

SAFETY DATA SHEET

Additive: PRO-Mix Fast

Section 1: Identification of the Material and Supplier

Company Details

Cement Australia Pty Limited

ABN 75 104 053 474

18 Station Avenue
Darra, Queensland 4076**Tel:** 1300 CEMENT (1300 236 368)**Fax:** 1800 CEMENT (1800 236 368)**Website:** www.cementaustralia.com.au / www.mixitlikeapro.com.au

Emergency Contact Number:

Contact Person: Technical Manager

Telephone: 1300 CEMENT (1300 236 368) (Business Hours) or

Poisons Information Centre 13 11 26

Manufacturing Plants

Coopers Plains:

Alton Street, Coopers Plains, 4108 QLD

Product

Name: PRO-Mix Fast**Use:** PRO-Mix Fast is a concrete additive used to accelerate the setting and strength development of Portland cement concrete.

Section 2: Hazards Identification

Classified as hazardous per Safe Work Australia criteria. Not classified as a dangerous goods by the criteria of the ADG code, IMDG or IATA

**Warning:** Irritant

Risk Phrases

R20/21/22: Harmful by inhalation, in contact with skin and if swallowed.**R36/37/38:** Irritating to eyes, respiratory system and skin.**R43:** May cause sensitisation by skin contact.**R66:** Repeated exposure may cause skin dryness or cracking.

Safety Phrases

S22: Do not breathe dust.**S24/25/26:** Avoid contact with skin and eyes. In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.**S29:** Do not empty into drains.**S36/37/39:** Wear suitable protective clothing, gloves and eye/face protection.

Section 3: Composition/Information on Ingredients

Chemical Entity	Proportion	CAS Number
Portland Cement Clinker	30-60%	65997-15-1
Calcium Formate	30-60%	544-17-2
Gypsum (CaSO ₄ 2H ₂ O)	<10%	10101-41-4
Limestone (CaCO ₃)	<10%	1317-65-3
Calcium Oxide	<10%	1305-78-8
Hexavalent Chromium Cr (VI)	<20 ppm	1333-82-0
Crystalline Silica (Quartz)	<1%	14808-60-7

For more information call 1300 CEMENT (1300 236 368)
or visit www.cementaustralia.com.au*Mix it with the best.*

Section 4: First Aid Measures

Swallowed:	Rinse mouth and lips with water provided the person is conscious. Do not induce vomiting. Seek medical attention.
Eyes:	Flush thoroughly with flowing water for 15 minutes to remove all traces. If symptoms such as irritation or redness persist, seek medical attention. If wet material is splashed in the eye, always treat as above, and seek urgent medical attention.
Skin:	Remove heavily contaminated clothing immediately. Wash off skin thoroughly with water. Use a mild soap if available. Shower if necessary. Seek medical attention for persistent irritation or burning of the skin.
Inhaled:	Remove to fresh air, away from dusty area. If symptoms persist, seek medical attention. If not breathing give artificial respiration. If breathing is difficult, give oxygen.
First Aid Facilities:	Eye wash station. Washing facilities with running water.
Advice to Doctor:	Treat symptomatically. This material product contains Portland cement. Wet cement burns to skin or eye may result in corrosive caustic burns. Ingestion of significant amounts of cement dry or wet is unlikely. Do not induce emesis or perform gastric lavage. Neutralization with acidic agents is not advised because of increased risks of exothermic burns. Water-mineral oil soaks may aid in removing hardened cement from the skin. Ophthalmological opinion should be sought for ocular burns.

Section 5: Fire Fighting Measures

Fire/Explosion Hazard:	None
Hazchem Code:	None allocated
Flammability:	Non flammable
Extinguishing Media:	Water spray, carbon dioxide, dry chemical or appropriate foam
Hazards from Combustion Products:	Emits toxic fumes under fire conditions
Special Protective Precautions and equipment for fire fighters:	Wear self-contained breathing apparatus and protective clothing to prevent contact with skin and eyes

Section 6: Accidental Release Measures

Spills:	Spills are best cleaned up by vacuum device or covered with moist soil to prevent dust generation and dispose of to approved Council landfill. Ventilate area and wash spill site after material clean-up is complete. Recommendations on Exposure Control and Personal Protection should be followed during spill clean-up. Keep product out of storm water and sewer drains.
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Section 7: Handling and Storage

Handling:	Do not breathe dust. Avoid contact with eyes, skin, and clothing. Avoid prolonged or repeated exposure.
Storage:	Protect from moisture to prevent hardening.

