

# SAFETY DATA SHEET

SDS No. 36A-IRL

according to Regulation (EC)
No. 1907/2006 as amended
Version 1 Revision Date 11/16/2017

# Section 1 - Identification of the substance/mixture and of the company/undertaking

1.1 Product Identifier

Trade Name: EpoxAcast® 690 Part A

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

General Use: Formulated Epoxy Resin

Restrictions on Use: None known

1.3 Details of the supplier of the safety data sheet:

Company: Smooth-On, Inc.,

5600 Lower Macungie Rd., Macungie, PA 18062

Telephone: Phone (610) 252-5800

E-mail address of person: Visit our website at <a href="https://www.smooth-on.com">www.smooth-on.com</a> or email

responsible for the SDS sds@smooth-on.com

1.4 Emergency Contact: Chem-Tel Domestic: 800-255-3924 International: 813-248-0585

National Poisons Information Center (NPIC) in Ireland

Tel: +353 1 8092566, email: npicdublin@beaumont.ie, website: www.poisons.ie

# Section 2 – Hazard(s) Identification

#### 2.1 Classification of the substance or mixture:

# Classification (REGULATION (EC) No 1272/2008) as amended

H315 Skin irritation – Category 2

H317 Skin sensitization – Category 1

**H319** Eye irritation – Category 2

For the full text of the H-Statements mentioned in this Section, see Section 16

# 2.2 Label elements, including precautionary statements

#### Labelling (REGULATION (EC) No 1272/2008) as amended

Pictogram(s):

Signal word: Warning

**Health Hazards** 

H315 Causes skin irritation

H317 May cause an allergic skin reaction

H319 Causes serious eye irritation

#### **Precautionary statements**

P302 + P352	IF ON SKIN: Wash with plenty of soap and 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.
P333 + P313	If skin irritation or rash occurs: Get medical advice/attention.
P337 + P313	If eye irritation persists: Get medical advice/attention.
P362 + P364	Take off contaminated clothing and wash it before reuse.
P501	Dispose of contents/container according to local, state and federal laws.

#### **Supplemental Hazard Statement**

None

#### 2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

# Section 3 - Composition / Information on Ingredients

#### 3.1 Substances/Mixtures

Hazardous ingredients according to Regulation (EC) No 1272/2008

Chemical name		Classification	Concentration
Propane, 2,z-bislp-(z,3-epoxypropoxy)phenyll-, polymers			
CAS-No.	25085-99-8	Skin Irrit. 2; Skin Sens. 1; Eye	80 – 90%
		Irrit. 2; H315, H317, H319	
Benzyl Alcohol			
CAS-No.	100-51-6	Acute Tox. 4; Eye Irrit. 2;	10 – 20%
EC-No.	202-859-9	H302, H332, H319	
Index-No.	603-057-00-5		

For the full text of the H-Statements mentioned in this Section, see Section 16.

# **Section 4 - First Aid Measures**

#### 4.1 Description of first aid measures

#### Inhalation

Remove source(s) of contamination and move victim to fresh air. If breathing has stopped, give artificial respiration, then oxygen if needed. Contact physician immediately.

#### **Eye Contact**

Flush eyes with plenty of water. If irritation persists, seek medical attention.

#### **Skin Contact**

In case of skin contact, wash thoroughly with soap and water.

#### Ingestion

Do not induce vomiting unless instructed by a physician. Never give anything by mouth to an unconscious person.

#### 4.2 Most important symptoms and effects, both acute and delayed

None known.

# 4.3 Indication of any immediate medical attention and specific treatment needed None known.

## **Section 5 - Fire-Fighting Measures**

### 5.1 Extinguishing Media

Water Fog, Dry Chemical, and Carbon Dioxide Foam

# 5.2 Special hazards arising from the substance or mixture

During a fire, smoke may contain the original material in addition to combustion products of varying composition which may be toxic and/or irritating. Combustion products may include and are not limited to: Phenolics. Carbon monoxide. Carbon dioxide.

# 5.3 Advice for firefighters

Use water spray to cool fire-exposed surfaces and to protect personnel. Shut off "fuel" to fire. If a leak or spill has not ignited, use water spray to disperse the vapors. Either allow fire to burn under controlled conditions or extinguish with foam or dry chemical. Try to cover liquid spills with foam. Because fire may produce toxic thermal decomposition products, wear a self-contained breathing apparatus (SCBA) with a full-face piece operated in pressure demand or positive-pressure mode.

