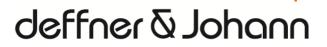


SAFETY DATA SHEET

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Die in diesem Produktdatenblatt genannten Spezifikationen dienen nur zur Produktbeschreibung und beziehen sich auf den Zeitpunkt unmittelbar nach der Produktion bzw. Import des Produktes. Sie entsprechen den Angaben des Herstellers. Eine rechtsverbindliche Zusicherung bestimmter Eigenschaften oder der Eignung für einen bestimmten Einsatzzweck kann hieraus nicht abgeleitet werden. Durch unsachgemäßen Transport und / oder unsachgemäße Lagerung können sich Änderungen ergeben. Die Angaben in diesem Produktdatenblatt entbinden den Verarbeiter nicht von eigener Prüfung der Eigenschaften des Produktes und dessen Eignung für die vorgesehene Verwendung.



Safety Data Sheet according to Regulation (EU) No. 830/2015

Revision date: 30.07.2020

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

1.1. Product identifier Wheat starch

INDEX No.: not relevant

REACH No.: do not require registration

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

The product is intended for professional use as Soft Blasting Abrasive **Uses advised against:** not relevant

1.3. Details of the supplier of the safety data sheet Deffner & Johann GmbH Mühläckerstr. 13 97520 Röthlein, Germany

Telefon:	+49 9723-93500
Fax:	+49 9723-935025
Epost:	info@deffner-johann.de
Web:	www.deffner-johann.com

1.4. Emergency telephone number

Mo-Fr 08:00-15:00:+49 972393500

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Regulation (EC) No 1272/2008: not relevant

2.2. Label elements

Classification according to Regulation (EC) No. 1272/2008 [CLP] not relevant

2.3. Other hazards

This material is combustible, but will not ignite readily. In case of fire may be liberated: Carbon monoxide. Carbon dioxide. Danger of dust explosion. Damage can be caused through mechanical influence of the product (e.g. sticking).

SECTION 3: Composition / information on ingredients

3.1. Substances

Starch CAS No.: 9005-25-8 EC No.: 232-679-6 INDEX No.: not relevant

3.2. Mixtures

Safety Data Sheet according to Regulation (EU) No. 830/2015 Composition/information on ingredients not relevant Revision date: 30.07.2020

Substance with a common (EC) occupational exposure limit value not relevant

(Full text of H- and EUH-phrases: see section 16.)

Additional information

The substance does not require registration according to REACH.

SECTION 4: First aid measures

4.1. Description of first aid measures

General information:	When in doubt or if symptoms are observed, get medical advice.
Following inhalation:	Provide fresh air.
Following skin contact:	not relevant
After eye contact:	Rinse immediately carefully and thoroughly with eye-bath or water. In case of eye irritation consult an ophthalmologist.
After ingestion:	not relevant

Self-protection of the first aider: not relevant

- 4.2. Most important symptoms and effects, both acute and delayed
Symptoms:No known symptoms to dateNature of Hazard:not relevant
- **4.3. Indication of any immediate medical attention and special treatment needed Notes for the doctor:** Treat symptomatically. **Special treatment:** Treat symptomatically.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media:Water. Carbon dioxide. Foam. Dry extinguishing powder.Unsuitable extinguishing media:High power water jet.

5.2. Special hazards arising from the substance or mixture

In case of fire may be liberated: Carbon monoxide. Carbon dioxide.

5.3. Advice for firefighters

General information

Danger of dust explosion.

Special protective equipment for firefighters:

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

Additional information

Fire class A (Fires of solids, mainly organic nature, which normally burn down under glow forming).

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

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For non-emergency personnel: Avoid generation of dust.

For emergency responders: Wear breathing apparatus if exposed to vapours/dusts/aerosols. Avoid generation of dust. See protective measures under point 7 and 8.

6.2. Environmental precautions

No special environmental measures are necessary.

6.3. Methods and material for containment and cleaning up

Take up mechanically. Avoid generation of dust. Do not use a dry brush as dust clouds or static can be created.

