


# SAFETY DATA SHEET GB AND CG

## Section 1: Identification of the Substance and Supplier

<b>Product name</b>	<b>Cement type, GB and CG</b>
<b>CAS number</b>	65997-15-1
<b>Recommended use</b>	Used in commercial, industrial and residential construction including structural concrete, mortars, renders, grouts and cement based products, and can also be used as a general binder for applications such as soil stabilisation.
<b>Company details</b>	<p style="margin-left: 20px;">Golden Bay Cement</p> <p style="margin-left: 20px;">Address: Portland Road PO BOX 1143, Whangarei</p> <p style="margin-left: 20px;">Phone: 09 432 2656</p> <p style="margin-left: 20px;">Hours 7.30am – 4 pm, Mon – Fri</p>
<b>Emergency telephone</b>	0800 764 766 (0800 POISON) 24 hours human health.
<b>Date of preparation</b>	May 2011

## Section 2: Hazards Identification

<b>Hazard classifications</b>	Classified as hazardous according to criteria in the Hazardous Substances (Minimum Degrees of Hazard) Regulations 2001.
<b>HSNO approval number</b>	Classified under the group standard: Construction Products (Corrosive [8.2C]) (toxic [6.7A]) Group Standard 2006.
<b>HSNO approval number</b>	HSR002543
<b>Hazard classification</b>	<p>6.3A Skin irritant</p> <p>6.5A Respiratory sensitiser</p> <p>6.7A Carcinogenic</p> <p>6.8B Substances that are suspected human reproductive or developmental toxicants</p> <p>6.9B Target organ toxicant</p> <p>8.3A Eye corrosive</p> <p>9.1C—Substances that are harmful in the aquatic environment</p> <div style="text-align: center; margin-top: 20px;">  </div>

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<b>HAZARD STATEMENTS</b>	<p>H315 Causes skin irritation.  H318 Causes serious eye damage.  H352 May cause cancer by inhalation  H363 May cause damage to organs by inhalation through prolonged or repeated exposure  H334 May cause allergy or asthma symptoms or breathing difficulties if inhaled.  H355 Suspected of damaging fertility or the unborn child by inhalation.  H412 Harmful to aquatic life with long lasting effects.</p>
<b>WARNING</b>	<p>Read label before use and keep out of reach of children  May be harmful if inhaled and cause respiratory irritation.  Causes skin irritation including allergic skin irritations.  If medical advice is needed have product container or label at hand.</p>

## Section 3: Composition/Information on Ingredients

Chemical name	CAS number	Concentration
Portland Cement comprising:		
3CaO.SiO <sub>2</sub>	12168-85-3	
2CaO.SiO <sub>2</sub>	10034-77-2	
3CaO.Al <sub>2</sub> O <sub>3</sub>	12042-78-3	93.5 - 96%
4CaO..Al <sub>2</sub> O <sub>3</sub> Fe <sub>2</sub> O <sub>3</sub>	12068-35-8	
CaSO <sub>2</sub> .2H <sub>2</sub> O	13397-24-5	
Gypsum	7778-18-9	4.0-6.5 % by weight
Respirable quartz (CAS#) – greater than	14808-60-7	0.1% by weight
Hexavalent chromium (Cr(VI))	18540-29-9	< 20ppm (approx)

Trace amounts of naturally occurring chemicals might be detected during chemical analysis. Trace constituents may include up to 0.75% insoluble residue, some of which may be free crystalline silica, calcium oxide (Also known as lime or quick lime), magnesium oxide, potassium sulfate, sodium sulfate, and nickel compounds. **Note:** Composition is dependent upon product origin.

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## Section 4: First Aid measures

<b>Necessary first aid measures</b>	<p>If medical advice is needed, have the product container or label at hand.</p> <p><b>SWALLOWED:</b> Rinse mouth. Do NOT induce vomiting. Call the poison centre or doctor/ physician.</p> <p><b>INHALATION:</b> Remove to fresh air. Do not induce vomiting. If breathing is difficult keep at rest in a position comfortable for breathing. If experiencing respiratory symptoms or if feeling unwell, call the poison centre or doctor.</p> <p><b>EYE CONTACT:</b> Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do so. Continue rinsing for at least 15 minutes. Keep patient calm. Immediately call the poison centre or doctor.</p> <p><b>SKIN CONTACT:</b> Remove contaminated clothing and wash with plenty of soap and water. Seek medical attention if irritation or rash develops. If exposed or concerned, seek medical advice. Launder contaminated clothing before reuse.</p>
<b>Required instructions</b>	For advice contact the National Poisons Centre 0800 POISON (0800 764 766) or a doctor.
<b>Workplace facilities</b>	Eye wash and safety shower facilities are recommended.

## Section 5: Fire Fighting Measures

<b>Type of hazard</b>	Not classified as flammable.
<b>Fire hazard</b>	Non flammable. No fire or explosion hazard exists.
<b>Fire properties</b>	
<b>Regulatory requirements</b>	Not applicable.
<b>Extinguishing media and methods</b>	Not applicable.
<b>Hazchem code for fire</b>	Not applicable.
<b>Recommended protective clothing</b>	Not applicable.

### Section 6: Accidental Release Measures

<b>Emergency procedures</b>	If spilt (bulk), contact emergency services if appropriate. Wear dust-proof goggles, PVC/rubber gloves, a Class P1 (Particulate) Respirator (where an inhalation risk exists), coveralls and rubber boots. Prevent spill from entering drains or waterways. Collect and place in sealable containers for disposal. Avoid generating dust.
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### Section 7: Handling and Storage

<b>Precautions for safe handling</b>	Obtain special instructions and read safety data sheet before use. Do not handle until all safety precautions have been read and understood. Do not breathe dust. Wear protective gloves, eye and face protection. Use only outdoors in a well ventilated area.
<b>Regulatory requirements</b>	Approved handlers and tracking not required. Corrosive signage required where quantities greater than 1,000kg are present. Level 2 Emergency response plans for Corrosive response are required where quantities greater than 1,000kg are present. Level 3 Emergency response plans for Corrosive response are required when holding more than 10,000kg.
<b>Handling practices</b>	Avoid contact with eyes and wear eye protection. