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

1.1 Product identifier

Trade name: SIGILLANTE CEDIT EPO parte B

Article number: 14781.301., BA015.301., BA016.301., B0160.04A.

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

No further relevant information available.

Application of the preparation: Hardening agent/ Curing agent

1.3 Details of the supplier of the safety data sheet

Supplier: Florim Ceramiche S.p.A. – Via Canaletto 24, 41042 Fiorano Modenese (MO) - Italia

E-mail address of the competent person responsible for the SDS: info@florim.com; martignanim@florim.com

Informing department:

1.4 Emergency telephone number:

Florim Ceramiche S.p.A.: Tel. +(39) 0536 840111 /+(39) 0542 57323

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008

GHS05 corrosion

- Skin Corr. 1B H314 Causes severe skin burns and eye damage.
- Eye Dam. 1 H318 Causes serious eye damage.

GHS09 environment

- Aquatic Chronic 2 H411 Toxic to aquatic life with long lasting effects.

GHS07

- Acute Tox. 4 H302 Harmful if swallowed.
- Acute Tox. 4 H332 Harmful if inhaled.
- Skin Sens. 1 H317 May cause an allergic skin reaction.
2.2 Label elements

Labelling according to Regulation (EC) No 1272/2008

The product is classified and labelled according to the CLP regulation.

Hazard pictograms

- GHS05
- GHS07
- GHS09

Signal word: Danger

Hazard-determining components of labelling:
- Benzyl alcohol
- 3-aminomethyl-3,5,5-trimethylcyclohexylamine
- 1,4-Cyclohexanebis(methylamine)
- m-phenylenebis(methylamine)
- Fatty acids, C18-unsatd., dimers, oligomeric reaction products with tall-oil fatty acids and tetraethylenepentamine
- Fatty acids, C18-unsatd., dimers, oligomeric reaction products with tall-oil fatty acids and triethylenetetramine
- 3,6,9,12-tetra-azatetradecamethylenediamine
- Tetraethylenepentamine, linear, cyclic and branched
- Polietilenpoliammine, frazione trietilentetrammina
- trimethylhexane-1,6-diamine

Hazard statements
- H302+H332 Harmful if swallowed or if inhaled.
- H314 Causes severe skin burns and eye damage.
- H317 May cause an allergic skin reaction.
- H411 Toxic to aquatic life with long lasting effects.

Precautionary statements
- P260 Do not breathe vapours.
- P280 Wear protective gloves / eye protection.
- P302+P352 IF ON SKIN: Wash with plenty of water.
- P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
- P501 Dispose of contents/container in accordance with local/regional/national/ international regulations.

2.3 Other hazards

Results of PBT and vPvB assessment
- PBT: Not applicable.
- vPvB: Not applicable.
### 3.2 Mixtures

