutants do not apply to non-bulk packagings transported by motor vehicles, rail cars or aircraft.

#### MARINE TRANSPORT (IMDG/IMO)

##### IMDG/IMO Shipping Name

Environmentally hazardous substance, liquid, n.o.s. (EPOXY NOVOLAC RESIN) MARINE POLLUTANT.

Note: The presence of a shipping description for a particular mode of transport(ocean, air, etc.), does not indicate that the product is packaged suitably for that mode of transport. Shipment compliance is the responsibility of the person offering the product for transport.

**IMDG EMS Number:** FA,SF

**Marine Pollutant:** Yes

## 15 Regulatory information

### Safety, health and environmental regulations specific for the product in question

| Hazardous Components          | CAS # Sec.  | 302 (EHS) | Sec.304 RQ | Sec.313 (TRI) | Sec.110 |
|-------------------------------|-------------|-----------|------------|---------------|---------|
| Phenol-Formaldehyde Polymer   | 28064-14-4  | No        | No         | No            | No      |
| Talcum                        | 14807-96-6  | No        | No         | No            | No      |
| Benzenemethanol               | 100-51-6    | No        | No         | No            | No      |
| Phenol, 4-nonyl-, branched    | 84852-15-3  | No        | No         | No            | No      |
| Silica, amorphous treated     | 112945-52-5 | No        | No         | No            | No      |
| Titanium dioxide              | 13463-67-7  | No        | No         | No            | No      |
| C.I. Pigment Yellow 42        | 51274-00-1  | No        | No         | No            | No      |
| Iron oxide (Fe2O3)            | 1309-37-1   | No        | No         | No            | No      |
| Carbon black                  | 1333-86-4   | No        | No         | No            | No      |
| Bisphenol-a based epoxy resin | 25068-38-6  | No        | No         | No            | No      |

## 16 Other information

### Other information

#### Abbreviations:

CA=CIRCA NA=NOT AVAILABLE NE=NOT ESTABLISHED NR=NOT REGULATED

NP= NOT APPLICABLE PR=PROPRIETARY TS=TRADE SECRET ?=UNKNOWN.

#### Disclaimer:

Some of the information presented and conclusions drawn herein are from sources other than direct test data on the product itself. The information in this SDS was obtained from sources which we believe are reliable. However, the information is provided without any warranty, express or implied, regarding its correctness. The conditions or methods of handling, storage, use and disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product. If the product is used as a component in another product other than that provided by Lava-Liner, Ltd. this SDS information may not be applicable. This SDS has been prepared in accordance with the requirements of the OSHA Hazard Communication Standard (29 CFR 1910.1200).



## 1 Identification

### GHS Product Identifier

EP 990 HS Part B

### Other means of identification

Epoxy Hardener for Novolac Epoxy - Part B

### Recommended use of the chemical and restriction on use

Chemical RESistant High Solids Epoxy  
Component Product. Must be used with Part A to complete reaction for urethane formation.  
See Technical Data Sheet from Manufacturer for Chemical Properties.

### Supplier's details

Lava-Liner, Ltd.  
1550 G Tiburon Blvd. Suite 418  
Tiburon, CA 94920  
Ph. 415-829-9114 Fax: 415-829-9203  
www.lava-liner.com

### Emergency phone number

Chemtrec 800-424-9300

## 2 Hazard(s) identification

### Classification of the substance or mixture

| Classification                    | Category    | GHS Hazard Phrase                                    |
|-----------------------------------|-------------|--|
| Skin Sensitization                | Category 1A | May cause an allergic skin reaction                  |
| Skin Corrosion/Irritation         | Category 1B | Causes severe skin burns and eye damage              |
| Serious Eye Damage/Eye Irritation | Category 1  | Causes serious eye damage                            |
| Acute Toxicity: Oral              | Category 4  | Harmful if swallowed                                 |
| Toxic To Reproduction,            | Category 2  | Suspected of damaging fertility or the unborn child  |
| Aquatic Toxicity (Acute),         | Category 1  | Very toxic to aquatic life                           |
| Aquatic Toxicity (Chronic),       | Category 1  | Very toxic to aquatic life with long lasting effects |

### GHS label elements

Danger



Harmful if swallowed

Causes severe skin burns and eye damage

May cause an allergic skin reaction

Causes serious eye damage

Suspected of damaging fertility. Suspected of damaging the unborn child.



