

SAFETY DATA SHEET**Nanten HM Bio True Colors A-osa***Regulation (EU) No 1907/2006, 2015/830***SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING**

1.1	Product identifier
Trade name	Nanten HM Bio True Colors A-osa (Component A)

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

The uses of the chemical	Paints and coatings. For professional use only.
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1.3 Details of the supplier of the Safety Data Sheet

	Nanten Oy
Street address	Teollisuustie 6
Postcode and post office	04300 Tuusula, Finland
Telephone number	+358 9 274 7970
E-mail address	nanten@nanten.com
	www.nanten.com

1.4 Emergency telephone number**Poison Information Centres**

Finland (Myrkytystietokeskus): 0800 147 111 or (+358) (0)9 471 977, open 24 h/d

Estonia (Mürgistusteabekeskus): 16662 or (+372) 7943 794, www.16662.ee

Sweden (Giftinformationscentralen): 010 456 6700 or +46 10 456 6700, open 24 h/d, or 112, open 24 h/d

Emergency Response Centres (Europe): 112

SECTION 2: HAZARDS IDENTIFICATION**2.1 Classification of the substance or mixture**

Classification according to Regulation (EC) No 1272/2008 (CLP)

Skin Corr./Irrit. 2	Causes skin irritation.	H315
Skin Sens. 1	May cause an allergic skin reaction.	H317
Eye Irrit. 2	Causes serious eye irritation.	H319
Aquatic Chronic 2	Toxic to aquatic life with long lasting effects.	H411

2.2 Label elements

Signal word: Warning

Hazard Statements:

H315 - Causes skin irritation.
 H317 - May cause an allergic skin reaction.
 H319 - Causes serious eye irritation.
 H411 - Toxic to aquatic life with long lasting effects.

Precautionary Statements:

P261 - Avoid breathing dust/fume/gas/mist/vapours/spray.
 P280 - Wear protective gloves and eye protection/face 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.
 P273 - Avoid release to the environment.
 P501 - Dispose of contents and container in accordance with local, regional, national and international regulations.

Contains:

Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin (number average molecular weight \leq 700)
 Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol
 Oxirane, mono[(C12-14-alkyloxy)methyl] derivs

2.3 Other hazards

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

SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS**3.1 Substances**

This product is a mixture.

3.2 Mixtures

Substance name	CAS-, EC- or index number	REACH Registration No.	Concentration (weight-%)	Classification
Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin (number average molecular weight \leq 700)	CAS: 25068-38-6 EC: 500-033-5	01-2119456619-26	50 - 75 %	Skin Irrit. 2, H315 Skin Sens. 1, H317 Eye Irrit. 2, H319 Aquatic Chronic 2, H411
Oxirane, mono[(C12-14-alkyloxy)methyl] derivs	CAS: 68609-97-2 Ind.: 603-103-00-4	01-2119485289-22	10 - 25 %	Skin Irrit. 2, H315 Skin Sens. 1, H317
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	CAS: 9003-36-5 EC: 500-006-8	01-2119454392-40	10 - 25 %	Skin Irrit. 2, H315 Skin Sens. 1, H317 Aquatic Chronic 2, H411

SECTION 4: FIRST AID MEASURES**4.1 Description of first aid measures****Inhalation:**

IF INHALED: Remove person to fresh air and keep comfortable for breathing. Get medical attention if the person feels unwell. If not breathing, place on side position and immediately get medical attention.

Skin contact:

IF ON SKIN: Wash with plenty of water and soap. Continue rinsing for at least 10 minutes. Take off all contaminated clothing and wash before reuse. If skin irritation or rash occurs: Get medical attention.

Eye contact:

IF IN EYES: Rinse cautiously with water. Remove contact lenses, if present and easy to do. Continue rinsing for at least 10 minutes. Keep eyelids open. If eye irritation persists: Get medical advice/attention.

Recommendation: Get medical advice/attention always following eye contact.

Ingestion:

IF SWALLOWED: Call a POISON CENTER if you feel unwell. Rinse mouth with water. Do NOT induce vomiting.

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

Treat symptomatically. Immediately call a poison center if large amounts have been swallowed or inhaled.

SECTION 5: FIREFIGHTING MEASURES**5.1 Extinguishing media**

Suitable extinguishing media: powder, ABC-powder.
NOT recommended for safety reasons: strong water jet.

5.2 Special hazards arising from the substance or mixture

Burning may release carbon dioxide, carbon monoxide, halogenated compounds.

5.3 Advice for firefighters

Wear firefighter's suit conforming to standard EN469, including protective helmet, boots and gloves, and a self-contained breathing apparatus. Collect contaminated fire extinguishing water separately. Prevent entry to sewers.

SECTION 6: ACCIDENTAL RELEASE MEASURES**6.1 Personal precautions, protective equipment and emergency procedures**

Use personal protective equipment. Keep unprotected persons away.

6.2 Environmental precautions

Stop leak if safe to do so. Do not allow to enter sewers, surface water or ground water.

6.3 Methods and material for containment and cleaning up

Absorb with inert material, such as sand or vermiculite. Collect the material into an appropriate container and dispose of in accordance with regulations.

6.4 Reference to other sections

See Section 1 for contact information in case of emergency.
See Section 8 for information on personal protection equipment.
See Section 13 for information on waste treatment.

SECTION 7: HANDLING AND STORAGE**7.1 Precautions for safe handling**

Wear protective gloves and eye protection. Ensure good ventilation at workplace. Do not eat, drink or smoke when using this product. Do not breathe dust or mist.

Wash hands cautiously after handling. Take off contaminated clothing. Wash contaminated clothing before reuse.

Persons with skin sensitisation problems should avoid contact with this product.

7.2 Conditions for safe storage, including any incompatibilities

Store in well-ventilated place. Store container tightly closed. Protect from direct sunlight. Store in properly labelled containers, preferably in original containers. Do not store the product even temporarily in unlabelled vessels. Keep away from food and beverages.

Prevent spills to the ground, surface water and ground water.

Recommended storage temperature: +5...+30 °C.

7.3 Specific end use(s)

Recommendation: Follow the instructions for use.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

This list is not exhaustive. Other national/international regulations may concern the monitoring of exposure to the ingredients of this product.

DNEL (Derived No Effect Level)

Route of exposure	Workers			
	Short-term local	Short-term systemic	Long-term local	Long-term systemic
Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin				
Inhalation	not available	12,3 mg/m ³	not available	12,3 mg/m ³
Dermal	not available	8,3 mg/kg bw /d	not available	8,3 mg/kg bw /d
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol				
Inhalation	not available	not available	not available	29,39 mg/m ³
Dermal	8,3 µg/cm ²	not available	not available	104,15 mg/kg/vrk
mg/kg bw/d = mg/kg/d = mg per kg of body weight per day				

PNEC (Predicted No Effect Concentration)

	Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin	Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol
Fresh water	3 µg/l	0,003 mg/l
Marine water	0,3 µg/l	0,0003 mg/l
Sewage treatment plant	10 mg/l	10 mg/l
Fresh water sediment	0,5 mg/kg d.w.	0,294 mg/kg d.w.
Marine sediment	0,5 mg/kg d.w.	0,0294 mg/kg d.w.
Soil	not available	0,237 mg/kg d.w.
d.w. = per dry weight		

8.2 Exposure controls

Technical controls

Provide good ventilation, preferably local exhaust ventilation OR use personal respiratory protection.

Avoid getting in eyes or on skin. Wash hands cautiously before breaks and after work. Wash contaminated clothing before reuse.

Eye and face protection

Wear tight chemical splash goggles. Wear face shield when appropriate. The goggles should have a CE-marking and comply with standard EN 166.

Skin protection

Wear protective clothing. It is recommended to wear chemical protective clothing, at least such as EN13034/EN 13034+A1 certified clothing that provides a limited protection towards small quantities and splashes of liquid chemicals.

Hand protection

Wear chemical-resistant gloves complying with standard EN 374. Check during use that the gloves still retain their protective properties. Break-through times given by manufacturers are only informative. Break-through times cannot be accurately estimated for mixtures of chemical substances.

Recommended materials: butyl rubber, nitrile rubber. Recommended thickness: $\geq 0,4$ mm.

Respiratory protection

Wear personal respiratory protection if ventilation is not sufficient to prevent exposure. Recommended filter type: A/P2. Compliance with standard EN 529.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on physical and chemical properties

Appearance	Liquid. Colourless or yellowish.
Odour	characteristic
Odour threshold	not determined
pH	not measured (insoluble in water)
Melting point/freezing point	not determined
Initial boiling point and range	> 200 °C
Flash point	> 94 °C
Evaporation rate	not determined
Upper/lower flammability or explosive limits	not determined
Vapour pressure	0,3 hPa (20 °C)
Vapour density	not determined
Density	1,09 g/cm ³
Solubility	Water: not miscible or difficult to mix. Soluble in many organic solvents.
Partition coefficient: n-octanol/water	not determined
Ignition temperature	not determined
Decomposition temperature	not determined
Viscosity	250 – 400 mPa · s (25 °C)
Explosive properties	not determined
Oxidising properties	not determined

9.2 Other information

Content of organic solvents: 1,0 weight-%.

SECTION 10: STABILITY AND REACTIVITY**10.1 Reactivity**

No further relevant information available.

10.2 Chemical stability

The product is chemically stable under recommended conditions of storage, use and temperature.

10.3 Possibility of hazardous reactions

Reacts with epoxy curing agents /hardeners (Part B of a 2-component coating), producing polymeric compounds. The reaction is heat-releasing (exothermic). No hazardous reactions identified when handled and stored according to provisions.

10.4 Conditions to avoid

No specific conditions to avoid.

10.5 Incompatible materials

No further relevant information available.

