

# Safety data sheet

Page: 1/12

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

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

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

1.1. Product identifier

# Sodium Sulfite anhydrous A non food grade

Chemical name: sodium sulphite anhydrous

CAS Number: 7757-83-7

REACH registration number: 01-2119537420-49-0002

# **1.2.** Relevant identified uses of the substance or mixture and uses advised against Recommended use: inorganic reducing agents, initial product for chemical syntheses, food additive(s), Additive for cosmetics, Paper and textile chemical., construction chemistry

# 1.3. Details of the supplier of the safety data sheet

Company: BASF SE 67056 Ludwigshafen GERMANY

Telephone: +49 621 60-0

E-mail address: global.info@basf.com

# 1.4. Emergency telephone number

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

#### **SECTION 2: Hazards Identification**

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

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

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

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

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

Possible Hazards:

Contact with acids liberates toxic gas.

#### 2.2. Label elements

Globally Harmonized System, EU (GHS)

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

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

as in Annex VI of Directive 67/548/EEC

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

#### 2.3. Other hazards

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

If applicable information is provided in this section on other hazards which do not result in classification but which may contribute to the overall hazards of the substance or mixture.

No specific dangers known, if the regulations/notes for storage and handling are considered.

# **SECTION 3: Composition/Information on Ingredients**

#### 3.1. Substances

Chemical nature

Sodium sulphite

CAS Number: 7757-83-7 EC-Number: 231-821-4

Na2SO3

#### 3.2. Mixtures

Not applicable

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

#### **SECTION 4: First-Aid Measures**

#### 4.1. Description of first aid measures

Remove contaminated clothing.

If inhaled:

If difficulties occur after dust has been inhaled, remove to fresh air and seek medical attention.

On skin contact:

Wash thoroughly with soap and water.

On contact with eves:

Immediately wash affected eyes for at least 15 minutes under running water with eyelids held open, consult an eye specialist.

On ingestion:

Rinse mouth and then drink plenty of water.

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

Symptoms: allergic symptoms

Hazards: Risk of sulfur dioxide formation by reaction with gastric acid after swallowing.

#### 4.3. Indication of any immediate medical attention and special treatment needed

Treatment: Treat according to symptoms (decontamination, vital functions), no known specific antidote.

#### **SECTION 5: Fire-Fighting Measures**

#### 5.1. Extinguishing media

Suitable extinguishing media:

Water in copious quantities, dry powder, foam

#### 5.2. Special hazards arising from the substance or mixture

sulphur dioxide

The substances/groups of substances mentioned can be released if the product is involved in a fire.

#### 5.3. Advice for fire-fighters

Special protective equipment:

Wear a self-contained breathing apparatus.

Further information:

Contaminated extinguishing water must be disposed of in accordance with official regulations.

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

#### **SECTION 6: Accidental Release Measures**

# 6.1. Personal precautions, protective equipment and emergency procedures

Avoid dust formation. Ensure adequate ventilation.

#### 6.2. Environmental precautions

Do not empty into drains.

# 6.3. Methods and material for containment and cleaning up

For small amounts: Sweep/shovel up. Dispose of absorbed material in accordance with regulations. For large amounts: Sweep/shovel up. Dispose of absorbed material in accordance with regulations.

#### 6.4. Reference to other sections

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

# **SECTION 7: Handling and Storage**

#### 7.1. Precautions for safe handling

Avoid dust formation.

Protection against fire and explosion:

The substance/product is non-combustible.

# 7.2. Conditions for safe storage, including any incompatibilities

Segregate from acids and acid forming substances. Segregate from oxidants.

Further information on storage conditions: Keep in a cool place. Keep container dry. Keep container in a well-ventilated place.

#### 7.3. 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.

# **SECTION 8: Exposure Controls/Personal Protection**

#### 8.1. Control parameters

Components with occupational exposure limits

The nuisance dust limit value is to be kept.

**PNEC** 

freshwater: 1.33 mg/l

marine water: 0.13 mg/l

STP: 99.9 mg/l

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

**DNEL** 

worker:

Long-term exposure- systemic effects, Inhalation: 298 mg/m3

consumer:

Long-term exposure- systemic effects, oral: 11 mg/kg

consumer:

Long-term exposure- systemic effects, Inhalation: 88 mg/m3

#### 8.2. Exposure controls

#### Personal protective equipment

#### Respiratory protection:

Breathing protection if dusts are formed. Suitable respiratory protection for lower concentrations or short-term effect: Particle filter with low efficiency for solid particles (e.g. EN 143 or 149, Type P1or FFP1)

#### 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):

polyvinylchloride (PVC) - 0.7 mm coating thickness

nitrile rubber (NBR) - 0.4 mm coating thickness

chloroprene rubber (CR) - 0.5 mm coating thickness

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.

Manufacturer's directions for use should be observed because of great diversity of types.

