

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

1.1. Product identifier

Name of product	Hardness Plus 1013
Name of substance	calcium chloride
Index No	017-013-00-2
EC No	233-140-8
CAS No	10043-52-4

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

! Recommended intended purpose(s)
Hardness Increaser

1.3. Details of the supplier of the safety data sheet

Manufacturer/distributor	BAYROL Deutschland GmbH Robert-Koch-Str. 4, D-82152 Planegg Phone +49 (0) 89 85701-0
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Advice

E-mail (competent person):
ASchwarzenboeck@bayrol.eu

1.4. Emergency telephone number

NCEC, Phone (+44)(0)1865407333

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

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

Hazard classes and Hazard categories	Hazard Statements	Classification procedure
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Eye Irrit. 2	H319
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Hazard Statements

H319 Causes serious eye irritation.

2.2. Label elements

Labelling according to Regulation (EC) No 1272/2008 [CLP/GHS]



GHS07

Signal word

Warning

Hazard Statements

H319 Causes serious eye irritation.

Precautionary Statements

P101 If medical advice is needed, have product container or label at hand.

P102	Keep out of reach of children.
P280	Wear protective gloves/eye protection.
P305 + P351 + P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308 + P311	IF exposed or concerned: Call a POISON CENTER/doctor.
P501	Dispose of contents/ container to an approved waste disposal plant.

Hazardous ingredients for labeling

calcium chloride

2.3. Other hazards

Results of PBT and vPvB assessment

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

SECTION 3: Composition/ information on ingredients

3.1. Substances

CAS No 10043-52-4 calcium chloride

EC No 233-140-8

Index No 017-013-00-2

3.2. Mixtures

not applicable

SECTION 4: First aid measures

4.1. Description of first aid measures

General information

Remove contaminated soaked clothing immediately.

In case of inhalation

Remove the casualty into fresh air and keep him immobile.

In the event of symptoms refer for medical treatment.

In case of skin contact

In case of contact with skin wash off with water.

Consult a doctor if skin irritation persists.

In case of eye contact

Eye rinsing with water carefully while protecting unhurt eye.

Refer to medical treatment.

In case of ingestion

Refer to medical treatment.

Rinse out mouth and give plenty of water to drink.

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

No information available.

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

Treatment (Advice to doctor)

Treat symptoms.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Product does not burn, fire-extinguishing activities according to surrounding.

5.2. Special hazards arising from the substance or mixture

In case of fire formation of dangerous gases possible.

Hydrogen chloride (HCl)

5.3. Advice for firefighters

Special protective equipment for fire-fighters

Use breathing apparatus with independent air supply.

Wear full protective clothing.

Additional information

Cool endangered containers with water spray jet.

Fire residues and contaminated firefighting water must be disposed of in accordance with the local regulations.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For non-emergency personnel

Avoid dust formation.

Use personal protective clothing.

6.2. Environmental precautions

Do not discharge into the drains or bodies of water..

6.3. Methods and material for containment and cleaning up

Flush away residues with water.

Take up mechanically.

6.4. Reference to other sections

Safe handling: see section 7

Disposal: see section 13

Personal protection equipment: see section 8

Emergency telephone number: see section 1

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling

Avoid the formation and deposition of dust.

General protective measures

Avoid contact with eyes and skin

Hygiene measures

Do not eat or drink when working.

Keep away from food and drink.

Wash hands before breaks and after work.

Advice on protection against fire and explosion

The product is not combustible.

No special measures necessary.

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Keep only in original container.

Advice on storage compatibility

Do not store together with animal feedstuffs.

Do not store together with food.

Further information on storage conditions

Storage: dry

Protect from atmospheric moisture and water

Information on storage stability

Storage time: 5 years.

7.3. Specific end use(s)

Recommendation(s) for intended use

See section 1.2

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

No information available.

8.2. Exposure controls

Respiratory protection

In case of dust formation wear micro dust mask.