Section 8: Exposure Controls/Personal Protection

Exposure Limits:	National Occupational Health & Safety Commission (NOHSC) Australia Occupational Exposure Standard: Exposure to dust should be kept as low as practicable, and below the following OES. Portland Cement: 10mg/m ³ TWA (time-weighted average) as inspirable dust. Crystalline silica (quartz): 0.1 mg/m ³ TWA as respirable dust (<7 microns particle equivalent aerodynamic diameter). Chromium VI (hexavalent): 0.05 mg/m ³ - sensitiser.
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Section 8: Exposure Controls/Personal Protection (Cont'd)

Engineering Controls: All work with dry powder should be carried out in such a way as to minimise dust generation, exposure to dust and repeated or extended skin contact. When handling dry powder, use local mechanical ventilation or extraction in areas where dust could escape into the work environment. For handling of individual bags, follow instructions below if no local exhaust ventilation is available. Work methods and engineering should aim to minimise contact with wet materials onto exposed skin. Work areas should be cleaned regularly.

Personal Protection

Skin: Minimise contact with all associated materials. When handling dry materials or wet cement, wet concrete, mortar or grout, personnel should wear protective clothing and impervious footwear, and gloves such as PVC (see Australian and New Zealand Standards AS/NZS 4501 and AS 2161). Never kneel in wet materials, or allow extended contact of skin with wet materials. Remove clothing which has become contaminated with wet or dry materials to avoid prolonged contact with the skin. If materials gets into boots, remove socks and boots immediately and wash skin thoroughly. Wash work clothes regularly. To avoid contamination of face and lips and ingestion, wash hands before eating or smoking.

Eyes: Splash resistant Safety Glasses with side shields or safety goggles (AS/NZ 1336) or a face shield should be worn to ensure all contact with eyes is avoided.

Respiratory: Where engineering and handling controls are not adequate to minimise exposure to total dust and to respirable crystalline silica wear a suitable P1 or P2 particulate respirator (AS/NZS 1715 and AS/NZS 1716). Use only respirators that bear the Australian Standards mark and are fitted and maintained correctly. For dust levels approaching or exceeding the NES (see above) a more effective particulate respirator as described in AS/NZS 1715 should be worn. Procedures for effective use of respirators should be applied and supervised.

Hygiene Measures: Wash thoroughly after handling

Section 9: Physical and Chemical Properties

Appearance:	A fine powder ranging in colour from grey to off-white
Odour:	No distinctive odour
pH:	>11
Vapour Pressure:	Not applicable
Vapour Density:	Not applicable
Boiling Point:	Not applicable
Melting Point:	Not applicable
Solubility In Water:	Soluble
Flash Point:	Not applicable
Flammability Limits:	Not applicable
Ignition Temperature:	Not applicable
Particle Size:	Up to 50% of the fresh dry material may be respirable (below 10 microns)
Decomposition Temperature:	>300°C

Section 10: Stability and Reactivity

Chemical Stability:	Chemically Stable
Conditions to Avoid:	Keep free of moisture
Incompatible Materials:	None
Hazardous Decomposition Products:	Carbon monoxide, Carbon dioxide, Calcium oxide
Hazardous Reactions:	None, Polymerization will not occur

Section 11: Toxicological Information

Short Term (Acute) Exposure

- Swallowed:** May be harmful if swallowed (Unlikely under normal industrial use). Mildly abrasive and corrosive to mouth and throat if swallowed. May cause nausea, stomach cramps and constipation.
- Eyes:** Irritating and corrosive to the eyes and may cause alkaline burns. Exposure to dust may aggravate existing eye irritations.
- Skin:** Dust is irritating and drying to the skin. May be harmful if absorbed through the skin. Direct contact with wet material may cause serious skin burns. Within 12 to 48 hours (after one- to six-hour exposures) possible first, second or third degree burns may occur. There may be no obvious pain at the time of the exposure. Chronic skin disorders may be aggravated by exposure to dust or contact with wet material.
- Inhaled:** May be harmful if inhaled. Dust is irritating to the nose, throat and respiratory tract causing coughing and sneezing. Pre-existing upper respiratory and lung diseases including asthma and bronchitis may be aggravated. Material is irritating to mucous membranes and upper respiratory tract.