#### **Section 6 - Accidental Release Measures**

# 6.1 Personal precautions, protective equipment and emergency procedures

Only properly protected personnel should remain in the spill area; dike and contain spill. Stop or reduce discharge if it can be done safely.

#### 6.2 Environmental precautions

Stop spill/release if it can be done safely. Prevent spilled material from entering sewers, storm drains or unauthorized drainage systems and natural waterways by using sand, earth, or other appropriate barriers. No special environmental precautions required.

#### 6.3 Methods and material for containment and cleaning up

Put on appropriate protective gear including approved self-contained breathing apparatus, rubber boots and heavy rubber gloves. Dike and contain spill; absorb or scrape up excess into suitable container for disposal; wash area with dilute ammonia solution. Stop or reduce discharge if it can be done safely.

#### 6.4 Reference to other sections

See Section 3 for list of Hazardous Ingredients; Sections 8 for Exposure Controls; and Section 13 for Disposal.

#### Section 7 - Handling and Storage

## 7.1 Precautions for safe handling

Use good general housekeeping procedures. Wash hands after use. Do not get in eyes, on skin or on clothing. Do not breathe vapors or mists. Use good personal hygiene practices.

# 7.2 Conditions for safe storage, including any incompatibilities

Keep container(s) tightly closed and properly labeled. Store in cool, dry, well ventilated place away from heat, direct sunlight, strong oxidizers and any incompatibles. Store in approved containers and protect against physical damage. Keep containers securely sealed when not in use. Indoor storage should meet local standards and appropriate fire codes. Containers that have been opened must be carefully resealed to prevent leakage.

Empty containers retain residue and may be dangerous. Avoid water contamination.

#### 7.3 Specific end use(s)

These precautions are for room temperature handling. Other uses including elevated temperatures or aerosol/spray applications may require added precautions.

# Section 8 - Exposure Controls / Personal Protection

#### 8.1 Control parameters

Contains no substances with occupational exposure limit values.

## 8.2 Exposure controls

#### **Engineering measures**

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

# Personal protective equipment

## Eye protection

Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

#### Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

The selected protective gloves must satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

#### Skin and body protection

Complete suit protecting against chemicals. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

#### Respiratory protection

Where risk assessment shows air-purifying respirators are appropriate use a full-face respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

## **Protective measures**

Ensure that eye flushing systems and safety showers are located close to the working place.

## **Section 9 - Physical and Chemical Properties**

## 9.1 Information on basic physical and chemical properties:

Appearance:	Viscous liquid	Vapor pressure:	No data
Odor:	Mild	Vapor density (Air=1):	No data
Odor threshold:	No data	Relative density:	No data
pH:	No data	Solubility in water:	Insoluble
		Partition coefficient	
Melting / freezing point:	No data	(n-octanol/water):	No data
		Auto-ignition	
Low / high boiling point:	No data	temperature:	No data
		Decomposition	
Flash Point:	>150°C	temperature:	No data
Evaporation rate:	No data	Viscosity:	5,000 – 20,000 centipoise
Flammability (solid, gas):	No data	Explosive properties:	No data
Upper/lower flammability		Specific Gravity	
or explosive limits:	No data	(H2O=1, at 4 °C):	1.0 - 1.2

# Section 10 - Stability and Reactivity

# 10.1 Reactivity

No hazardous reactions if stored and handled as prescribed/indicated. No corrosive effect on metal. Not fire propagating.

# 10.2 Chemical stability

These products are stable at room temperature in closed containers under normal storage and handling conditions.

## 10.3 Possibility of hazardous reactions

Hazardous polymerization cannot occur

#### 10.4 Conditions to avoid

None known.

#### 10.5 Incompatible materials

Strong bases and acids

## 10.6 Hazardous decomposition products

Decomposition products depend upon temperature, air supply and the presence of other materials. Gases are released during decomposition. Uncontrolled exothermic reaction of epoxy resins release phenolics, carbon monoxide, and water.

# Section 11- Toxicological Information

## 11.1 Information on toxicological effects

# **Acute Toxicity**

# **Acute oral toxicity**

Very low toxicity if swallowed. Harmful effects not anticipated from swallowing small amounts. 1D50, Rat, >'15,000 mg/kg

#### **Acute dermal toxicity**

Prolonged skin contact is unlikely to result in absorption of harmful amounts.

