

Safety data sheet

Page: 1/11

BASF Safety data sheet according to Regulation (EC) No. 1907/2006

Date / Revised: 19.07.2011

Version: 5.0

Product: **Triethanolamine Care**

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

1. Identification of the substance/mixture and of the company/undertaking

Product identifier

Triethanolamine Care

Chemical name: 2,2',2"-nitrioltriethanol

CAS Number: 102-71-6

| REACH registration number: 01-2119486482-31-0001, 01-2119486482-31-0000

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

Relevant identified uses: cosmetic ingredient

Details of the supplier of the safety data sheet

Company:
BASF SE
67056 Ludwigshafen
GERMANY

Contact address:
BASF plc
PO Box 4, Earl Road, Cheadle Hulme,
Cheadle, Cheshire
SK8 6QG, UNITED KINGDOM

Telephone: +44 161 485-6222
E-mail address: product-safety-north@basf.com

Emergency telephone number

International emergency number:
Telephone: +49 180 2273-112

2. Hazards Identification

Label elements

According to Regulation (EC) No 1272/2008 [CLP]

Globally Harmonized System, EU (GHS)

2/7/394



BASF Safety data sheet according to Regulation (EC) No. 1907/2006
Date / Revised: 19.07.2011
Product: **Triethanolamine Care**

Version: 5.0

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

The product does not require a hazard warning label in accordance with GHS criteria.

According to Directive 67/548/EEC or 1999/45/EC

The product does not require a hazard warning label in accordance with EC Directives.

Classification of the substance or mixture

According to Regulation (EC) No 1272/2008 [CLP]

No need for classification according to GHS criteria for this product.

According to Directive 67/548/EEC or 1999/45/EC

Possible Hazards:
No particular hazards known.

Other hazards

According to Regulation (EC) No 1272/2008 [CLP]

Other Hazards (GHS):
See section 12 - Results of PBT and vPvB assessment.

3. Composition/Information on Ingredients

Substances

Chemical nature

| INCI Name: Triethanolamine

2,2',2"-nitrilotriethanol

CAS Number: 102-71-6

EC-Number: 203-049-8

4. First-Aid Measures

Description of first aid measures

Remove contaminated clothing.

If inhaled:

Keep patient calm, remove to fresh air.

On skin contact:

Wash off thoroughly with ample water.

On contact with eyes:

BASF Safety data sheet according to Regulation (EC) No. 1907/2006
Date / Revised: 19.07.2011
Product: **Triethanolamine Care**

Version: 5.0

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

Wash affected eyes for at least 15 minutes under running water with eyelids held open.

On ingestion:
Rinse mouth and then drink plenty of water.

Most important symptoms and effects, both acute and delayed

Symptoms: No significant symptoms are expected due to the non-classification of the product.

Indication of any immediate medical attention and special treatment needed

Treatment: Symptomatic treatment (decontamination, vital functions).

5. Fire-Fighting Measures**Extinguishing media**

Suitable extinguishing media:
water spray, dry powder, foam, carbon dioxide

Special hazards arising from the substance or mixture

nitrogen oxides, carbon oxides

The substances/groups of substances mentioned can be released in case of fire. Under certain conditions in case of fire other hazardous combustion products may be generated.

Advice for fire-fighters

Special protective equipment:
Wear self-contained breathing apparatus and chemical-protective clothing.

Further information:

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

6. Accidental Release Measures**Personal precautions, protective equipment and emergency procedures**

Handle in accordance with good industrial hygiene and safety practice.

Environmental precautions

Do not discharge into drains/surface waters/groundwater.

Methods and material for containment and cleaning up

For large amounts: Pump off product.

For residues: Pick up with suitable absorbent material (e.g. sand, sawdust, general-purpose binder, kieselguhr). Dispose of absorbed material in accordance with regulations.

Reference to other sections

Information regarding exposure controls/personal protection and disposal considerations can be found in section 8 and 13.

7. Handling and Storage**Precautions for safe handling**

3/7/394



Ensure thorough ventilation of stores and work areas.

Protection against fire and explosion:

Prevent electrostatic charge - sources of ignition should be kept well clear - fire extinguishers should be kept handy.

Conditions for safe storage, including any incompatibilities

Segregate from acids and acid forming substances.