Very toxic to aquatic life

Very toxic to aquatic life with long lasting effects

Do not handle until all safety precautions have been read and understood.

Avoid breathing dust/fume/gas/mist/vapours/spray.

Avoid release to the environment.

Wear protective gloves/protective clothing/eye protection/face protection.

Use personal protective equipment as required.

IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

IF ON SKIN: Wash with plenty of water/soap

IF INHALED: Remove person to fresh air and keep comfortable for breathing.

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

IF exposed or concerned: Get medical advice/ attention.

Get medical advice/attention if you feel unwell.

Take off immediately all contaminated clothing.

Take off contaminated clothing and wash it before reuse.

Collect spillage.

Dispose of contents/container to local, state and federal authority requirements.

### Other hazards which do not result in classification

**Inhalation:** Vapors are irritating to the respiratory system, may cause throat pain and cough.

**Ingestion:** Harmful if swallowed. This product may produce corrosive damage to the gastrointestinal tract if it is swallowed. Ingestion may produce burns to the lips, oral cavity, upper airway, esophagus and possibly the digestive tract.

## 3 Composition/information on ingredients

| Description   | CAS Number  | EINECS Number | %       | Note |
|---|-------------|---------------|---------|------|
| Benzyl Alcohol                                      | 100-51-6    |               | 25 - 35 |      |
| Formaldehyde, polymer with benzenamine,hydrogenated | 135108-88-2 |               | 25 - 35 |      |
| Nonylphenol   | 84852-15-3  |               | 10 - 20 |      |
| Aliphatic Amine                                     |             |               | 1 - 5   |      |
| DIETHYLENETRIAMINE(DETA)                            | 111-40-0    |               | 1 - 5   |      |
| Cyclohexylamine, 4,4'-methylenebis-                 | 1761-71-3   |               | 1 - 5   |      |
| Organic Acid  |             |               | 1 - 5   |      |
| PHENOL, 4,4'-(1-METHYLETHYLIDENE)BIS-               | 80-05-7     |               | 1 - 5   |      |
| 2,4,6-tris(dimethylaminomethyl)phenol               | 90-72-2     |               | 1 - 5   |      |

## 4 First-aid measures

### Description of necessary first-aid measures

#### In Case of Inhalation

If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. If experiencing respiratory symptoms: Get medical attention immediately.

#### In Case of Skin Contact

In case of contact, immediately wash skin with soap and copious amounts of water. Remove contaminated clothing and shoes. Get medical attention if irritation develops or persists.

#### **In Case of Eye Contact**

In case of contact with eyes, flush with copious amounts of water for at least 15 minutes. Assure adequate flushing by separating the eyelids with fingers. Get medical attention immediately.

#### **In Case of Ingestion**

If swallowed, wash out mouth with water provided person is conscious. Do not induce vomiting. Never induce vomiting or give anything by mouth if the victim is unconscious or having convulsions. Get medical attention immediately.

#### **Most important symptoms/effects, acute and delayed**

**Eyes:** Symptoms may include discomfort or pain, excess blinking and tear production, with marked redness and swelling of the conjunctiva.

**Skin:** Can cause severe skin burns. Symptoms may include redness, edema, drying, defatting and cracking of the skin.

**Inhalation:** Vapors are irritating to the respiratory system, may cause throat pain and cough.

## **5 Fire-fighting measures**

### **Suitable extinguishing media**

#### **Suitable Extinguishing Media**

CO2, dry chemical, dry sand, alcohol-resistant foam.

#### **Unsuitable Extinguishing Media**

Do not use a direct water stream, which may spread fire.

### **Specific hazards arising from the chemical**

In a fire, product may produce the following: Carbon monoxide, Aldehydes. Carbon dioxide, Nitrogen oxides, Fire may produce irritating, corrosive and/or toxic gases.

### **Special protective actions for fire-fighters**

Protective Equipment: Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes.

## **6 Accidental release measures**

### **Personal precautions, protective equipment and emergency procedures**

Wear respirator, chemical safety goggles, rubber boots, and heavy rubber gloves. Where splashing is possible, full chemically resistant protective clothing, and boots are required.

### **Environmental precautions**

Prevent entry into waterways, sewers, basements or confined areas.

### **Methods and materials for containment and cleaning up**

PROCEDURE TO BE FOLLOWED IN CASE OF LEAK OR SPILL.

Absorb with sand or vermiculite and place in closed containers for disposal. Ventilate the area.