LD50, Rabbit, 23,000 mg/kg

#### Acute inhalation toxicity

At room temperature, exposure to vapor is minimal due to low volatility. Vapor from heated material, mist or aerosols may cause respiratory irritation.

The LC50 has not been determined.

#### Skin Corrosion/Irritation

Prolonged contact may cause skin irritation with local redness.

Repeated contact may cause skin irritation with local redness.

# **Serious Eye Damage/Irritation**

May cause eye irritation.

Corneal injury is unlikely.

#### **Respiratory/Skin Sensitization**

For similar material(s):

Has caused allergic skin reactions in humans.

Has demonstrated the potential for contact allergy in mice.

For respiratory sensitization:

No relevant data found.

## **Germ Cell Mutagenicity**

No data available

#### Carcinogenicity

No component of this product at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by IARC, NTP, or OSHA.

#### **Reproductive Toxicity**

No data available

## **Specific Target Organ Toxicity – Single Exposure**

No data available

#### Specific Target Organ Toxicity - Repeated Exposure

Except for skin sensitization, repeated exposures to low molecular weight epoxy resins of this type re not anticipated to cause any significant adverse effects.

#### **Aspiration Hazard**

No data available

#### Potential Health Effects - Miscellaneous

No data available

# **Section 12 - Ecological Information**

#### 12.1 Toxicity

#### Acute toxicity to fish

Material is moderately toxic to aquatic organisms on an acute basis (LC50/EC50 between 1 and 10 mg/L in the most sensitive species tested).

LC50, Oncorhynchus mykiss (rainbow trout), semi-static test, 96 Hour, 2 mg/l

#### Acute toxicity to aquatic invertebrates

EC50, Daphnia magna (Water flea), static test, 48 Hour, 1.8 mg/l

# Acute toxicity to algae/aquatic plants

ErC50, Scenedesmus capricornutum (fresh water algae), static test, 72 Hour, Growth rate inhibition, 11 mg/l

#### Toxicity to bacteria

1C50, Bacteria, 1B Hour, Respiration rates. > 42.6 mg/l

#### Chronic aquatic toxicity

## Chronic toxicity to aquatic invertebrates

MATC (Maximum Acceptable Toxicant Level), Daphnia magna (Water flea), semi-static test, 21 d, number of offspring, 0.55 mg/l

### 12.2 Persistence and Degradability

Based on stringent OECD test guidelines, this material cannot be considered as readily biodegradable; however, these results do not necessarily mean that the material is not biodegradable under environmental conditions. 10-day Window: Not applicable

Biodegradation: 12 % Exposure time: 28 d

Method: OECD Test Guideline 3028 or Equivalent

Theoretical Oxygen Demand: 2.35 mg/mg Estimated.

#### **Photodegradation**

**Test Type:** Half-life (indirect photolysis)

**Sensitizer:** OH radicals

Atmospheric half-life: 1.92 Hour

Method: Estimated.

#### 12.3 Bioaccumulative Potential

Bioaccumulation: Bioconcentration potential is moderate (BCF between 100 and 3000 or

Log Pow between 3 and 5).

Partition coefficient: n octanol/water(log Pow): 3.242 at25 'C Estimated.

#### 12.4 Mobility in Soil

Potential for mobility in soil is low (Koc between 500 and 2000). Given its very low Henry's constant, volatilization from natural bodies of water or moist soil is not expected to be an important fate process. Partition coefficient(Koc): 1800 - 4400 Estimated.

#### 12.5 Results of PBT and vPvB assessment

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

#### 12.6 Other Adverse Effects

No data available

## **Section 13 - Disposal Considerations**

#### 13.1 Waste treatment methods

#### **Product**

Offer surplus and non-recyclable solutions to a licensed disposal company.

#### Contaminated packaging

Dispose of as unused product.

# **Section 14 - Transport Information**

14.1 UN number

ADR/RID: - IMDG: - IATA: -

14.2 UN proper shipping name

ADR/RID: Not dangerous goods IMDG: Not dangerous goods Not dangerous goods

14.3 Transport hazard class(es)

ADR/RID: - IMDG: - IATA: -

14.4 Packing group

ADR/RID: - IMDG: - IATA: -

14.5 Environmental hazards

ADR/RID: no IMDG Marine pollutant: no IATA: no

14.6 Special precautions for user

No data available

14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

Not applicable

## **Section 15 - Regulatory Information**

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

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

# 15.2 Chemical safety assessment

No chemical safety assessment has been carried out for this substance/mixture by the supplier.