**Description:** Mixture consisting of the following components.

#### Dangerous components:

<table>
<thead>
<tr>
<th>CAS</th>
<th>EINECS</th>
<th>Index number</th>
<th>Reg.nr.</th>
<th>Component Description</th>
<th>Hazard Phrases</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>100-51-6</td>
<td>202-859-9</td>
<td>603-057-00-5</td>
<td>01-2119492630-38</td>
<td>Benzyl alcohol</td>
<td>Acute Tox. 4, H302; Acute Tox. 4, H312; Acute Tox. 4, H332; Eye Irrit. 2, H319</td>
<td>25-50%</td>
</tr>
<tr>
<td>2855-13-2</td>
<td>220-666-8</td>
<td>612-067-00-9</td>
<td>01-2119514687-32</td>
<td>3-aminomethyl-3,5,5-trimethylcyclohexylamine</td>
<td>Skin Corr. 1B, H314; Acute Tox. 4, H302; Acute Tox. 4, H312; Skin Sens. 1, H317; Aquatic Chronic 3, H412</td>
<td>10-19.9%</td>
</tr>
<tr>
<td>55934-93-5</td>
<td>259-910-3</td>
<td></td>
<td></td>
<td>[(butoxymethylethoxy)methylethoxy]propan-1-ol</td>
<td>Acute Tox. 4, H302</td>
<td>5-9.9%</td>
</tr>
<tr>
<td>2549-93-1</td>
<td>219-840-6</td>
<td></td>
<td></td>
<td>1,4-Cyclohexanbis(methylamine)</td>
<td>Skin Corr. 1B, H314; Acute Tox. 4, H312</td>
<td>5-9.9%</td>
</tr>
<tr>
<td>103758-98-1</td>
<td>500-289-8</td>
<td></td>
<td></td>
<td>Fatty acids, C18-unsatd., dimers, oligomeric reaction products with tall-oil fatty acids and tetraethylenepentamine</td>
<td>Eye Dam. 1, H318; Aquatic Chronic 2, H411; Skin Irrit. 2, H315; Skin Sens. 1, H317</td>
<td>5-9.9%</td>
</tr>
<tr>
<td>68082-29-1</td>
<td>500-191-5</td>
<td></td>
<td></td>
<td>Fatty acids, C18-unsatd., dimers, oligomeric reaction products with tall-oil fatty acids and triethylenetetramine</td>
<td>Eye Dam. 1, H318; Aquatic Chronic 2, H411; Skin Irrit. 2, H315; Skin Sens. 1, H317</td>
<td>5-9.9%</td>
</tr>
<tr>
<td>1477-55-0</td>
<td>216-032-5</td>
<td>612-064-00-2</td>
<td>01-2119480150-50</td>
<td>m-phenylenebis(methylamine)</td>
<td>Skin Corr. 1A, H314; Acute Tox. 4, H302; Acute Tox. 4, H312; Skin Sens. 1, H317; Aquatic Chronic 3, H412</td>
<td>2.5-3.9%</td>
</tr>
<tr>
<td>61788-44-1</td>
<td></td>
<td></td>
<td></td>
<td>Styrenated phenol</td>
<td>Skin Irrit. 2, H315; Eye Irrit. 2, H319</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>24938-91-8</td>
<td>253-962-0</td>
<td></td>
<td></td>
<td>Tridecyl alchol ethoxilate</td>
<td>Eye Dam. 1, H318; Acute Tox. 4, H302; Skin Irrit. 2, H315</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>4067-16-7</td>
<td>223-775-9</td>
<td>612-064-00-2</td>
<td>01-2119485826-22</td>
<td>3.6,9,12-tetra-azatetradecamethylenediamine</td>
<td>Skin Corr. 1B, H314; Aquatic Chronic 1, H410; Acute Tox. 4, H302; Skin Sens. 1, H317</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>90640-66-7</td>
<td>292-587-7</td>
<td>01-2119487290</td>
<td></td>
<td>Tetraethylenepentamine, linear, cyclic and branched</td>
<td>Skin Corr. 1B, H314; Aquatic Chronic 2, H411; Acute Tox. 4, H302; Acute Tox. 4, H312; Skin Sens. 1, H317</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>90640-67-8</td>
<td>292-588-2</td>
<td>01-2119487919-13</td>
<td></td>
<td>Polietilenpoliammine, frazione trietilenetetrammina</td>
<td>Skin Corr. 1B, H314; Eye Dam. 1, H318; Acute Tox. 4, H302; Acute Tox. 4, H312; Skin Sens. 1, H317; Aquatic Chronic 3, H412</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>69-72-7</td>
<td>200-712-3</td>
<td></td>
<td></td>
<td>Salicylic acid</td>
<td>Acute Tox. 4, H302</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>103-83-3</td>
<td>203-149-1</td>
<td>612-074-00-7</td>
<td></td>
<td>benzyldimethylamine</td>
<td>Flam. Liq. 3, H226; Skin Corr. 1B, H314; Acute Tox. 4, H302; Acute Tox. 4, H312; Acute Tox. 4, H332; Aquatic Chronic 3, H412</td>
<td>&lt;2.5%</td>
</tr>
<tr>
<td>25620-58-0</td>
<td>247-134-8</td>
<td>01-2119560598-25</td>
<td></td>
<td>trimethylhexane-1,6-diamine</td>
<td>Skin Corr. 1A, H314; Acute Tox. 4, H302; Skin Sens. 1, H317; Aquatic Chronic 3, H412</td>
<td>&lt;1%</td>
</tr>
</tbody>
</table>

**Additional information:** For the wording of the listed hazard phrases refer to section 16.
SECTION 4: First aid measures

4.1 Description of first aid measures
   General information:
   Instantly 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.
   After inhalation:
   In case of unconsciousness bring patient into stable side position for transport.
   After skin contact:
   Instantly wash with water and soap and rinse thoroughly.
   Instantly rinse with water.
   After eye contact:
   Rinse opened eye for several minutes under running water. Then consult doctor.
   After swallowing:
   Instantly call for doctor.
   Drink copious amounts of water and provide fresh air. Instantly call for doctor.