Hand protection

chemical-resistant gloves

Suitable materials (recommended: protection index 6, >480 minutes permeation time according to EN 374)

Nitrile-butadiene rubber (NBR) - 0.4 mm layer thickness

Butyl rubber (butyl) - 0.7mm layer thickness

In view of the many different types, the manufacturers' directions for use must be followed

Eye protection

Safety goggles

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Appearance

granules

Colour

white

Odour

odourless

Odour threshold

not determined

Important health, safety and environmental information

	Value	Temperature	at	Method	Remark
pH value	ca. 9 - 10,5	20 °C		100 g/l	
Boiling temperature / boiling range	not determined				
melting temperature	772 °C				

	Value	Temperature	at	Method	Remark
Flash point	not determined				
Vapourisation rate	not determined				
Flammable (solid)	not determined				
Flammability (gas)	not determined				
Ignition temperature	not determined				
Self ignition temperature	not determined				
Lower explosion limit	not determined				
Upper explosion limit	not determined				
Vapour pressure	not determined				
Relative density	not determined				
Bulk density	850 kg/m ³				
Vapour density	not determined				
Solubility in water	740 g/l	20 °C			
Solubility/other	not determined				
Partition coefficient n-octanol/water (log P O/W)	not determined				
Decomposition temperature	not determined				
Viscosity	not determined				

Oxidising properties
 No information available.

Explosive properties
 No information available.

9.2. Other information
 No information available.

SECTION 10: Stability and reactivity

10.1. Reactivity
 No information available.

10.2. Chemical stability
 No information available.

10.3. Possibility of hazardous reactions
 No information available.

10.4. Conditions to avoid

No information available.

10.5. Incompatible materials

No information available.

10.6. Hazardous decomposition products
Thermal decomposition

Remark No decomposition if used as directed.

SECTION 11: Toxicological information
11.1. Information on toxicological effects
Acute toxicity/Irritation/Sensitization

	Value/Validation	Species	Method	Remark
LD50 acute oral	1000 mg/kg	rat	OECD 401	
LD50 acute dermal	2630 mg/kg	rat		
Eye irritation	irritant			

Experiences made from practice

Dust or formation of smoke irritates mucous membranes of respiratory tract.

SECTION 12: Ecological information
12.1. Toxicity
Ecotoxicological effects

	Value	Species	Method	Validation
Fish	LC50 4630 mg/l (96 h)	minnow		
Daphnia	EC50 2770 mg/l (48 h)			

12.2. Persistence and degradability

No information available.

12.3. Bioaccumulative potential

No information available.

12.4. Mobility in soil

No information available.

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
General regulation

If appropriate application no interferences in sewage treatment plants.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Recommendations for the product

Remove in accordance with local official regulations.

There are no harmonised regulations on the disposal of chemicals in the member states of the EU. In Germany the Recycling and Waste Management Act (KrWG) stipulates recycling as a requirement.

Recommendations for packaging

Uncontaminated packaging may be taken for recycling.

Recommended cleansing agent

Water

SECTION 14: Transport information

	ADR/RID	IMDG	IATA-DGR
14.1. UN number	-	-	-
14.2. UN proper shipping name	-	-	-
14.3. Transport hazard class(es)	-	-	-
14.4. Packing group	-	-	-
14.5. Environmental hazards	-	-	-

14.6. Special precautions for user

No information available.

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

No information available.

Transport/further information

No dangerous goods as defined by the transport regulations - ADR/RID, IMDG, ICAO/IATA-DGR.

SECTION 15: Regulatory information

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

Other regulations (EU)

Please note:

Observe regulation 98/24/EC for employee health protection against the threat of chemical substances in the workplace.

15.2. Chemical Safety Assessment

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

SECTION 16: Other information

Recommended uses and restrictions

National and local regulations concerning chemicals shall be observed.

Further information

Refer to product information paper.

The information contained herein is based on the state of our knowledge. It characterizes the product with regard to the appropriate safety precautions. It does not represent a guarantee of the properties of the product.

Indication of changes: "!" = Data changed compared with the previous version. Previous version: 1.7

Sources of key data used

Results of own researches and examinations
Literature informations
Toxicity studies, NIOSH-Tox-Data
National legislation and regulation