## 16 - Other Information

#### Full text of H-Statements referred to under Sections 2 and 3.

H315 Causes skin irritation

H317 May cause an allergic skin reaction

H319 Causes serious eye irritation

#### Abbreviations and acronyms

ATE - Acute Toxicity Estimate; CLP - Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008; REACH - Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006; EINECS - European Inventory of Existing Commercial Chemical Substances ELINCS - European List of Notified Chemical Substances; CAS# - Chemical Abstract Service number; PPE - Personal Protection Equipment; Kow - octanol-water partition coefficient; DNEL - Derived No Effect Level; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); NOEC - No Observed Effect Concentration; PNEC - Predicted No Effect Concentration; RMM - Risk Management Measure; OEL - Occupational Exposure Limit; PBT - Persistent, Bioaccumulative and Toxic; vPvB - Very Persistent and Very Bioaccumulative; STOT - Specific Target Organ Toxicity; CSA - Chemical Safety Assessment; EN - European Standard; UN - United Nations; ADR - European Agreement concerning the International Carriage of Dangerous Goods by Road; IATA - International Air Transport Association; IMDG - International Maritime Dangerous Goods; RID - Regulations concerning the International Carriage of Dangerous Goods by Rail; WGK - Water Hazard Class

#### Disclaimer

The information contained in this Safety Data Sheet (SDS) is considered accurate as of the version date. However, no warranty is expressed or implied regarding the accuracy of the data. Since the use of this product is not within the control of Smooth-On Inc., it is the user's obligation to determine the suitability of the product for its intended application and assumes all risk and liability for its safe use.



# SAFETY DATA SHEET

SDS No. 36B-IRL

according to Regulation (EC)
No. 1907/2006 as amended
Version 1 Revision Date 11/16/2017

# Section 1 - Identification of the substance/mixture and of the company/undertaking

1.1 Product Identifier

Trade Name: EpoxAcast® 690 Part B

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

General Use: Formulated Epoxy Resin

Restrictions on Use: None known

1.3 Details of the supplier of the safety data sheet:

Company: Smooth-On, Inc.,

5600 Lower Macungie Rd., Macungie, PA 18062

Telephone: Phone (610) 252-5800

E-mail address of person: Visit our website at <a href="https://www.smooth-on.com">www.smooth-on.com</a> or email

responsible for the SDS sds@smooth-on.com

1.4 Emergency Contact: Chem-Tel Domestic: 800-255-3924 International: 813-248-0585

National Poisons Information Center (NPIC) in Ireland

Tel: +353 1 8092566, email: npicdublin@beaumont.ie, website: www.poisons.ie

# Section 2 – Hazard(s) Identification

2.1 Classification of the substance or mixture:

Classification (REGULATION (EC) No 1272/2008) as amended

H314 Skin corrosion – Category 1C

**H412** Chronic aquatic toxicity – Category 3

For the full text of the H-Statements mentioned in this Section, see Section 16

2.2 Label elements, including precautionary statements

Labelling (REGULATION (EC) No 1272/2008) as amended

Pictogram(s):

Signal word: Danger

**Health Hazards** 

H314 Causes severe skin burns and eye damage.
H412 Harmful to aquatic life with long lasting effects.

**Precautionary statements** 

P260 Do not breathe dust/fume/gas/mist/vapours/spray.

P264 Wash with soap and water thoroughly after handling.

P280 Wear protective gloves/ protective clothing/ eye protection/ face

protection.

P303 + P361 + P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse

skin with water/shower.

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove

contact lenses, if present and easy to do. Continue rinsing.

P310 Immediately call a POISON CENTER or doctor/ physician.

#### **Supplemental Hazard Statement**

None

#### 2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

# Section 3 - Composition / Information on Ingredients

#### 3.1 Substances/Mixtures

Hazardous ingredients according to Regulation (EC) No 1272/2008

Chemical name	Classification	Concentration	
O,O'-Bis(2-aminopropyl)polypropylene glycol			
CAS-No. 9046-10-0	Skin Corr. 1C; Aquatic Chronic	60 – 100 %	
	3; H314, H412		

For the full text of the H-Statements mentioned in this Section, see Section 16.

