

Safety Data Sheet

according to Regulation (EC) No 1907/2006

Fluxes

Revision date: 20.04.2018

Product code: 142-100-50

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

1.1. Product identifier

Fluxes

Further trade names

Article No.: 142-100-50

REACH Registration Number: 01-2119490790-32-XXXX

CAS No: 1303-96-4

Index No: 005-011-01-1

EC No: 215-540-4

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

Use of the substance/mixture

Health services.

1.3. Details of the supplier of the safety data sheet

Company name: DENTAURUM GmbH & Co. KG

Street: Turnstr. 31

Place: D-75228 Ispringen

Telephone: +49 7231 803 0

Telefax: +49 7231 803 295

e-mail: info@dentaurum.de

Internet: www.dentaurum.com

Further Information

Emergency telephone:

07:00 - 16:15 (Mo - Do), 07:00 - 13:15 (Fr) +49 7231 803 184

16:15 - 18:00 (Mo - Do), 13:15 - 18:00 (Fr) +49 7231 803 0

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Regulation (EC) No. 1272/2008

Hazard categories:

Reproductive toxicity: Repr. 1B

Hazard Statements:

May damage fertility. May damage the unborn child.

2.2. Label elements

Regulation (EC) No. 1272/2008

Signal word: Danger

Pictograms:



Hazard statements

H360FD May damage fertility. May damage the unborn child.

Precautionary statements

P201 Obtain special instructions before use.

P308+P313 IF exposed or concerned: Get medical advice/attention.

Special labelling of certain mixtures

Restricted to professional users.

2.3. Other hazards

No information available.

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SECTION 3: Composition/information on ingredients

3.1. Substances

Chemical characterization

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Sum formula: B₄Na₂O₇ * (H₂O)₁₀

Molecular weight: 381,3 g/mol

Hazardous components

CAS No	Chemical name			Quantity
	EC No	Index No	REACH No	
	Classification according to Regulation (EC) No. 1272/2008 [CLP]			
1303-96-4	disodium tetraborate decahydrate; borax decahydrate			100 %
	215-540-4	005-011-01-1		
	Repr. 1B; H360FD			

Full text of H and EUH statements: see section 16.

SECTION 4: First aid measures

4.1. Description of first aid measures

General information

First aider: Pay attention to self-protection!

Remove contaminated clothing immediately and dispose off safely.

After inhalation

Provide fresh air. Medical treatment necessary.

After contact with skin

Wash with plenty of water.

In case of skin irritation, seek medical treatment.

After contact with eyes

In case of contact with eyes, rinse immediately with plenty of flowing water for 10 to 15 minutes holding eyelids apart. Subsequently consult an ophthalmologist.

After ingestion

Do NOT induce vomiting.

Rinse mouth immediately and drink plenty of water.

Call a physician immediately.

If swallowed, seek medical advice immediately and show this container or label.

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

Frostbite, Nausea, Irritant Effects, Vomiting, Spasms

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

none

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Co-ordinate fire-fighting measures to the fire surroundings.

Atomized water. Foam. Dry extinguishing powder. Carbon dioxide (CO₂).

Unsuitable extinguishing media

Full water jet

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5.2. Special hazards arising from the substance or mixture

The product is not: Combustible.

5.3. Advice for firefighters

Fight fire with normal precautions from a reasonable distance.

In case of fire: Wear self-contained breathing apparatus.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Provide adequate ventilation. Avoid dust formation. Do not breathe dust. Avoid contact with skin, eyes and clothes. Wear personal protection equipment.

6.2. Environmental precautions

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

6.3. Methods and material for containment and cleaning up

Take up mechanically. Collect in closed and suitable containers for disposal.

Treat the recovered material as prescribed in the section on waste disposal.

6.4. Reference to other sections

Safe handling: see section 7

Personal protection equipment: see section 8

Disposal: see section 13

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling

Handle and open container with care. Provide adequate ventilation. Avoid dust formation. Wash hands before breaks and after work.

Advice on protection against fire and explosion

Use appropriate respiratory protection.

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Store in a dry place.

Advice on storage compatibility

Keep away from food, drink and animal feedingstuffs.

Further information on storage conditions

Keep at temperature not exceeding 25 °C.

7.3. Specific end use(s)

No information available.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limits (EH40)

CAS No	Substance	ppm	mg/m ³	fibres/ml	Category	Origin
1303-96-4	Disodium tetraborate, decahydrate	-	5		TWA (8 h)	WEL
		-	-		STEL (15 min)	WEL

8.2. Exposure controls

Protective and hygiene measures

Remove contaminated, saturated clothing immediately. After work, wash hands and face.

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When using do not eat or drink. Use protective skin cream before handling the product.
Keep away from food, drink and animal feedingstuffs. Avoid contact with eyes and skin.
Separate storage of work clothes. Do not breathe dust.

Eye/face protection

Tightly sealed safety glasses.