Suitable materials for containers: carbon steel (iron), Stainless steel 1.4401, Stainless steel 1.4301 (V2), High density polyethylene (HDPE), glass, Low density polyethylene (LDPE)

Further information on storage conditions: Protect against heat.

Storage stability:

Storage temperature: 20 - 40 °C

Storage duration: 12 Months

May discolour after lengthy storage.

From the data on storage duration in this safety data sheet no agreed statement regarding the warrantee of application properties can be deduced.

Specific end use(s)

For the relevant identified use(s) listed in Section 1 the advice mentioned in this section 7 is to be observed.

8. Exposure Controls/Personal Protection

Control parameters

PNEC

freshwater: 0.32 mg/l

marine water: 0.032 mg/l

intermittent release: 5.12 mg/l

STP: 10 mg/l

sediment (freshwater): 1.7 mg/kg

sediment (marine water): 0.17 mg/kg

soil: 0.151 mg/kg

DNEL

worker:

Long-term exposure- systemic effects, dermal: 6.3 mg/kg bw/day

worker:

Long-term exposure - systemic and local effects, Inhalation: 5 mg/m³

consumer:

Long-term exposure- systemic effects, dermal: 3.1 mg/kg bw/day

consumer:

Long-term exposure - systemic and local effects, Inhalation: 1.25 mg/m³

consumer:

Long-term exposure- systemic effects, oral: 13 mg/kg bw/day

Exposure controls

Personal protective equipment

Respiratory protection:

Respiratory protection in case of vapour/aerosol release.

Hand protection:

Chemical resistant protective gloves (EN 374)

Suitable materials also with prolonged, direct contact (Recommended: Protective index 6, corresponding > 480 minutes of permeation time according to EN 374):

e.g. nitrile rubber (0.4 mm), chloroprene rubber (0.5 mm), polyvinylchloride (0.7 mm) and other
Manufacturer's directions for use should be observed because of great diversity of types.

Supplementary note: The specifications are based on tests, literature data and information of glove manufacturers or are derived from similar substances by analogy. Due to many conditions (e.g. temperature) it must be considered, that the practical usage of a chemical-protective glove in practice may be much shorter than the permeation time determined through testing.

Eye protection:

Safety glasses with side-shields (frame goggles) (e.g. EN 166)

General safety and hygiene measures

Handle in accordance with good industrial hygiene and safety practice. Wearing of closed work clothing is required additionally to the stated personal protection equipment.

9. Physical and Chemical Properties

Information on basic physical and chemical properties

Form:	100 %(m): viscous	
Colour:	colourless to pale yellow	
Odour:	amine-like	
pH value:	10.3	
	(10 g/l, 20 °C)	
melting range:	18 - 23 °C	
Boiling point:	336.1 °C	
	(1,013 hPa)	
	The substance / product	
	decomposes.	
Flash point:	179 °C	(Unspecified, closed cup)
	Literature data.	
Flammability:	does not ignite	
Lower explosion limit:	3.6 %(V)	
Upper explosion limit:	7.2 %(V)	
Ignition temperature:	324 °C	
	Literature data.	

4/7/394



BASF Safety data sheet according to Regulation (EC) No. 1907/2006

Date / Revised: 19.07.2011

Version: 5.0

Product: **Triethanolamine Care**

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

Vapour pressure:	0.00029 hPa (20 °C) Literature data.	
Density:	1.125 g/cm ³ (20 °C)	
Solubility in water:	miscible > 1,000 g/l (20 °C)	(other)
Partitioning coefficient n-octanol/water (log K _{ow}):	-2.3 (25 °C) -2.3 (25 °C)	(OECD Guideline 107)
Self ignition:	not self-igniting	Test type: Spontaneous self-ignition at room-temperature.
Thermal decomposition:	305 °C, 580 kJ/kg Exothermic reaction above the indicated temperature.	
Viscosity, dynamic:	934 mPa.s (20 °C)	
Viscosity, kinematic:	830.2 mm ² /s (20.5 °C)	(OECD 114)
Explosion hazard:	Based on the chemical structure there is no indicating of explosive properties.	(other)
Fire promoting properties:	Based on its structural properties the product is not classified as oxidizing.	(other)

Other information

Self heating ability:	Currently, no data available	
Miscibility with water:	(20 °C) miscible in all proportions	
pK _A :	7.86 (25 °C)	(other)
Surface tension:	48.8 mN/m (25 °C; 100 % (V)) Based on chemical structure, surface activity is not to be expected.	(OECD harmonized ring method)
Grain size distribution:	Test substance	The substance / product is marketed or used in a non solid or granular form.
Molar mass:	149.19 g/mol	

10. Stability and Reactivity**Reactivity**

No hazardous reactions if stored and handled as prescribed/indicated.