#### Section 4 - First Aid Measures

#### 4.1 Description of first aid measures

#### Inhalation

Remove source(s) of contamination and move victim to fresh air. If breathing has stopped, give artificial respiration, then oxygen if needed. Contact physician immediately.

#### **Eye Contact**

Flush eyes with plenty of water. If irritation persists, seek medical attention.

## **Skin Contact**

In case of skin contact, wash thoroughly with soap and water.

#### Ingestion

Do not induce vomiting unless instructed by a physician. Never give anything by mouth to an unconscious person.

#### 4.2 Most important symptoms and effects, both acute and delayed

None known.

#### 4.3 Indication of any immediate medical attention and specific treatment needed

None known.

# **Section 5 - Fire-Fighting Measures**

# 5.1 Extinguishing Media

Water Fog, Dry Chemical, and Carbon Dioxide Foam

## 5.2 Special hazards arising from the substance or mixture

During a fire, smoke may contain the original material in addition to combustion products of varying composition which may be toxic and/or irritating. Combustion products may include and are not limited to: Phenolics. Carbon monoxide. Carbon dioxide.

#### 5.3 Advice for firefighters

Use water spray to cool fire-exposed surfaces and to protect personnel. Shut off "fuel" to fire. If a leak or spill has not ignited, use water spray to disperse the vapors. Either allow fire to burn under controlled conditions or extinguish with foam or dry chemical. Try to cover liquid spills with foam. Because fire may produce toxic thermal decomposition products, wear a self-contained breathing apparatus (SCBA) with a full-face piece operated in pressure demand or positive-pressure mode.

## Section 6 - Accidental Release Measures

# 6.1 Personal precautions, protective equipment and emergency procedures

Only properly protected personnel should remain in the spill area; dike and contain spill. Stop or reduce discharge if it can be done safely.

#### 6.2 Environmental precautions

Stop spill/release if it can be done safely. Prevent spilled material from entering sewers, storm drains or unauthorized drainage systems and natural waterways by using sand, earth, or other appropriate barriers. No special environmental precautions required.

## 6.3 Methods and material for containment and cleaning up

Put on appropriate protective gear including approved self-contained breathing apparatus, rubber boots and heavy rubber gloves. Dike and contain spill; absorb or scrape up excess into suitable container for disposal; wash area with dilute ammonia solution. Stop or reduce discharge if it can be done safely.

#### 6.4 Reference to other sections

See Section 3 for list of Hazardous Ingredients; Sections 8 for Exposure Controls; and Section 13 for Disposal.

## **Section 7 - Handling and Storage**

#### 7.1 Precautions for safe handling

Use good general housekeeping procedures. Wash hands after use. Do not get in eyes, on skin or on clothing. Do not breathe vapors or mists. Use good personal hygiene practices.

## 7.2 Conditions for safe storage, including any incompatibilities

Keep container(s) tightly closed and properly labeled. Store in cool, dry, well ventilated place away from heat, direct sunlight, strong oxidizers and any incompatibles. Store in approved containers and protect against physical damage. Keep containers securely sealed when not in use. Indoor storage should meet local standards and appropriate fire codes. Containers that have been opened must be carefully resealed to prevent leakage.

Empty containers retain residue and may be dangerous. Avoid water contamination.

# 7.3 Specific end use(s)

These precautions are for room temperature handling. Other uses including elevated temperatures or aerosol/spray applications may require added precautions.

# **Section 8 - Exposure Controls / Personal Protection**

#### 8.1 Control parameters

Contains no substances with occupational exposure limit values.

# 8.2 Exposure controls

#### **Engineering measures**

Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

## Personal protective equipment

#### Eye protection

Face shield and safety glasses Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

## Hand protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

The selected protective gloves must satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

#### Skin and body protection

Complete suit protecting against chemicals. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

## **Respiratory protection**

Where risk assessment shows air-purifying respirators are appropriate use a full-face respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

#### **Protective measures**

Ensure that eye flushing systems and safety showers are located close to the working place.