4.2 Most important symptoms and effects, both acute and delayed:
   No further relevant information available.

4.3 Indication of any immediate medical attention and special treatment needed:
   No further relevant information available.

SECTION 5: Firefighting measures

5.1 Extinguishing media
   Suitable extinguishing agents:
   CO2, extinguishing powder or water jet.
   Fight larger fires with water jet or alcohol-resistant foam.

5.2 Special hazards arising from the substance or mixture
   Formation of poisonous gases during heating or in fires.

5.3 Advice for firefighters
   Protective equipment:
   Put on breathing apparatus.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures
   Put on breathing apparatus.
   Wear protective equipment.
   Keep unprotected persons away.

6.2 Environmental precautions:
   Inform respective authorities in case product reaches water or sewage system.
   Do not allow to enter drainage system, surface or ground water.

6.3 Methods and material for containment and cleaning up:
   Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).
   Use neutralising agent.
   Dispose of contaminated material as waste according to item 13.
   Ensure adequate ventilation.

6.4 Reference to other sections
   See Section 7 for information on safe handling
   See Section 8 for information on personal protection equipment.
   See Section 13 for information on disposal.
SECTION 7: Handling and storage

7.1 Precautions for safe handling
Ensure good ventilation/exhaustion at the workplace.
Prevent formation of aerosols.

Information about protection against explosions and fires:
Keep breathing equipment ready.

7.2 Conditions for safe storage, including any incompatibilities

Storage:
Requirements to be met by storerooms and containers: No special requirements.
Information about storage in one common storage facility: Not required.

Further information about storage conditions: Keep container tightly sealed.

7.3 Specific end use(s) No further relevant information available.

SECTION 8: Exposure controls/personal protection

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

8.1 Control parameters
Components with limit values that require monitoring at the workplace:
The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

Additional information: The lists that were valid during the compilation were used as basis.

8.2 Exposure controls:
Personal protective equipment
General protective and hygienic measures
Take off immediately all contaminated clothing
Wash hands during breaks and at the end of the work.
Do not inhale gases / fumes / aerosols.
Avoid contact with the eyes.
Avoid contact with the eyes and skin.

Breathing equipment:
In case of brief exposure or low pollution use breathing filter apparatus.
In case of intensive or longer exposure use breathing apparatus that is independent of circulating air.

Protection of hands:
Protective gloves.

Material of gloves
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.

Eye protection:
Tightly sealed safety glasses.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>General Information</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Appearance:</strong></td>
</tr>
<tr>
<td>Form:</td>
</tr>
<tr>
<td>Colour:</td>
</tr>
<tr>
<td>Odour:</td>
</tr>
<tr>
<td>Odour threshold:</td>
</tr>
<tr>
<td>pH-value:</td>
</tr>
</tbody>
</table>
### SECTION 10: Stability and reactivity

#### 10.1 Reactivity
No further relevant information available.

#### 10.2 Chemical stability

**Thermal decomposition / conditions to be avoided:**
No decomposition if used according to specifications.

#### 10.3 Possibility of hazardous reactions:
No dangerous reactions known.

#### 10.4 Conditions to avoid:
No further relevant information available.

#### 10.5 Incompatible materials:
No further relevant information available.

#### 10.6 Hazardous decomposition products:
No dangerous decomposition products known

### SECTION 11: Toxicological information

#### 11.1 Information on toxicological effects

**Acute toxicity** Harmful if swallowed or if inhaled.
Primary irritant effect:

Skin corrosion/irritation:
Causes severe skin burns and eye damage.

Serious eye damage/irritation:
Causes serious eye damage.

Respiratory or skin sensitisation:
May cause an allergic skin reaction.

CMR effects (carcinogenity, mutagenicity and toxicity for reproduction)
Germ cell mutagenicity
Based on available data, the classification criteria are not met.

Carcinogenicity
Based on available data, the classification criteria are not met.