#### 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. When using, do not eat, drink or smoke. Hands and/or face should be washed before breaks and at the end of the shift.

# **SECTION 9: Physical and Chemical Properties**

# 9.1. Information on basic physical and chemical properties

Form: powder, crystalline
Colour: white to slightly yellow

Odour: odourless pH value: 8.5 - 10.5

(5 %(m), 20 °C)

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

melting point (decomposition):

The substance / product

decomposes.

Flash point:

Flammability:

Study scientifically not justified. Study scientifically not justified.

Vapour pressure:

Study scientifically not justified.

Relative density: 2.63

(20 °C)

Literature data.

Solubility in water:

220 g/l (20 °C)

Partitioning coefficient n-octanol/water (log Kow): -4

(OECD Guideline 107)

(25 °C)

Thermal decomposition: 500 °C

Viscosity, dynamic:

not applicable

#### 9.2. Other information

Bulk density: 1,400 - 1,600 kg/m3

pKA:

Study scientifically not justified.

# **SECTION 10: Stability and Reactivity**

#### 10.1. Reactivity

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

#### 10.2. Chemical stability

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

# 10.3. Possibility of hazardous reactions

Reacts with oxidizing agents. Reacts with acids. Reacts with nitrites.

#### 10.4. Conditions to avoid

Avoid moisture. avoid atmospheric oxygen

#### 10.5. Incompatible materials

Substances to avoid:

acids, oxidizing agents, nitrites, nitrates

#### 10.6. Hazardous decomposition products

Hazardous decomposition products:

sulphur dioxide

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

# **SECTION 11: Toxicological Information**

#### 11.1. Information on toxicological effects

#### Acute toxicity

Assessment of acute toxicity:

Of low toxicity after single ingestion. Virtually nontoxic by inhalation. Virtually nontoxic after a single skin contact.

Experimental/calculated data:

LD50 rat (oral): approx. 2,610 mg/kg (OECD Guideline 401)

LC50 rat (by inhalation): > 5.5 mg/l 4 h (OECD Guideline 403)

No mortality was observed. Tested as dust aerosol.

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

No mortality was observed.

#### Irritation

Assessment of irritating effects:

Not irritating to eyes and skin.

Experimental/calculated data:

Skin corrosion/irritation rabbit: non-irritant (Draize test)

Serious eye damage/irritation rabbit: non-irritant (Draize test)

#### Respiratory/Skin sensitization

Assessment of sensitization:

Skin sensitizing effects were not observed in animal studies.

Experimental/calculated data:

Mouse Local Lymph Node Assay (LLNA) mouse: Non-sensitizing. (OECD Guideline 429)

#### Germ cell mutagenicity

Assessment of mutagenicity:

The substance was not mutagenic in bacteria. The substance was not mutagenic in a test with mammals.

# Carcinogenicity

Assessment of carcinogenicity:

No data available concerning carcinogenic effects. The chemical structure does not suggest a specific alert for such an effect.

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

#### Reproductive toxicity

Assessment of reproduction toxicity:

The results of animal studies gave no indication of a fertility impairing effect. The product has not been tested. The statement has been derived from substances/products of a similar structure or composition. The chemical structure does not suggest a specific alert for such an effect.

#### Developmental toxicity

Assessment of teratogenicity:

No data available. The chemical structure does not suggest a specific alert for such an effect.

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

Assessment of repeated dose toxicity:

Repeated oral uptake of the substance did not cause substance-related effects. Repeated inhalative uptake of the substance did not cause substance-related effects. The product has not been tested. The statement has been derived from substances/products of a similar structure or composition.

#### Aspiration hazard

not applicable

# **SECTION 12: Ecological Information**

# 12.1. 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) 316 mg/l, Leuciscus idus (DIN 38412 Part 15, static)

The product has not been tested. The statement has been derived from substances/products of a similar structure or composition. The details of the toxic effect relate to the nominal concentration.

#### Aquatic invertebrates:

EC50 (48 h) 59 mg/l, Daphnia magna (Directive 79/831/EEC, static)

The details of the toxic effect relate to the nominal concentration. The product has not been tested. The statement has been derived from substances/products of a similar structure or composition.

#### Aquatic plants:

EC50 (72 h) 31.9 mg/l (growth rate), Scenedesmus subspicatus (OECD Guideline 201, static) The details of the toxic effect relate to the nominal concentration. The product has not been tested. The statement has been derived from substances/products of a similar structure or composition.

Microorganisms/Effect on activated sludge:

EC50 (3 h) > 1,000 mg/l, (OECD Guideline 209, static)

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

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

EC10 (17 h) 260 mg/l, Pseudomonas putida (DIN 38412 Part 8, aquatic) Nominal concentration.

Chronic toxicity to fish:

No observed effect concentration (34 d) 316 mg/l, Brachydanio rerio (OECD Guideline 210, Flow through.)

