

Safety Data Sheet according to Regulation (EC) No. 1907/2006 (REACH)

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

1.1 Product identifier

Trade name/designation Calcium chloride Anhydrous granular

Product No. PRD5124

Substance name Calcium chloride

CAS No. 10043-52-4 INDEX no. 017-013-00-2

REACH registration No. Not yet communicated down the supply chain.

other means of identification Chloro calcium

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

Relevant identified uses for laboratory use and chemical production.

1.3 Details of the supplier of the safety data sheet

Supplier (manufacturer/importer/only representative/downstream user/distributor)

Better Equipped,
Wrenbury Business Park,
Wrenbury Road,
Wrenbury,
Nantwich, Cheshire,

CW5 8EB, UK

Telephone +44 (0) 800 9707142 Fax +44 (0) 800 066 4443

E-mail address sales@betterequipped.co.uk

1.4 Emergency telephone

Telephone +44 (0)1270 781238

- 2. Hazards identification
- 2.1 Classification of the substance or mixture
- 2.1.1 Classification according to Regulation (EC) No. 1272/2008 [CLP]

hazard classes and hazard categories	Hazard Statements	classification procedure	remark
Eye irritation, category 2	H319		

2.1.2 Classification according to Directive 67/548/EEC or 1999/45/EC

Hazard symbols:	R-phrases
Xi	R36

2.2 Label elements

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



Signal word Warning

Hazard Statements

H319 Causes serious eye irritation.

Precautionary statements

P280	Wear protective gloves/protective clothing/eye protection/face 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.

2.2.2 Labelling (67/548/EEC or 1999/45/EC)

Hazard symbols:

Xi

R-phrases

R36 Irritating to eyes.

S-phrases

S22	Do not breathe dust.
S24	Avoid contact with skin.

2.3 Other hazards

SVHC

3. Composition/ Information on ingredients

Molecular formula CaCl₂

Molecular weight (g/mol) 110.98 g/mol CAS No. 10043-52-4 EC No 233-140-8 INDEX no. 017-013-00-2

4. First-aid measures

4.1 General information

When in doubt or if symptoms are observed, get medical advice. If unconscious place in recovery position and seek medical advice. Never give anything by mouth to an unconscious person or a person with cramps. Change contaminated, saturated clothing. Do not leave affected person unattended.

4.2 After inhalation

Remove casualty to fresh air and keep warm and at rest. If breathing is irregular or stopped, administer artificial respiration. In case of respiratory tract irritation, consult a physician.

4.3 In case of skin contact

After contact with skin, wash immediately with plenty of water and soap. Remove contaminated, saturated clothing immediately. In case of skin reactions, consult a physician.

4.4 After eye contact

In case of contact with eyes flush immediately with plenty of flowing water for 10 to 15 minutes holding eyelids apart and consult an ophthalmologist. Protect uninjured eye. Remove contact lenses, if present and easy to do. Continue rinsing.

4.5 After ingestion

If accidentally swallowed rinse the mouth with plenty of water (only if the person is conscious) and obtain immediate medical attention. Do not induce vomiting. Give nothing to eat or drink.

4.6 Self-protection of the first aider

First aider: Pay attention to self-protection!

4.7 Information to physician:

Symptoms No data available
Hazards No data available
Treatment No data available

5. Firefighting measures

5.1 Suitable extinguishing media

The product itself does not burn. Co-ordinate fire-fighting measures to the fire surroundings.

5.2 Extinguishing media which must not be used for safety reasons:

no restriction

5.3 Special hazards arising from the substance or mixture

In case of fire may be liberated: Carbon dioxide (CO2) Carbon monoxide Hydrogen chloride (HCI) Sulphur oxides

5.4 Advice for firefighters

DO NOT fight fire when fire reaches explosives. In case of fire: Wear self-contained breathing apparatus.

5.5 Additional information

Do not allow run-off from fire-fighting to enter drains or water courses. Do not inhale explosion and combustion gases. Use caution when applying carbon dioxide in confined spaces. Carbon dioxide can displace oxygen. Use water spray jet to protect personnel and to cool endangered containers.

6. Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Avoid generation of dust. Do not breathe dust/fume/gas/mist/vapours/spray. Provide adequate ventilation. Use personal protection equipment.