## **7 Handling and storage**

### **Precautions for safe handling**

Avoid contact with eyes. Do not get on skin and clothing. Avoid inhalation of vapor or mist. Store in a closed container.

Provide adequate ventilation. Wear all personal protection required in section 8.

### **Conditions for safe storage, including any incompatibilities**

Keep container tightly closed in a dry and well-ventilated place. Store away from incompatible material.

## **8 Exposure controls/personal protection**

## Control parameters

| Hazardous Components                                | CAS #       | OSHA PEL | ACGIH TLV | Other Limits |
|---|-------------|----------|-----------|--------------|
| Benzenemethanol                                     | 100-51-6    | No data. | No        | No           |
| Formaldehyde, polymer with benzenamine hydrogenated | 135108-88-2 | No data. | No data.  | No data.     |
| Phenol, 4-nonyl-, branched                          | 84852-15-3  | No data. | No        | No           |
| Aliphatic Amine                                     | NA          | No data. | No        | No           |
| Diethylenetriamine                                  | 111-40-0    | No data. | 1 ppm     | No           |
| Cyclohexylamine, 4,4'-methylenebis-                 | 1761-71-3   | No data. | No        | No           |
| Organic Acid  | NA          | No data. | No        | No           |
| 4,4'-Isopropylidenediphenol                         | 80-05-7     | No data. | No        | No           |
| 2,4,6-Tris(Dimethylaminomethyl)Phenol               | 90-72-2     | No data. | No        | No           |

## Appropriate engineering controls

Good general ventilation should be sufficient to control airborne levels. Safety shower and eye bath.

## Individual protection measures

Neoprene gloves Safety glasses, or goggles. Impervious clothing. Chemical resistant boots.

Normally when good engineering controls are used, no respiratory protection is needed. However, if cured product is abraded by sanding or grinding use a NIOSH approved air-purifying respirator. Where risk assessment shows air-purifying respirators are appropriate use a dust mask type N95 (US) or type P1 (EN 143) respirator. A NIOSH/MSHA approved air purifying respirator with an organic vapor cartridge or canister may be permissible under certain circumstances where airborne concentrations are expected to exceed exposure limits. Protection provided by air purifying respirators is limited. Use a positive pressure air supplied respirator if there is any potential for an uncontrolled release, exposure levels are not known, or any other circumstances where air purifying respirators may not provide adequate protection.

## 9 Physical and chemical properties

### Physical and chemical properties

|   |  |
|---|--|
| <b>Physical States:</b>                   | Liquid, Amber Color                              |
| <b>Odor:</b>                              | Strong Amine                                     |
| <b>Melting Point:</b>                     | NE   |
| <b>Boiling Point:</b>                     | NE   |
| <b>Decomposition Temperature:</b>         | NE   |
| <b>Autoignition Pt:</b>                   | No Data  |
| <b>Flash Pt:</b>                          | > 200.00 F Method Used: Pensky-Marten Closed Cup |
| <b>Explosive Limits:</b>                  | LEL: NE UEL: NE                                  |
| <b>Specific Gravity (Water = 1):</b>      | 1.019  |
| <b>Density:</b>                           | 8.5 LB/GL  |
| <b>Vapor Pressure (vs. Air or mm Hg):</b> | NE   |
| <b>Vapor Density (vs. Air = 1):</b>       | NE   |
| <b>Evaporation Rate:</b>                  | NE   |
| <b>Solubility in Water:</b>               | No data.   |
| <b>Percent Volatile:</b>                  | N.A.   |
| <b>VOC / Volume:</b>                      | NP   |
| <b>HAP / Volume:</b>                      | NP   |
| <b>Saturated Vapor Concentration:</b>     | NE   |

## 10 Stability and reactivity

### Reactivity

Avoid: acids, Avoid uncontrolled contact with isocyanates. Avoid: Uncontrolled reactions with epoxies.

Hazardous Polymerization will not occur in normal storage conditions.

### Chemical stability

Stable under normal storage conditions.

### Conditions to avoid

Extreme temperatures.

### Incompatible materials

Avoid: acids, alkalis, oxidizing agents. Nitrous acid and other nitrosating agents.

### Hazardous decomposition products

Thermal decomposition may produce smoke, carbon monoxide, carbon dioxide, aldehydes. ammonia. Nitric Acids. Nitrogen oxides.

## 11 Toxicological information

### Toxicological (health) effects

May cause sensitization by skin contact.

Skin sensitization.

Corrosive! Damages skin and eyes.