Reproductive toxicity
Based on available data, the classification criteria are not met.

STOT-single exposure
Based on available data, the classification criteria are not met.

STOT-repeated exposure
Based on available data, the classification criteria are not met.

Aspiration hazard
Based on available data, the classification criteria are not met.

LD/LC50 values that are relevant for classification:

<table>
<thead>
<tr>
<th>ATE (Acute Toxicity Estimates)</th>
<th>Oral</th>
<th>Dermal</th>
<th>Inhalative</th>
</tr>
</thead>
<tbody>
<tr>
<td>LD50</td>
<td>1.477 mg/kg</td>
<td>3.653 mg/kg</td>
<td>&gt;10.7 mg/l</td>
</tr>
<tr>
<td>LD50</td>
<td>1.230 mg/kg (rat)</td>
<td>2.000 mg/kg (rbt)</td>
<td>&gt;4.1 mg/l (mouse)</td>
</tr>
<tr>
<td>LC50/4 h</td>
<td>&gt;10.7 mg/l</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

1 00-51-6 Benzyl alcohol

Oral | Dermal | Inhalative | LD50 | LD50 | LC50/4 h |
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1.230 mg/kg (rat)</td>
<td>2.000 mg/kg (rbt)</td>
<td>&gt;4.1 mg/l (mouse)</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

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

Oral | Dermal | Inhalative | LD50 | LD50 |
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1.030 mg/kg (mouse)</td>
<td>3.101 mg/kg (mouse)</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

4067-16-7 3,6,9,12-tetra-azatetradecamethylene diamine

Oral | LD50 |
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1.600 mg/kg (mouse)</td>
<td></td>
</tr>
</tbody>
</table>

12.1 Toxicity
Aquatic toxicity: No further relevant information available.

12.2 Persistence and degradability No further relevant information available.

12.3 Bioaccumulative potential No further relevant information available.

12.4 Mobility in soil No further relevant information available.

Ecotoxic effects:
Remark: Toxic for fish.

General notes:
Do not allow product to reach ground water, water bodies or sewage system, even in small quantities. Must not reach sewage water or drainage ditch undiluted or unneutralised. Danger to drinking water if even extremely small quantities leak into soil. Also poisonous for fish and plankton in water bodies. Toxic for aquatic organisms

12.5 Results of PBT and vPvB assessment
PBT: Not applicable.

vPvB: Not applicable.

12.6 Other adverse effects No further relevant information available.
### SECTION 13: Disposal considerations

13.1 Waste treatment methods

**Recommendation:** Must not be disposed of together with household garbage.
Do not allow product to reach sewage system.

**Uncleaned packagings:**

**Recommendation:** Disposal must be made according to official regulations.

### SECTION 14: Transport information

<table>
<thead>
<tr>
<th>14.1 UN-Number</th>
<th>UN2735 AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine), ENVIRONMENTALLY HAZARDOUS</th>
</tr>
</thead>
<tbody>
<tr>
<td>14.2 UN proper shipping name</td>
<td>ADR: AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine), MARINE POLLUTANT AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine)</td>
</tr>
<tr>
<td></td>
<td>IMDG: AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine), MARINE POLLUTANT AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine)</td>
</tr>
<tr>
<td></td>
<td>IATA: AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine), MARINE POLLUTANT AMINES, LIQUID, CORROSIVE, N.O.S. (m-phenylenebis(methylamine), 3-aminomethyl-3,5,5-trimethylcyclohexylamine)</td>
</tr>
<tr>
<td>14.3 Transport hazard class(es)</td>
<td>ADR, IMDG Class 8 Corrosive substances. Label 8</td>
</tr>
<tr>
<td></td>
<td>IATA Class 8 Corrosive substances. Label 8</td>
</tr>
<tr>
<td>14.4 Packing group</td>
<td>ADR, IMDG, IATA II</td>
</tr>
<tr>
<td>14.5 Environmental hazards:</td>
<td>Marine pollutant: Symbol (fish and tree) Special marking (ADR): Symbol (fish and tree)</td>
</tr>
</tbody>
</table>
14.7 Transport in bulk according to Annex II of Marpol and the IBC Code