6.4. Reference to other sections

Disposal: see section 13. Personal protection equipment: see section 8

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advices on safe handling

If handled uncovered, arrangements with local exhaust ventilation should be used if possible. It is recommended to design all work processes always so that the following is excluded: Inhalation of dust/particles

Technical measures

Measures to prevent aerosol and dust generation: Provide adequate ventilation as well as local exhaustion at critical locations. Dust should be exhausted directly at the point of origin.

Precautions against fire and explosion

The product is: Combustible.

Danger of dust explosion.

Keep away from heat/sparks/open flames/hot surfaces. - No smoking. Have fire-extinguishers in readiness before opening containers.

Additional information

Recommendations for handling:

- 210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
- 240 Ground/bond container and receiving equipment.
- 241 Use explosion-proof electrical/ventilating/lighting equipment.
- 280 Wear protective gloves/protective clothing/eye protection/face protection.

7.2. Conditions for safe storage, including any incompatibilities

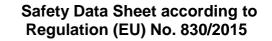
Technical measures and storage conditions

No special requirement

Packaging materials

not relevant

Requirements for storage rooms and vessels not relevant



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Hints on joint storage Storage class: 11 Combustible solids.

Further information on storage conditions

Protect against: Humidity Store at dry place Storage temperature: Do not expose to temperatures exceeding 50°C/122°F. Storage stability: at least 5 years Maximum storage period (time): not relevant

7.3. Specific end use(s)

Soft blasting abrasive

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Occupational exposure limit value

Substance with a common (EC) occupational exposure limit value not relevant

DNEL-/PNEC-values DNEL value not relevant

PNEC Value not relevant

Risk management measures according to used control banding approach not relevant

Additional information not relevant

8.2. Exposure controls

Occupational exposure controls

If technical exhaust or ventilation measures are not possible or insufficient, respiratory protection must be worn.

General protection and hygiene measures

Minimum standard for preventive measures while handling with working materials are specified in the TRGS 500.

Personal protection equipment

Respiratory protection necessary at: Dust formation.

Respiratory protection

Suitable respiratory protection apparatus: Filtering Half-face mask (DIN EN 149) Half-face mask or quarter face piece: maximum use concentration for substances with exposure limits: P1 filter: up to a max. of 4 times the exposure limit. P2 filter: up to a max. of 10 times the exposure limit. P3 filter: up to a max. of 30 times the exposure limit. The filter class must be suitable for the maximum contaminant concentration (gas/vapour/aerosol/particulates) that may arise when handling the product. If the concentration is exceeded, self-contained breathing apparatus must be used!

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Hand protection Hand protection is not required

Eye/face protection

Dust protection eye glasses.

Body protection

not applicable.

Environmental exposure controls

See chapter 7. No additional measures necessary.

Consumer exposure controls not relevant

Exposure Scenario not relevant

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Appearance Physical state:	Powder	·	·	
Colour: Odour:	white odourless			
Odour threshold:	not relevant			
Odour tilleshold.	not relevant			
Safety relevant basis data Parameter			Unit	Remark
Density:	~	1.5	g/cm³	
Bulk density:		550 -	g/L	1
		700		
pH:		4-7,5		
Melting point/freezing point:				not applicable
Initial boiling point and boiling				
range:				not applicable
Flash point:				not determined
Flammability (solid, gas):				not relevant
Explosivity:		20		Dust explosive
Lower explosion limit:		30	g/m³	
Upper explosion limit:		11 000	g/m³	
Ignition temperature:		000	°C	not determined
Decomposition temperature:	~	200	SC SC	not ovidining
Oxidizing potential:				not oxidizing
Vapour pressure:				not applicable
Vapour density: Evaporation rate:				not applicable
Water solubility:	Soluph	o in/Miooho	hlo with Motor	not applicable at 20 °C not readily soluable
water solubility.	at 95 °C			at 20°C not readily soluable
Fat solubility:		,		insoluble
Soluble in:				Water
Partition coefficient:				Trater -
n-octanol/water:				not applicable
Viscosity:				not applicable
Solvent separation test:				not applicable
Solvent content:				not relevant

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9.2. Other information

Dust explosion category: St 1 Minimum ignition energy in mJ: > 30 Minimum ignition temperature of a dust cloud (°C): \geq 400 Flammability and burning behaviour of dust layers: combustion rate (BZ) 5 Minimum ignition temperature of a 5 mm dust layer (glowing temperature): \geq 330 °C Maximum explosion pressure in bar: \leq 9.5 KSt-value in bar m s-1: \leq 200

The product has not been tested. The statement is derived from products of similar composition.