### Symptoms related to the physical, chemical and toxicological characteristics

May cause sensitization by skin contact. May cause skin irritation or burns.

Can cause eye irritation or burns.

### Numerical measures of toxicity (such as acute toxicity estimates)

| Hazardous Components                                 | CAS #       | NTP  | IARC | ACGIH | OSHA |
|--|-------------|------|------|-------|------|
| Benzenemethanol                                      | 100-51-6    | n.a. | n.a. | n.a.  | n.a. |
| Formaldehyde, polymer with benzenamine, hydrogenated | 135108-88-2 | n.a. | n.a. | n.a.  | n.a. |
| Phenol, 4-nonyl-, branched                           | 84852-15-3  | n.a. | n.a. | n.a.  | n.a. |
| Aliphatic Amine                                      | NA          | n.a. | n.a. | n.a.  | n.a. |
| Diethylenetriamine                                   | 111-40-0    | n.a. | n.a. | n.a.  | n.a. |
| Cyclohexylamine, 4,4'-methylenebis-                  | 1761-71-3   | n.a. | n.a. | n.a.  | n.a. |
| Organic Acid   | NA          | n.a. | n.a. | n.a.  | n.a. |
| 4,4'-Isopropylidenediphenol                          | 80-05-7     | n.a. | n.a. | n.a.  | n.a. |
| 2,4,6-Tris(Dimethylaminomethyl)Phenol                | 90-72-2     | n.a. | n.a. | n.a.  | n.a. |

## 12 Ecological information

### Toxicity

Avoid release to the environment. Do not empty into drains. May be hazardous to the environment if released in large quantities.

### Persistence and degradability

No data available.

### Bioaccumulative potential

No data available.

## Mobility in soil

No Data Available

## 13 Disposal considerations

### Disposal methods

Incinerate or dispose of unused material, residues and containers in a licensed facility in accordance with all applicable local, state and federal regulations. Do not discharge substance/product into sewage system.

## 14 Transport information

### UN Number

1719

### UN Proper Shipping Name

CAUSTIC ALKALI LIQUID, N.O.S. (Contains Aliphatic Amines, Nonylphenol)  
MARINE POLLUTANT.

### Transport hazard class(es)

8 - Corrosive

### Packing group, if applicable

III

### Environmental hazards

Marine Pollutant(s): Nonylphenol.

NOTE: Marine Pollutants - DOT requirements specific to Marine Pollutants do not apply to non-bulk packagings transported by motor vehicles, rail cars or aircraft.

## 15 Regulatory information

### Safety, health and environmental regulations specific for the product in question

| Hazardous Components                                    | CAS #           | Sec.302 (EHS) | Sec. 304 | Sec.313 (TRI) | Sec.110 |
|---|-----------------|---------------|----------|---------------|---------|
| Benzenemethanol   | 100-51-         | No            | No       | No            | No      |
| Formaldehyde, polymer with<br>benzenamine, hydrogenated | 135108-88-<br>2 | No            | No       | No            | No      |
| Phenol, 4-nonyl-, branched                              | 84852-15-       | No            | No       | No            | No      |
| Aliphatic Amine   | NA              | No            | No       | No            | No      |
| Diethylenetriamine                                      | 111-40-         | No            | No       | No            | No      |
| Cyclohexylamine, 4,4'-methylenebis-                     | 1761-71-        | No            | No       | No            | No      |
| Organic Acid  | NA              | No            | No       | No            | No      |
| 4,4'-Isopropylidenediphenol                             | 80-05-7         | No            | No       | Yes           | No      |
| 2,4,6-  | 90-72-2         | No            | No       | No            | No      |

SARA Section 311/312: Acute Health Hazard.

## 16 Other information

### Other information

CA=CIRCA NA=NOT AVAILABLE NE=NOT ESTABLISHED NR=NOT REGULATED  
NP= NOT APPLICABLE PR=PROPRIETARY TS=TRADE SECRET ?=UNKNOWN.

Some of the information presented and conclusions drawn herein are from sources other than direct test data on the product itself. The information in this SDS was obtained from sources which we believe are reliable. However, the information is provided without any warranty, express or implied, regarding its correctness. The conditions or methods of handling, storage, use and disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product. If the product is used as a component in another product other than that provided by Lava-Liner, Ltd. this SDS information may not be applicable. This SDS has been prepared in accordance with the requirements of the OSHA Hazard Communication Standard (29 CFR 1910.1200).