BASF Safety data sheet according to Regulation (EC) No. 1907/2006

Date / Revised: 19.07.2011

Version: 5.0

Product: **Triethanolamine Care**

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

Corrosion to metals:	Corrosive effects to metal are not anticipated.
Formation of flammable gases:	Remarks: Forms no flammable gases in the presence of water.

Chemical stability

The product is stable if stored and handled as prescribed/indicated.

Possibility of hazardous reactions

Reacts with acids. Reacts with oxidizing agents. Reacts with acid chlorides. Reacts with halogenated compounds. The progress of reaction is exothermic. Incompatible with acid chlorides and acid anhydrides.

Conditions to avoid

Avoid extreme temperatures. See MSDS section 7 - Handling and storage.

Incompatible materialsSubstances to avoid:
oxidizing agents, acids, acid forming substances**Hazardous decomposition products**

No hazardous decomposition products if stored and handled as prescribed/indicated.

Hazardous decomposition products:
carbon oxides, nitrogen oxides, nitrous gases**11. Toxicological Information****Information on toxicological effects**Acute toxicityAssessment of acute toxicity:
Virtually nontoxic after a single ingestion. Virtually nontoxic after a single skin contact.Experimental/calculated data:
LD50 rat (oral): approx. 7,200 mg/kg (BASF-Test)

(by inhalation): Study does not need to be conducted.

LD50 rabbit (dermal): > 2,000 mg/kg (OECD Guideline 402)

IrritationAssessment of irritating effects:
Not irritating to the skin. Not irritating to the eyes.Experimental/calculated data:
Skin corrosion/irritation rabbit: non-irritant (OECD Guideline 404)

5/7/394



Serious eye damage/irritation rabbit: non-irritant (BASF-Test)

Respiratory/Skin sensitization

Assessment of sensitization:

Skin sensitizing effects were not observed in animal studies.

Experimental/calculated data:

Guinea pig maximization test guinea pig: Non-sensitizing. (OECD Guideline 406)

Germ cell mutagenicity

Assessment of mutagenicity:

No mutagenic effect was found in various tests with bacteria and mammalian cell culture.

Carcinogenicity

Assessment of carcinogenicity:

Under certain conditions the substance can form nitrosamines. Nitrosamines are carcinogenic in animal studies. The substance showed no carcinogenic activity in animals after chronic administration to the skin.

Reproductive toxicity

Assessment of reproduction toxicity:

The product has not been fully tested. The statements have been derived in parts from products of a similar structure or composition. The potential to impair fertility cannot be excluded when given at maternally toxic doses. Because the relevance of the results to human health is unclear, further tests will be initiated.

Developmental toxicity

Assessment of teratogenicity:

The results of animal studies gave indication of a developmental toxic/teratogenic effects with high doses. The results were determined in a Screening test (OECD 421/422). Because the relevance of the results to human health is unclear, further tests will be initiated. The product has not been fully tested. The statements have been derived in parts from products of a similar structure or composition.

Repeated dose toxicity and Specific target organ toxicity (repeated exposure)

Assessment of repeated dose toxicity:

No adverse effects were observed after repeated exposure in animal studies.

12. Ecological Information

Toxicity

Assessment of aquatic toxicity:

There is a high probability that the product is not acutely harmful to 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) 11,800 mg/l, *Pimephales promelas* (Fish test acute, Flow through.)

The product will cause changes in the pH value of the test system. The result refers to an neutralized sample. The statement of the toxic effect relates to the analytically determined concentration. Literature data.

