

According to 29 CFR 1910.1200

CALCIUM CHLORIDE

Date of issue: July 01, 2009 Revision date: September 01, 2023 Version. 4

SECTION 1.- IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier

Product formSubstance.Substance nameCalcium Chloride.CAS No.10043-52-4

Formula CaCl₂

Synonyms Not available.

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

Use of the substance/mixture Fertilizers

1.3 Details of the supplier of the safety data sheet

Pima Chemicals & Fertilizers, LLC Química Pima, S.A. de C.V.

1370 Nogales, Az.

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Del Cobre 20, Parque Industrial Hermosillo.

Hermosillo, Sonora, México. C.P. 83297

Tel. 011 (662) 251-0010 ventas@qpima.com

1.4 Emergency telephone number

Emergency number CHEMTREC (24HR Emergency Telephone), call: 1-800-424-9300

SECTION 2.- HAZARD IDENTIFICATION

2.1. GHS-US classification

Eye Irrit. 2A H319

2.2. Label elements

GHS-US labelling

Hazard pictograms (GHS-US)

Warning

Signal word (GHS-US):

Hazard statement (GHS-US):

H319 Causes serious eye irritation.

Precautionary statements (GHS-US): P264 Wash hands thoroughly after handling.

P270 Do not eat, drink or smoke when using this product. P271 Use only outdoors or in a well-ventilated area.

P273 Avoid release to the environment.

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

P302 + P352 IF ON SKIN: Wash with plenty of water.

P304+P340 IF INHALED: Remove person to fresh air and keep comfortable for

breathing.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing. P337+P313 If eye irritation persists: Get medical advice/attention.



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P403 Store in a well-ventilated place. Store away from incompatible.

P501 Dispose of contents/container in accordance with local/regional/national/

international regulations.

2.3. Other hazards None.

2.4 Unknown acute toxicity (GHS-US)Not applicable.

SECTION 3.- COMPOSICION / INFORMATION OF INGREDIENTS

3.1 Substance

Substance type Mono-constituent.

Name	Product identifier	%	GHS-US classification
Calcium Chloride	(CAS No.) 10043-52-4	> 94.00	Eye irrit. 2A, H319

3.2 Mixture Not applicable.

SECTION 4.- FIRST AID MEASURE

4.1. Description of first air measure

First-aid measures general

Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice.

First-aid measures after eve contact

Rinse cautiously with water for at least 15 minutes, raising and lowering eyelids occasionally. Remove contact lenses, if present and easy to do. Continue rinsing. If eye irritation persists: Get medical advice/attention.

First-aid measures after skin contact

Flush contaminated skin with plenty of water. Remove contaminated clothing and shoes. Get medical attention if symptoms occur. Wash clothing before reuse. Clean shoes thoroughly before reuse.

First-aid measures after inhalation

Remove victim to fresh air and keep at rest in a position comfortable for breathing. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Get medical attention if adverse health effects persist or are severe. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

First-aid measures after ingestion

Wash out mouth with water. Remove dentures if any. Remove victim to fresh air and keep at rest in a position comfortable for breathing. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Get medical attention if adverse health effects persist or are severe. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

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

Symptoms/injuries after inhalation No known significant effects or critical hazards.

Symptoms/injuries after skin contact No known significant effects or critical hazards.

Symptoms/injuries after eye contact Causes serious eye irritation.

Symptoms/injuries after ingestion Irritating to mouth, throat and stomach.



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Chronic symptoms

No known significant effects or critical hazards.

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

Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

SECTION 5.- FIREFIGHTING MEASURES

5.1. Extinguishing media

Suitable extinguishing media Use an extinguishing agent suitable for the surrounding fire.

None known. Unsuitable extinguishing media

5.2. Special hazard arising from the substance or mixture

Fire hazard No specific fire hazard.

Explosion hazard No specific explosion hazard.

Hazard thermal Decomposition products may include the following materials: halogenated compounds, metal

oxide/oxides. decomposition products

5.3. Advice for firefighters

Fire-fighters should wear appropriate protective equipment and self-contained breathing Protective equipment

apparatus (SCBA) with a full face-piece operated in positive pressure mode.

Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a **Emergency procedures**

fire. No action shall be taken involving any personal risk or without suitable training.

SECTION 6.- ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

6.1.1. For non-emergency personnel

Protective equipment Safety glasses.

> No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Provide adequate ventilation.

> Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal

protective equipment.

6.1.2. For emergency responders

If specialized clothing is required to deal with the spillage, take note of any information

in Section 8 on suitable and unsuitable materials. See also the information in "For non-

emergency personnel".

Do not breathe fumes or vapors from fire decomposition. If possible, stop flow of Emergency procedures

product. Contain and collect any solid. Ventilate area.

6.2. Environmental precautions

Protective equipment

Emergency procedures

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

6.3. Methods and material for containment and cleaning up.

Move containers from spill area. Avoid dust generation. Using a vacuum with HEPA filter will reduce Small spill

dust dispersal. Place spilled material in a designated, labeled waste container. Dispose of via a

licensed waste disposal contractor.



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Large spill

Move containers from spill area. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Avoid dust generation. Do not dry sweep. Vacuum dust with equipment fitted with a HEPA filter and place in a closed, labeled waste container. Dispose of via a licensed waste disposal contractor. Note: see Section 1 for emergency contact information and Section 13 for waste disposal.

6.4 Reference to other sections

See Heading 8. Exposure controls and personal protection.

SECTION 7.- HANDLING AND STORAGE

7.1. Precautions for safe handling

Protective measures

Put on appropriate personal protective equipment (see Section 8). Do not ingest. Avoid contact with eyes, skin and clothing. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container.

Advice on general occupational hygiene

Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions

Store in accordance with local regulations. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

Incompatible products
Incompatible
materials

See Section 10.
See Section 10.

7.3 Specific end use(s)

No additional information available.

accurately estimated.

SECTION 8.- EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Calcium chloride 10043-52-4	Not available.	Not available.	Not available.

8.2. Exposure controls

Hygiene measures

Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location. Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be

Hand protection



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Eye protection

Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles.

Respiratory protection

Use a properly fitted, particulate filter respirator complying with an approved standard if a risk assessment indicates this is necessary. Respirator selection must be based on known or anticipated exposure levels, the hazards of the product and the safe working limits of the

selected respirator.

Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before Other information

handling this product.

SECTION 9.- PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Solid. Physical state: Appearance: Crystalline/white solid. Powder. Grains

Odor: Odorless. Color: White.

Molecular mass 110.98 g/mol Odor threshold No data available. No data available. Ha

No data available. pH solution Relative evaporation rate (butyl acetate=1) No data available. Melting/Freezing point 772°C(1421.6°F) **Boiling point** 1935°C (3515°F)

No data available. Flash point No data available. Self ignition temperature No data available. **Decomposition temperature** No data available. Flammability (solid, gas) Vapor pressure No data available.

2.512 Relative vapor density at 20°C lb/ft3@25°C/77°F

Relative density 2.16 Specific volume 0.3981

lb/ft3

Solubility Water: 745 g/l Log Pow No data available. Log Kow No data available. Viscosity, kinematic No data available. Viscosity, dynamic No data available. No data available. **Explosive properties** No data available. **Oxidizing properties**

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Explosive limits

No data available.

9.2 Other information

No additional information available.

SECTION 10.- STABILITY AND REACTIVITY

10.1 ReactivityNo specific test data related to reactivity available for this product or its ingredients.

10.2 Chemical stabilityStable under recommended storage conditions.

10.3 Possibility of hazardous reactions Under normal conditions of storage and use, hazardous reactions will not occur.

10.4 Conditions to avoidDirect sunlight. Extremely high or low temperatures.

10.5 Incompatible materials

Incompatible with zinc, strong acids, methyl vinyl ether, bromine trifluoride, boron oxide,

calcium oxide. Hygroscopic.