Hand protection

NBR (Nitrile rubber) >0,11 mm. >480 min

Wear suitable gloves. DIN EN 374 For special purposes, it is recommended to check the resistance to chemicals of the protective gloves mentioned above together with the supplier of these gloves.

Skin protection

Protective clothing.

Respiratory protection

In case of insufficient ventilation, wear suitable respiratory equipment. P2

In the case of the formation of dust.

Environmental exposure controls

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

SECTION 9: Physical and chemical properties**9.1. Information on basic physical and chemical properties**

Physical state:	solid (crystalline)
Colour:	white
Odour:	odourless
pH-Value (at 20 °C):	9,2

Changes in the physical state

Melting point:	75 °C
Initial boiling point and boiling range:	No data available
Flash point:	not applicable

Flammability

Solid:	Non-flammable.
Gas:	Non-flammable.

Explosive properties

not explosive.

Lower explosion limits:	No data available
Upper explosion limits:	No data available
Decomposition temperature:	No information available.
Vapour pressure: (at 20 °C)	0,213 hPa
Density (at 25 °C):	1,73 g/cm ³
Bulk density:	750 kg/m ³
Water solubility: (at 20 °C)	51,4 g/L
Viscosity / dynamic:	not relevant
Viscosity / kinematic:	not relevant
Flow time:	No data available
Evaporation rate:	No information available.

9.2. Other information

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Odour threshold: No data available

SECTION 10: Stability and reactivity**10.1. Reactivity**

This material is considered to be non-reactive under normal use conditions.

10.2. Chemical stability

The product is stable under storage at normal ambient temperatures.

10.3. Possibility of hazardous reactions

Violent reaction with: Acids, Oxidizing agents, strong.

10.4. Conditions to avoid

Keep away from heat.

10.5. Incompatible materials

No information available.

10.6. Hazardous decomposition products

Hazardous combustion products: SECTION 5: Firefighting measures

SECTION 11: Toxicological information**11.1. Information on toxicological effects****Acute toxicity**

Acute toxicity, oral: LD50: 2660 mg/kg Rat

Acute toxicity, dermal: LD50: > 2000 mg/kg, Rabbit

Irritation and corrosivity

Irritant effect on the skin: none

Irritant effect on the eye: slightly irritant but not relevant for classification.

Sensitising effects

none

Carcinogenic/mutagenic/toxic effects for reproduction

May impair fertility. May damage the unborn child.

Practical experience**Other observations**

after ingestion: Nausea. vomiting. Spasms. central nervous system

SECTION 12: Ecological information**12.1. Toxicity**

Acute fish toxicity: LC50: 630 mg/l/96 h Carassius auratus (goldfish)

Acute Daphnia toxicity: EC50: 1085 mg/l/48 h (Daphnia magna)

12.2. Persistence and degradability

The methods for determining the biological degradability are not applicable to inorganic substances.

12.3. Bioaccumulative potential

No data available

Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
1303-96-4	disodium tetraborate decahydrate; borax decahydrate	-1,53

12.4. Mobility in soil

No data available

12.5. Results of PBT and vPvB assessment

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No data available

12.6. Other adverse effects

slightly hazardous to water (WGK 1)

SECTION 13: Disposal considerations**13.1. Waste treatment methods****Advice on disposal**

This material and its container must be disposed of as hazardous waste. Dispose of waste according to applicable legislation. Do not empty into drains.

Contaminated packaging

Dispose of waste according to applicable legislation.

SECTION 14: Transport information**14.5. Environmental hazards**

ENVIRONMENTALLY HAZARDOUS: no

14.6. Special precautions for user

No information available.

14.7. Transport in bulk according to Annex II of Marpol and the IBC Code

No transport as bulk according to IBC Code.

Other applicable information

Not a hazardous material with respect to transportation regulations.

SECTION 15: Regulatory information**15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture****EU regulatory information**

Authorisations (REACH, annex XIV):

This substance has been listed as SVHC (substance of very high concern) in the Candidate List according to Article 59 of REACH.

Restrictions on use (REACH, annex XVII):

Entry 30: disodium tetraborate decahydrate; borax decahydrate

National regulatory information

Water contaminating class (D): 1 - slightly water contaminating

15.2. Chemical safety assessment

For this substance a chemical safety assessment has not been carried out.

SECTION 16: Other information**Changes**

This data sheet contains changes from the previous version in section(s):
1,2,3,4,5,6,7,8,9,10,11,12,13,14,15,16.

Relevant H and EUH statements (number and full text)

H360FD May damage fertility. May damage the unborn child.

Further Information

The above information describes exclusively the safety requirements of the product and is based on our present-day knowledge. The information is intended to give you advice about the safe handling of the product named in this safety data sheet, for storage, processing, transport and disposal. The information cannot be transferred to other products. In the case of mixing the product with other products or in the case of processing, the information on this safety data sheet is not necessarily valid for the new made-up material.

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