Aquatic invertebrates:

EC50 (24 h) 2,038 mg/l, *Daphnia magna* (*Daphnia* test acute)

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

Aquatic plants:

EC50 (72 h) 512 mg/l (growth rate), *Scenedesmus subspicatus* (DIN 38412 Part 9, static)

The details of the toxic effect relate to the nominal concentration. The product will cause changes in the pH value of the test system. The result refers to an neutralized sample. Literature data.

Microorganisms/Effect on activated sludge:

EC50 (180 min) > 1,000 mg/l, activated sludge, domestic (OECD Guideline 209)

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

Toxic limit concentration (16 h) > 10,000 mg/l, *Pseudomonas putida* (DIN 38412 Part 8, aquatic)

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

Chronic toxicity to fish:

Study scientifically not justified.

Chronic toxicity to aquatic invertebrates:

No observed effect concentration (21 d), 16 mg/l, *Daphnia magna* (other, semistatic)

Literature data.

Soil living organisms:

Study scientifically not justified.

Terrestrial plants:

Study scientifically not justified.

Other terrestrial non-mammals:

LC50 (3 d) 49,950 mg/kg, *Drosophila melanogaster*

Persistence and degradability**Assessment biodegradation and elimination (H₂O):**

Readily biodegradable (according to OECD criteria). Literature data.

Elimination information:

100 % CO₂ formation relative to the theoretical value (5 d) (aerobic, activated sludge, domestic)

90 - 100 % DOC reduction (19 d) (OECD 301E/92/69/EEC, C.4-B) (aerobic, municipal sewage treatment plant effluent)

Assessment of stability in water:

According to structural properties, hydrolysis is not expected/probable.

Bioaccumulative potential**Assessment bioaccumulation potential:**

Does not accumulate in organisms.

Bioaccumulation potential:

6/7/394



BASF Safety data sheet according to Regulation (EC) No. 1907/2006

Date / Revised: 19.07.2011

Version: 5.0

Product: **Triethanolamine Care**

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

Bioconcentration factor: < 0.4 (42 d), Cyprinus carpio (OECD Guideline 305 C)
Literature data.

Mobility in soil (and other compartments if available)

Assessment transport between environmental compartments:
The substance will not evaporate into the atmosphere from the water surface.
Adsorption to solid soil phase is not expected.

Results of PBT and vPvB assessment

According to Annex XIII of Regulation (EC) No.1907/2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH): Not fulfilling PBT (persistent/bioaccumulative/toxic) criteria. Self classification

According to Annex XIII of Regulation (EC) No.1907/2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH): Not fulfilling vPvB (very persistent/very bioaccumulative) criteria. Self classification

13. Disposal Considerations

Waste treatment methods

The UK Environmental Protection (Duty of Care) Regulations (EP) and amendments should be noted (United Kingdom).

Contaminated packaging:
Contaminated packaging should be emptied as far as possible; then it can be passed on for recycling after being thoroughly cleaned.

14. Transport Information

Land transport

ADR

Not classified as a dangerous good under transport regulations

RID

Not classified as a dangerous good under transport regulations

Inland waterway transport

ADN

Not classified as a dangerous good under transport regulations

Sea transport

IMDG

BASF Safety data sheet according to Regulation (EC) No. 1907/2006
Date / Revised: 19.07.2011
Product: **Triethanolamine Care**

Version: 5.0

(ID no. 30054573/SDS_COS_GB/EN)

Date of print 20.07.2011

Not classified as a dangerous good under transport regulations

Air transport
IATA/ICAO

Not classified as a dangerous good under transport regulations

15. Regulatory Information

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

The data should be considered when making any assessment under the Control of Substances Hazardous to Health Regulations (COSHH), and related guidance, for example, 'COSHH Essentials' (United Kingdom).

16. Other Information

If you have any queries relating to this MSDS, its contents or any other product safety related questions, please write to the following e-mail address: product-safety-north@basf.com

The data contained in this safety data sheet are based on our current knowledge and experience and describe the product only with regard to safety requirements. The data do not describe the product's properties (product specification). Neither should any agreed property nor the suitability of the product for any specific purpose be deduced from the data contained in the safety data sheet. It is the responsibility of the recipient of the product to ensure any proprietary rights and existing laws and legislation are observed.

Vertical lines in the left hand margin indicate an amendment from the previous version.

7/7/394