10.6 Hazardous decomposition products Hydrogen chloride.

SECTION 11.-TOXICOLOGICAL INFORMATION

11. 1. Information on toxicological effects

Acute toxicity Not classified.

Name	LD ₅₀ oral	LD ₅₀ dermal	LC_{50} inhalation
Calcium chloride	1 kg/kg (rat)	-	•

Skin corrosion/irritation No known significant effects or critical hazards.

Serious eye damage/irritation Causes serious eye irritation.

Respiratory or skin sensitization Not available.

Germ cell mutagenicity

No known significant effects or critical hazards.

Carcinogenicity

No known significant effects or critical hazards.

Reproductive toxicity

No known significant effects or critical hazards.

Specific target toxicity (single exposure)

Specific target toxicity (repeat exposure)

Not available.

Aspiration hazard

Not available.

Potential adverse human health effects and symptoms Based on available data, the classification criteria are not met.

SECTION 12. ECOLOGICAL INFORMATION

12.1 Toxicity

Calcium Chloride (10043-52-4)		
Algae - Navicula seminulum	Acute EC ₅₀ 3,130,000 μg/l Fresh water - 96 hours	
Daphnia - Daphnia magna	Acute EC50 52,000 μg/l Fresh water - 48 hours	
Crustaceans - Americamysis bahia	Acute LC50 270 mg/l Marine water - 48 hours	
Fish - Pimephales promela	Acute LC50 2110 mg/l Fresh water - 96 hours	

12.2 Persistence and degradability

Calcium Chloride (10043-52-4)	
Persistence and degradability	Not available.



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12.3 Bioaccumulative potential

Calcium Chloride (10043-52-4)

Bioaccumulative potential Not available.

12.4 Mobility in soil

No additional information available.

12.5 Other adverse effects

Other information No known significant effects or critical hazards.

SECTION 13.- DISPOSAL CONSIDERATIONS

13.1. Waste treatment methods

Waste disposal recommendations

The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible. Care should be taken when handling empty containers that have not been cleaned or rinsed.

Ecology-waste materials

SECTION 14.- TRANSPORT INFORMATION

14.1. UN numberNot regulated.14.2. UN proper shipping nameNot regulated.

14.3. Additional information

Other information Not regulated.

Overland transport Not regulated.

Transport by sea Not regulated.

Air transport Not regulated.

SECTION 15.- REGULATORY INFORMATION

15.1 US Federal regulations

Calcium Chloride (10043-52-4)

Not listed on the United States TSCA (Toxic Substances Control Act) inventory

15.2 International regulations

CANADA

Calcium Chloride (10043-52-4)

Not listed on the Canadian DSL (Domestic Substances List) inventory.



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WHMIS Classification

Class D Division 2 Subdivision B - Toxic material causing other toxic effects

EU-Regulations

No additional information available.

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

Eye Irrit. 2A H319

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

Xi: R36

HMIS III

15.2.2. National regulations

Calcium Chloride (10043-52-4)

Not listed on the Canadian Ingredient Disclosure List.

15.3 US State regulations

No additional information available.

SECTION 16.- OTHER INFORMATION

Health

NFPA NFPA health hazard 2 NFPA fire ha

NFPA fire hazard 0 NFPA instability hazard

0 Physical

0 NFPA Special hazard

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Personal Protection

Ε

E Safety glasses, gloves and dust respirator.

Other information: None.

Made for: Quimica Pima, S.A. de C.V. Del Cobre No. 20 Parque Industrial. Hermosillo, Sonora, México. 83297.

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Flammability

September 01, 2023. 4th rev. Syntax and spelling improvements and corrections were made.

IMPORTANT NOTE: Information in this SDS is from available published sources and is believed to be accurate, but is not exhaustive and will be used only as a guide, which is based on current knowledge of the chemical substance or mixture and apply to the appropriate product for safety precautions. No warranty, express or implied, is made and Pima Chemicals & Fertilizers, LLC and Quimica Pima, S.A. de C.V. assumes no liability resulting from the use of this SDS. The user must determine suitability of this information for his application.

End of Safety Data Sheet