## **Section 9 - Physical and Chemical Properties**

## 9.1 Information on basic physical and chemical properties:

Appearance:	Colorless liquid	Vapor pressure:	1.0 mmHg @ 20°C
Odor:	Ammonia	Vapor density (Air=1):	>1
Odor threshold:	No data	Relative density:	No data
pH:	11.7 (5% w/w in water)	Solubility in water:	100 g/l @ 20°C

		Partition coefficient	
Melting / freezing point:	No data	(n-octanol/water):	1.34 (log Kow)
		Auto-ignition	
Low / high boiling point:	230°C	temperature:	230°C
		Decomposition	
Flash Point:	>128°C	temperature:	No data
Evaporation rate:	No data	Viscosity:	5 centipoise
Flammability (solid, gas):	No data	Explosive properties:	No data
Upper/lower flammability		Specific Gravity	
or explosive limits:	No data	(H2O=1, at 4 °C):	1.0 - 1.2

# Section 10 - Stability and Reactivity

# 10.1 Reactivity

No hazardous reactions if stored and handled as prescribed/indicated., No corrosive effect on metal. Not fire propagating.

## 10.2 Chemical stability

These products are stable at room temperature in closed containers under normal storage and handling conditions.

## 10.3 Possibility of hazardous reactions

Hazardous polymerization cannot occur

#### 10.4 Conditions to avoid

None known.

## 10.5 Incompatible materials

Strong bases and acids

# 10.6 Hazardous decomposition products

Decomposition products depend upon temperature, air supply and the presence of other materials. Gases are released during decomposition. Uncontrolled exothermic reaction of epoxy resins release phenolics, carbon monoxide, and water.

### **Section 11- Toxicological Information**

# 11.1 Information on toxicological effects

#### **Acute toxicity**

LD50 Oral - rat - 2,885.3 mg/kg

LC50 Inhalation - rat - 8 h - > 0.74 mg/l

LD50 Dermal - rabbit - 2,980 mg/kg

## Skin corrosion/irritation

Skin - rabbit

Result: Corrosive, category 1C - where responses occur after exposures between 1 hour and 4 hours and observations up to 14 days.

(OECD Test Guideline 404)

## Serious eye damage/eye irritation

Eyes - rabbit

Result: Corrosive to eyes (OECD Test Guideline 405)

## Respiratory or skin sensitization

no data available

# Germ cell mutagenicity

Animal testing did not show any mutagenic effects.

Result: Not mutagenic in Ames Test.

#### Carcinogenicity

IARC: No component of this product present at levels greater than or equal to 0.1% is

identified as probable, possible or confirmed human carcinogen by IARC.

## Reproductive toxicity

no data available

#### Specific target organ toxicity - single exposure

no data available

## Specific target organ toxicity - repeated exposure

no data available

# **Aspiration hazard**

no data available

#### **Additional Information**

Repeated dose toxicity - rat - Dermal - No observed adverse effect level - 250 mg/kg

Repeated dose toxicity - rat - Oral - No observed adverse effect level - 239 mg/kg

RTECS: Not available

Material is extremely destructive to tissue of the mucous membranes and upper respiratory tract, eyes, and skin., Cough, Shortness of breath, Headache, Nausea.

## **Section 12 - Ecological Information**

## 12.1 Toxicity

#### **Aquatic toxicity**

Assessment of aquatic toxicity:

Acutely harmful for aquatic organisms. The inhibition of the degradation activity of activated sludge is not anticipated when introduced to biological treatment plants in appropriate low concentrations.

#### **Toxicity to fish**

LC50 (96 h) > 15 mg/l, Oncorhynchus mykiss (OECD Guideline 203, semistatic)

The details of the toxic effect relate to the nominal concentration. Limit concentration test only (LIMIT test).

LC50 (96 h) 772.14 mg/l, Cyprinodon variegatus (OECD Guideline 203, static)

The details of the toxic effect relate to the nominal concentration.

#### **Aquatic invertebrates**

EC50 (48 h) 80 mg/l, Daphnia magna (OECD Guideline 202, part 1, static)

The details of the toxic effect relate to the nominal concentration.

EC50 (48 h) 418.34 mg/l, Arcatia tonsa (Daphnia test acute, static)

The details of the toxic effect relate to the nominal concentration.

## **Aquatic plants**

EC50 (72 h) 15 mg/l (growth rate), Pseudokirchneriella subcapitata (OECD Guideline 201, static) The details of the toxic effect relate to the nominal concentration.

EC10 (72 h) 1.4 mg/l (growth rate), Pseudokirchneriella subcapitata (OECD Guideline 201, static) The details of the toxic effect relate to the nominal concentration.