Long Term (Chronic) Exposure

- Eyes:** Dust may cause irritation and inflammation of the cornea.
- Skin:** Repeated contact causes irritation and drying of the skin and can result in skin reddening and skin rash (dermatitis). Over time this may become chronic and can also become infected. Persons who are allergic to chromium may develop an allergic dermatitis which aggravates the irritant effects and this combination can lead to chronic cement dermatitis and serious disability particularly affecting the hands.
- Inhaled:** Repeated exposure to the dust may result in increased nasal and respiratory secretions and coughing. Inflammation of lining tissue of the respiratory system may follow repeated exposure to high levels of dust, with increased risk of bronchitis and pneumonia. Repeated and prolonged exposure to dust levels which exceed the OES for crystalline silica (see above) may occur. This can cause bronchitis, and silicosis (scarring of the lung). Long term overexposure to respirable crystalline silica dust may increase the risk of other irreversible and serious disorders including scleroderma (a disease affecting the connective tissue of the skin, joints, blood vessels and internal organs). Cement (Portland Cement) is not classified as a carcinogen by NOHSC. Of the ingredients Hexavalent Chromium (Cr VI) is classified as a carcinogen by NOHSC. There is debate in the medical literature concerning whether there is any risk of lung cancer arising from long term high overexposure to respirable crystalline silica. Risk of lung cancer has not been identified from using Portland Cements containing silica. The International Agency for Research on Cancer (IARC) has classified crystalline silica, inhaled in the form of quartz or Cristobalite from occupational sources, as carcinogenic to humans (Group 1). NOHSC has not classified crystalline silica as a carcinogen.

Toxicity data QUARTZ (SILICA CRYSTALLINE) (14808-60-7)
LCLo (inhalation) 300 ug/m³/10 years (human)
TCLo (inhalation) 16 000 000 particles/ft³/8 hours/17.9 years (human-fibrosis)
GYPSUM (13397-24-5)
TCLo (inhalation) 194 g/m³/10 years intermittently (human)
TDLo (ingestion) 450 mg/kg/3 weeks intermittently (rat)
RTECS NUMBER: LQ5600000
ACUTE TOXICITY
Remarks: Moderate irritation effect
LD50 Oral (Rat) 2650 mg/kg
LD50 Oral (Mouse) 1920 mg/kg
LD50 Intravenous (Mouse) 154 MG/KG
IRRITATION DATA
Eyes (Rabbit) 100 mg 24H

Section 12: Ecological Information

This product is not anticipated to cause adverse effects to animal or plant life if released to the environment in small quantities. Not expected to bioaccumulate.

- Ecotoxicity:** Product forms an alkaline slurry when mixed with water.
- Persistence and Degradability:** No data available
- Mobility:** No data available

Section 13: Disposal Considerations

Smaller quantities can be disposed of with household waste to approved Council landfill. Keep material out of sewer, storm water drains, and natural waterways. Exposure and personal precautions should be observed (see above).

Section 14: Transport Information

Transportation is done in bag form by Ship, Rail and Road.

UN Number:	None allocated
Proper Shipping Name:	None allocated
Class and Subsidiary Risk:	None allocated
Packing Group:	None allocated
Special precautions for user:	Avoid generating and breathing dust
Hazchem Code:	None allocated
	RID/ADR Non-hazardous for road transport.
	IMDG Non-hazardous for sea transport.
	IATA Non-hazardous for air transport.

Section 15: Regulatory Information

PRO-Mix Fast is not classified as Dangerous Goods.

Classified as Hazardous according to the criteria of the National Occupational Health and Safety Commission (NOHSC) approved Criteria For Classifying Hazardous Substances [NOHSC:1008] 3rd Edition Exposures by inhalation to high levels of dust may be regulated under the Hazardous Substances Regulations (State) as they are applicable to Respirable Crystalline silica, requiring exposure assessment, controls and health surveillance (NOHSC).

Section 16: Other Information

For further information on this product contact:	Telephone: 1300 CEMENT (1300 236 368) (Business Hours)
	Facsimile: 1800 CEMENT (1800 236 368)

Next Review Date for this MSDS: 31 December 2020.

Australian and New Zealand Standards:

AS 2161: Industrial Safety Gloves and Mittens (excluding electrical and medical gloves).

AS/NZ 1336: Recommended Practices for Occupational Eye Protection.

AS/NZS 1715: Selection, use and maintenance of respiratory protective devices.

AS/NZS 1716: Respiratory protective devices.

AS/NZS 4501: Occupational protective clothing.

Advice Note:

Cement Australia believes the information in this document to be accurate as at the date of preparation noted below, but, to the maximum extent permitted by law, Cement Australia accepts no responsibility for any loss or damage caused by any person acting or refraining from action because of this information.

The provision of this information should not be construed by anyone as a recommendation to use this product. In particular, no one should use any product in violation of any patent or other intellectual proprietary rights or in breach of any statute or regulation.

Users should rely on their own knowledge and inquiries and make their own determination as to the applicability of this information in relation to their particular purposes and specific circumstances. Each user should read this MSDS and consider the information in the context of how the product will be handled and used in the workplace and in conjunction with other substances or products.