SECTION 10: Stability and reactivity

10.1. Reactivity

not relevant

10.2. Chemical stability

not relevant

10.3. Possibility of hazardous reactions

not relevant

10.4. Conditions to avoid

Rapid heating, Decomposition takes place from temperatures above: ~ 200 $^\circ \text{C}$ Contact to strong oxidants

10.5. Incompatible materials

not relevant

10.6. Hazardous decomposition products

In case of fire may be liberated: Carbon monoxide. Carbon dioxide.

Additional information

not relevant

SECTION 11: Toxicological information

11.1. Information on toxicological effects

not relevant

Acute toxicity

No acute toxicity

Specific symptoms in laboratory animals LD50 Mouse: 6600 mg/kg

Irritation and etching Irritant effect on the skin Not an irritant

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Irritant effect on the eye Not an irritant Irritant effect on the respiratory tract Not an irritant Caustic effect not corrosive

Sensitization not sensitising

Repeated dose toxicity (subacute, subchronic, chronic) not relevant

CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction) Carcinogenicity not relevant Germ cell mutagenicity not relevant Reproductive toxicity not relevant

General remarks Damage can be caused through mechanical influence of the product (e.g. sticking).

Practical experience/human evidence not relevant

Other observations not relevant

Other information not relevant

SECTION 12: Ecological information

12.1. Toxicity

not relevant

Eco toxicity

Readily biodegradable, Natural occurring substance.

12.2. Persistence and degradability

not persistent.

12.3. Bio accumulative potential

No indication of bioaccumulation potential.

12.4. Mobility in soil

not relevant

12.5. Results of PBT and vPvB assessment

This substance does not meet the PBT/vPvB criteria of REACH, annex XIII.

12.6. Other adverse effects

not relevant

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Further ecological information

According to the present state of knowledge negative ecological effects are not expected.

Further details not relevant

not relevant

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Appropriate disposal/Product

Dispose of waste according to applicable legislation.

Appropriate disposal / Package

Completely emptied packing can be recycled.

List of proposed waste codes/waste designations in accordance with EWC

Waste code product:	03 03 99 - wastes not otherwise specified
Waste code packaging:	15 01 06 - mixed packaging

Remark

The allocation of waste identity numbers/waste descriptions must be carried out according to the EWC, specific to the industry and process.

SECTION 14: Transport information

14.1. UN number

not relevant

14.2. UN proper shipping name

not relevant

14.3. Transport hazard class(es)

Not classified as dangerous in the meaning of transport regulations

14.4. Packing group

not relevant

14.5. Environmental hazards

not relevant

14.6. Special precautions for user

Land transport (ADR/RID)

Remark: No dangerous good in sense of this transport regulation.

Sea transport (IMDG)

Remark: No dangerous good in sense of this transport regulation.

Air transport (ICAO-TI / IATA-DGR)

Remark: No dangerous good in sense of this transport regulation.

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code Remark: not relevant

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SECTION 15: Regulatory information

Labeling

Hazardous component(s) for labelling not relevant

Special labelling of particular preparations not relevant

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

EU legislation

Information according to 1999/13/EC about limitation of emissions of volatile organic compounds (VOC-guideline) not relevant

Regulation (EC) No 2037/2000 concerning materials, which cause damage to the ozone layer not relevant

Regulation (EC) No. 648/2004 (Detergents regulation) not relevant

National regulations Observe in addition any national regulations!

Restrictions of occupation not relevant

Storage class 11 Combustible solids.

Water hazard class (WGK)

1 (VwVwS)

Other regulations, restrictions and prohibition regulations not relevant

15.2. Chemical Safety Assessment

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

SECTION 16: Other information

Relevant H- and EUH-phrases (Number and full text) not relevant

Training advice

Recommended restrictions of use not relevant

Further remarks

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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.

Documentation of changes

Data changed compared with the previous version

Key literature references and sources for data

Data arise from reference works and literature. GESTIS- substances data base Regulation (EC) 1272/2008 [CLP]

Abbreviations and acronyms

EWC = European Waste Catalogue