EC50 (72 h) 141.72 mg/l, Skeletonema costatum (ISO/DIS 10253, static)

The details of the toxic effect relate to the nominal concentration.

No observed effect concentration (72 h) 100 mg/l, Skeletonema costatum (ISO/DIS 10253, static)

The details of the toxic effect relate to the nominal concentration.

## Chronic toxicity to fish

Study does not need to be conducted.

#### Chronic toxicity to aquatic invertebrates

Study does not need to be conducted.

#### Assessment of terrestrial toxicity

Study not necessary due to exposure considerations.

# Microorganisms/Effect on activated sludge

# Toxicity to microorganisms

OECD Guideline 209 aerobic

activated sludge of a predominantly domestic sewage/EC20 (3 h): 380 mg/l

The details of the toxic effect relate to the nominal concentration.

#### 12.2 Persistence and Degradability

Biodegradability Result: 0 % - According to the results of tests of biodegradability this product

is not readily biodegradable. (OECD Test Guideline 301B)

#### 12.3 Bioaccumulative Potential

No data available

#### 12.4 Mobility in Soil

No data available

#### 12.5 Results of PBT and vPvB assessment

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

#### 12.6 Other Adverse Effects

Harmful to aquatic life with long lasting effects.

## **Section 13 - Disposal Considerations**

#### 13.1 Waste treatment methods

#### **Product**

Offer surplus and non-recyclable solutions to a licensed disposal company.

#### Contaminated packaging

Dispose of as unused product.

# Section 14 - Transport Information

#### 14.1 UN number

ADR/RID: - 2735 IMDG: - 2735 IATA: - 2735

#### 14.2 UN proper shipping name

ADR/RID: POLYAMINES, LIQUID, CORROSIVE, N.O.S. (O,O'-Bis(2-aminopropyl)polypropylene glycol) IMDG: POLYAMINES, LIQUID, CORROSIVE, N.O.S. (O,O'-Bis(2-aminopropyl)polypropylene glycol) POLYAMINES, LIQUID, CORROSIVE, N.O.S. (O,O'-Bis(2-aminopropyl)polypropylene glycol)

#### 14.3 Transport hazard class(es)

ADR/RID: - 8 IMDG: - 8 IATA: - 8

#### 14.4 Packing group

ADR/RID: - III IMDG: - III IATA: - III

#### 14.5 Environmental hazards

ADR/RID: no IMDG Marine pollutant: no IATA: no

#### 14.6 Special precautions for user

No data available

# 14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

Not applicable

## **Section 15 - Regulatory Information**

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

This safety datasheet complies with the requirements of Regulation (EC) No. 1907/2006.

## 15.2 Chemical safety assessment

No chemical safety assessment has been carried out for this substance/mixture by the supplier.

#### 16 - Other Information

#### Full text of H-Statements referred to under Sections 2 and 3.

H314 Causes severe skin burns and eye damage.

H412 Harmful to aquatic life with long lasting effects.

### **Abbreviations and acronyms**

ATE - Acute Toxicity Estimate; CLP - Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008; REACH - Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation (EC) No 1907/2006; EINECS - European Inventory of Existing Commercial Chemical Substances ELINCS - European List of Notified Chemical Substances; CAS# - Chemical Abstract Service number; PPE - Personal Protection Equipment; Kow - octanol-water partition coefficient; DNEL - Derived No Effect Level; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); NOEC - No Observed Effect Concentration; PNEC - Predicted No Effect Concentration; RMM - Risk Management Measure; OEL - Occupational Exposure Limit; PBT - Persistent, Bioaccumulative and Toxic; vPvB - Very Persistent and Very Bioaccumulative; STOT - Specific Target Organ Toxicity; CSA - Chemical Safety Assessment; EN - European Standard; UN - United Nations; ADR - European Agreement concerning the International Carriage of Dangerous Goods by Road; IATA - International Air Transport Association; IMDG - International Maritime Dangerous Goods; RID - Regulations concerning the International Carriage of Dangerous Goods by Rail; WGK - Water Hazard Class

#### **Disclaimer**

The information contained in this Safety Data Sheet (SDS) is considered accurate as of the version date. However, no warranty is expressed or implied regarding the accuracy of the data. Since the use of this product is not within the control of Smooth-On Inc., it is the user's obligation to determine the suitability of the product for its intended application and assumes all risk and liability for its safe use.