6.2 Environmental precautions

Do not allow to enter into surface water or drains.

6.3 Methods and material for containment and cleaning up

Spilled product must never be returned to the original container for recycling. Soak up inert absorbent and dispose as waste requiring special attention. Collect in closed and suitable containers for disposal.

6.4 Additional information

Clear spills immediately.

7. Handling and storage

7.1 Precautions for safe handling

Avoid: Inhalation. Avoid contact with skin and eyes. Use extractor hood (laboratory). If handled uncovered, arrangements with local exhaust ventilation have to be used. If local exhaust ventilation is not possible or not sufficient, the entire working area must be ventilated by technical means.

7.2 Conditions for safe storage, including any incompatibilities

storage temperature

15-25°C

Keep container tightly closed in a cool, well-ventilated place.

7.3 Specific end use(s)

No data available

8. Exposure controls / Personal protection

8.1 Control parameters

Does not contain substances above concentration limits fixing an occupational exposure limit.

8.2 Appropriate engineering controls

Technical measures and the application of suitable work processes have priority over personal protection equipment. If handled uncovered, arrangements with local exhaust ventilation have to be used.

8.3 Personal protective equipment

Wear suitable protective clothing. When handling with chemical substances, protective clothing with CE-labels including the four control digits must be worn.

8.3.1 Eye / face protection

Eye glasses with side protection DIN-/EN-Norms: DIN EN 166

8.3.2 Skin protection

When handling with chemical substances, protective gloves must be worn with the CE-label including the four control digits. Recommended glove articles DIN-/EN-Norms: DIN EN 374 In the case of wanting to use the gloves again, clean them before taking off and air them well.

By short-term hand contact

Suitable material: NBR (Nitrile rubber)

Thickness of the glove material 0,12 mm

Breakthrough time (maximum wearing time) >480 min

Recommended glove articles VWR 112-0998

By long-term hand contact

Suitable material: NBR (Nitrile rubber)

Thickness of the glove material 0,38 mm

Breakthrough time (maximum wearing time) >480 min

Recommended glove articles VWR 112-3717 / 112-1381

8.3.3 Protective clothing

Wash hands before breaks and after work. Avoid contact with skin and eyes. When using do not eat, drink or smoke. Provide eye shower and label its location conspicuously.

8.3.4 Respiratory protection

Respiratory protection necessary at: aerosol or mist formation

Suitable respiratory protection apparatus: Filtering Half-face mask (DIN EN 149)

Recommendation VWR 111-0451

Suitable material: P3

Recommendation No data available

8.4 Additional information

Wash hands before breaks and after work. Avoid contact with skin and eyes. When using do not eat, drink or smoke. Provide eye shower and label its location conspicuously.

9. Physical and chemical properties

9.1 Information on basic physical and chemical properties

(a) Appearance

Physical state solid Colour white

(b) Odour No data available (c) Odour threshold No data available

Safety relevant basic data

(d) pH No data available

(e) Melting point/freezing point 772°C

(f) Initial boiling point and boiling range
(g) Flash point
No data available
(h) Evaporation rate
No data available
(i) Flammability (solid, gas)
not applicable

(j) Upper/lower flammability or explosive limits

Lower explosion limit (Vol-%)
Upper explosion limit (Vol-%)
No data available
No data available
(k) Vapour pressure
No data available
(l) Vapour density
No data available
(m) Relative density
2.174 g/cm³ (20°C)

(n) Solubility(ies)

Water solubility (g/l) 740 g/l (20°C)

at °C: 20

Soluble (g/l) in

No data available

(o) Partition coefficient: n-octanol/water

(p) Auto-ignition temperature

No data available

No data available

No data available

No data available

(r) Viscosity

Kinematic viscosity
Dynamic viscosity
No data available
No data available
(s) Explosive properties
not applicable
(t) Oxidising properties
not applicable

9.2 Other information

Bulk density
Ro data available
refraction index
Ro data available
dissociation constant
Ro data available
Surface tension
Ro data available
Henry constant
Ro data available
No data available