10.6 Hazardous decomposition products

Hazardous decomposition products are not formed under recommended conditions of storage, use and temperature.

SECTION 11: TOXICOLOGICAL INFORMATION**11.1 Information on toxicological effects****Acute toxicity**

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

Substances:

	Test / meter	Dose / concentration	Species
Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin			
Oral	LD50	15 000 mg/kg	Rat
Dermal	LD50	23 000 mg/kg	Rabbit
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol			
Oral	LD50	> 10 000 mg/kg	Rat
Dermal	LD50	> 2 000 mg/kg	Rabbit

Skin corrosion/irritation

Causes skin irritation.

Serious eye damage/irritation

Causes serious eye irritation.

Respiratory or skin sensitisation

May cause an allergic skin reaction.

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.

Specific target organ toxicity - single exposure

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

Specific target organ toxicity – repeated exposure

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

Aspiration hazard

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

SECTION 12: ECOLOGICAL INFORMATION**12.1 Toxicity**

Species	Test/meter	Result	Exposure time
Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin			
Fish, <i>Leuciscus idus</i>	LC50	2,0 mg/l	96 h
Invertebrates, <i>Daphnia magna</i>	EC50	1,8 mg/l	48 h
Algae	EC50	11 mg/l	72 h
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol			
Fish, <i>Leuciscus idus</i>	EC50	2,54 mg/l	96 h
Invertebrates, <i>Daphnia magna</i>	LC50	2,55 mg/l	48 h

12.2 Persistence and degradability

The product is not easily biodegradable.

12.3 Bioaccumulative potential

	Log Pow	BCF	Bioaccumulation potential
Reaction product: bisphenol-A-(epichlorhydrin), epoxy resin	2,64 - 3,78	3 – 31	low
Oxirane, mono[(C12-14-alkyloxy)methyl] derivs	3,77	160	low
Formaldehyde, oligomeric reaction products with 1-chloro-2,3-epoxypropane and phenol	3,3	150	low
Log Pow: logarithmic partition coefficient n-octanol/water, BCF: Bioconcentration Factor			

12.4 Mobility in soil

No further relevant information available.

12.5 Results of PBT and vPvB assessment

No information available for the classification of substances as Persistent, Bioaccumulative and Toxic (PBT) or very Persistent and very Bioaccumulative (vPvB) compounds.

12.6 Other adverse effects

No further relevant information available.

SECTION 13: DISPOSAL CONSIDERATIONS**13.1 Waste treatment methods**

Dispose of contents and container according to Waste Framework Directive (EC) N:o 98/2008, national waste and environmental regulations and local regulations. Dispose of via licenced waste management contractor. Liquid residues must be disposed of as hazardous waste. Classify and label waste containers appropriately. Use, for example, European Waste Catalogue (EWC) n:o 08 01 11*, waste paint and varnish containing organic solvents or other hazardous substances.

Consult licenced waste management/recycling contractor on recycling and reuse of emptied containers.

SECTION 14: TRANSPORT INFORMATION**14.1 UN number**

ADR / RID: 3082
 IMDG: 3082
 ICAO / IATA: 3082

14.2 UN proper shipping name

ADR / RID: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EPOXY RESIN)
 IMDG: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EPOXY RESIN)
 ICAO / IATA: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (EPOXY RESIN)

14.3 Transport hazard class(es)

ADR / RID: 9
 IMDG: 9
 ICAO / IATA: 9

14.4 Packing group

ADR / RID: III, E, Limited Quantity 5 L
 IMDG: III, EmS-codes: F-A, S-F, Limited Quantity 5 L
 ICAO / IATA: III

14.5 Environmental hazards

IMDG marine pollutant: Yes.

14.6 Special precautions for user

Transport in sealed containers, in upright position and tightly fastened. Make sure that persons transporting the chemical have been trained for emergency and spillage situations.

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 Mixture does not contain substances subject to authorisation according to REACH [(EU) N:o 1907/2006], Annex XIV.
 This Mixture does not contain restricted substances according to REACH [(EU) N:o 1907/2006], Annex XVII.
 Content of Volatile Organic Compounds (VOC) complies with directive 2004/42/CE.

15.2 Chemical safety assessment

The product contains substances for which a Chemical Safety Assessment has not been carried out.

SECTION 16: OTHER INFORMATION**Indication of changes to previous version**

Hazard classification of the Mixture has not been changed. Information concerning substances, composition, and safety instructions has been updated.

Training advice for workers

It is recommended that persons handling this product should have at least a basic level training on occupational risk prevention, to facilitate comprehension and interpretation of this safety data sheet.

NOTE

The information provided in this safety data sheet is correct to the best of knowledge of Nanten, or it is based on sources that are considered to be reliable. However, it is the responsibility of the user to be aware of and to take into account all other information with relevance to the safe use of this product and to take the required measures to ensure safety and compliance with current regulations in handling, storing, using and disposing of this product.