<table>
<thead>
<tr>
<th>Transport/Additional information:</th>
<th>Not applicable.</th>
</tr>
</thead>
<tbody>
<tr>
<td>ADR</td>
<td></td>
</tr>
<tr>
<td>Limited quantities (LQ)</td>
<td>1L Code: E2</td>
</tr>
<tr>
<td>Excluded quantities (EQ)</td>
<td>Maximum net quantity per inner packaging: 30 ml</td>
</tr>
<tr>
<td></td>
<td>Maximum net quantity per outer packaging: 500 ml</td>
</tr>
<tr>
<td>Transport category</td>
<td>2</td>
</tr>
<tr>
<td>Tunnel restriction code</td>
<td>E</td>
</tr>
<tr>
<td>IMDG</td>
<td>1L Code: E2</td>
</tr>
<tr>
<td>Limited quantities (LQ)</td>
<td>Maximum net quantity per inner packaging: 30 ml</td>
</tr>
<tr>
<td>Excluded quantities (EQ)</td>
<td>Maximum net quantity per outer packaging: 500 ml</td>
</tr>
<tr>
<td>UN &quot;Model Regulation&quot;:</td>
<td>UN 2735 AMINES, LIQUID, CORROSIVE, N.O.S.</td>
</tr>
<tr>
<td></td>
<td>(M-PHENYLENEBIS (METHYLAMINE), 3-AMINOMETHYL -3,5,5 -TRIMETHYLCYCLOHEXYLAMINE), 8, I I,</td>
</tr>
<tr>
<td></td>
<td>ENVIRONMENTALLY HAZARDOUS</td>
</tr>
</tbody>
</table>

### SECTION 15: Regulatory information

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

**Directive 2012/18/EU**

*Named dangerous substances - ANNEX I* None of the ingredients is listed.

*Seveso category* E2 Hazardous to the Aquatic Environment

*Qualifying quantity (tonnes) for the application of lower-tier requirements* 200 t

*Qualifying quantity (tonnes) for the application of upper-tier requirements* 500 t

**REGULATION (EC) No 1907/2006 ANNEX XVII**

*Conditions of restriction: 3*

**National regulations:**

The product is subject to classification in accordance with the prevailing version of the regulations on hazardous materials.

**Additional classification according to Decree on Hazardous Materials, Annex II:**

**Water hazard class:**

Water danger class 3 (Self-assessment): extremely hazardous for water.

15.2 **Chemical safety assessment:**

A Chemical Safety Assessment has not been carried out.

### SECTION 16: Other information

**Relevant phrases**

H226 Flammable liquid and vapour.

H302 Harmful if swallowed.

H312 Harmful in contact with skin.

H314 Causes severe skin burns and eye damage.

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.

H318 Causes serious eye damage.

H319 Causes serious eye irritation.

H332 Harmful if inhaled.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects.

H411 Toxic to aquatic life with long lasting effects.

H412 Harmful to aquatic life with long lasting effects.
**Others regulations:**
The safety data sheet has been drawn up in accordance with European directives 1999/45/EC, 2001/58/EC, 2001/59/EC and 2001/60/EC.

**Abbreviations and acronyms:**
ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)
IMDG: International Maritime Code for Dangerous Goods
IATA: International Air Transport Association
GHS: Globally Harmonised System of Classification and Labelling of Chemicals
EINECS: European Inventory of Existing Commercial Chemical Substances
ELINCS: European List of Notified Chemical Substances
CAS: Chemical Abstracts Service (division of the American Chemical Society)
LC50: Lethal concentration, 50 percent
LD50: Lethal dose, 50 percent
PBT: Persistent, Bioaccumulative and Toxic
vPvB: very Persistent and very Bioaccumulative
Flam. Liq. 3: Flammable liquids – Category 3
Acute Tox. 4: Acute toxicity – Category 4
Skin Corr. 1A: Skin corrosion/irritation – Category 1A
Skin Corr. 1B: Skin corrosion/irritation – Category 1B
Skin Irrit. 2: Skin corrosion/irritation – Category 2
Eye Dam. 1: Serious eye damage/eye irritation – Category 1
Eye Irrit. 2: Serious eye damage/eye irritation – Category 2
Skin Sens. 1: Skin sensitisation – Category 1
Aquatic Acute 1: Hazardous to the aquatic environment - acute aquatic hazard – Category 1