10. Stability and reactivity

10.1 Reactivity					
No data available					
10.2 Chemical stability					
No data available					
0.3 Possibility of hazardous reactions					
No data available	No data available				
10.4 Conditions to avoid					
No data available					
10.5 Incompatible materials No data available 10.6 Hazardous decomposition products No data available					
			10.7 Additional information		
			No data available		
11. Toxicological information					
11.1 Information on toxicological effects					
Acute effects					
Acute oral toxicity	LB50 4000 #				
Effective dose	LD50: 1000 mg/kg				
species:	rat				
Exposure time remark					
source	IUCLID				
Source	IOCLID				
Acute dermal toxicity					
Effective dose	LD50: 2630 mg/kg				
species:	rat				
Exposure time					
remark					
source	IUCLID				
Acute inhalation toxicity					

No data available species: Exposure time remark source Irritant and corrosive effects Primary irritation to the skin Exposure time species: Result Irritation to eyes Exposure time species: Result Irritation to respiratory tract Exposure time species: Result Sensitisation In case of skin contact not sensitising. not sensitising. After inhalation Specific target organ toxicity (single exposure) not relevant Specific target organ toxicity (repeated exposure) not relevant CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction) Carcinogenicity No indication of human carcinogenicity. Germ cell mutagenicity/Genotoxicity No indications of human germ cell mutagenicity exist. Reproductive toxicity

No indications of human reproductive toxicity exist.

Aspiration hazard

11.2 Other adverse effects

No data available

11.3 Additional information

No data available

12. Ecological information

12.1 Ecotoxicity

Acute (short-term) fish toxicity

LC50:

EC50 species: Exposure time

Chronic (long-term) fish toxicity

LC50: No data available

No data available

EC50 species: Exposure time

Acute (short-term) daphnia toxicity

LC50: No data available

EC50 species: Exposure time

Chronic (long-term) daphnia toxicity

LC50: No data available

EC50 species: Exposure time

Acute (short-term) algae toxicity

LC50: No data available

EC50 species: Exposure time

Chronic (long-term) algae toxicity

LC50: No data available

EC50 species: Exposure time

12.2 Persistence and degradability

No data available

12.3 Bioaccumulative potential	
(o) Partition coefficient: n-octanol/water	No data available
12.4 Mobility in soil	
No data available	
12.5 Results of PBT assessment	
No data available	
INO data avaliable	
12.6 Other adverse effects	
No data available	
13. Disposal considerations	
13.1 Waste treatment methods	
Appropriate disposal / Product	
Dispose according to legislation. Consult the appropriate legislation.	ocal waste disposal expert about waste disposal.
Waste code product	No data available
Waste code product Appropriate disposal / Package	No data available
	No data available
Appropriate disposal / Package	No data available
Appropriate disposal / Package 13.2 Additional information	No data available
Appropriate disposal / Package 13.2 Additional information	No data available
Appropriate disposal / Package 13.2 Additional information No data available	No data available
Appropriate disposal / Package 13.2 Additional information No data available 14. Transport information	No data available
Appropriate disposal / Package 13.2 Additional information No data available 14. Transport information 14.1 Land transport (ADR/RID)	No data available
Appropriate disposal / Package 13.2 Additional information No data available 14. Transport information 14.1 Land transport (ADR/RID) No dangerous good in sense of these transport regulations.	No data available
Appropriate disposal / Package 13.2 Additional information No data available 14. Transport information 14.1 Land transport (ADR/RID) No dangerous good in sense of these transport regulations. 14.2 Sea transport (IMDG)	No data available
Appropriate disposal / Package 13.2 Additional information No data available 14. Transport information 14.1 Land transport (ADR/RID) No dangerous good in sense of these transport regulations. 14.2 Sea transport (IMDG) No dangerous good in sense of these transport regulations.	No data available
Appropriate disposal / Package 13.2 Additional information No data available 14. Transport information 14.1 Land transport (ADR/RID) No dangerous good in sense of these transport regulations. 14.2 Sea transport (IMDG) No dangerous good in sense of these transport regulations. 14.3 Air transport (ICAO-TI / IATA-DGR)	No data available

15. Regu	ulatory	informa	ation
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15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

Water hazard class (WGK)

1

15.2 Chemical Safety Assessment

No data available

16. Other information

16.1 Relevant R-, H- and EUH-phrases (Number and full text)

R36	Irritating to eyes.

H319 Causes serious eye irritation.

16.2 Additional information

Indication of changes

general update

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.