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

Chronic toxicity to aquatic invertebrates:

No observed effect concentration (21 d) > 10 mg/l, Daphnia magna (OECD Guideline 211, semistatic)

The details of the toxic effect relate to the nominal concentration. The product has not been tested.

The statement has been derived from substances/products of a similar structure or composition.

Assessment of terrestrial toxicity:

Study scientifically not justified.

# 12.2. Persistence and degradability

Assessment biodegradation and elimination (H2O):

Inorganic product which cannot be eliminated from water by biological purification processes.

Assessment of stability in water:

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

#### 12.3. Bioaccumulative potential

Assessment bioaccumulation potential:

Significant accumulation in organisms is not to be expected.

Bioaccumulation potential:

Study scientifically not justified.

#### 12.4. Mobility in soil

Assessment transport between environmental compartments:

Adsorption to solid soil phase is not expected.

#### 12.5. 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): The product does not fulfill the criteria for PBT (Persistent/bioaccumulative/toxic) and vPvB (very persistent/very bioaccumulative). Self classification

#### 12.6. Other adverse effects

The substance is not listed in Regulation (EC) 1005/2009 on substances that deplete the ozone layer.

#### 12.7. Additional information

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

Other ecotoxicological advice:

Higher concentrations of the substance may cause a strong chemical oxygen consumption in biological sewage-treatment plants and/or waterways. Inhibition of degradation activity in activated sludge is not to be anticipated during correct introduction of low concentrations.

# **SECTION 13: Disposal Considerations**

#### 13.1. Waste treatment methods

Contact manufacturer regarding recycling.

Contact waste centre regarding recycling.

Must be disposed of by special means, e.g. suitable dumping after chemical/physical pretreatment (consolidation).

Contaminated packaging:

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

# **SECTION 14: Transport Information**

#### Land transport

**ADR** 

Not classified as a dangerous good under transport regulations

UN number:
UN proper shipping name:
Transport hazard class(es):
Packing group:
Environmental hazards:
Special precautions for

Not applicable
Not applicable
Not applicable
Not applicable
Not applicable
Not applicable

user

RID

Not classified as a dangerous good under transport regulations

UN number:
UN proper shipping name:
Transport hazard class(es):
Packing group:
Environmental hazards:
Special precautions for

Not applicable
Not applicable
Not applicable
Not applicable
Not applicable

user

#### **Inland waterway transport**

ADN

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

Not classified as a dangerous good under transport regulations

UN number:
UN proper shipping name:
Transport hazard class(es):
Packing group:
Environmental hazards:
Special precautions for

Not applicable
Not applicable
Not applicable
Not applicable
Not applicable

user

Transport in inland

waterway vessel:

Not evaluated

#### Sea transport

#### **IMDG**

Not classified as a dangerous good under transport regulations

UN number:
UN proper shipping name:
Transport hazard class(es):
Packing group:
Environmental hazards:
Special precautions for

Not applicable
Not applicable
Not applicable
Not applicable
Not applicable
Not applicable

user

#### Air transport

#### IATA/ICAO

Not classified as a dangerous good under transport regulations

UN number:
UN proper shipping name:
Transport hazard class(es):
Packing group:
Environmental hazards:
Special precautions for

Not applicable
Not applicable
Not applicable
Not applicable
Not applicable
Not applicable

user

#### 14.1. UN number

See corresponding entries for "UN number" for the respective regulations in the tables above.

# 14.2. UN proper shipping name

See corresponding entries for "UN proper shipping name" for the respective regulations in the tables above.

#### 14.3. Transport hazard class(es)

See corresponding entries for "Transport hazard class(es)" for the respective regulations in the tables above.

Date / Revised: 21.06.2013 Version: 6.1

Product: Sodium Sulfite anhydrous A non food grade

(ID no. 30042392/SDS\_GEN\_EU/EN)

Date of print 23.06.2013

#### 14.4. Packing group

See corresponding entries for "Packing group" for the respective regulations in the tables above.

#### 14.5. Environmental hazards

See corresponding entries for "Environmental hazards" for the respective regulations in the tables above.

# 14.6. Special precautions for user

See corresponding entries for "Special precautions for user" for the respective regulations in the tables above.

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

Regulation: Not evaluated
Shipment approved: Not evaluated
Pollution name: Not evaluated
Pollution category: Not evaluated
Ship Type: Not evaluated

# **SECTION 15: Regulatory Information**

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

If other regulatory information applies that is not already provided elsewhere in this safety data sheet, then it is described in this subsection.

#### 15.2. Chemical Safety Assessment

Chemical Safety Assessment not required

# **SECTION 16: Other Information**

Assessment of the hazard classes according to UN GHS criteria (most recent version):

Acute Tox. 5 (oral) Aquatic Acute 3

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.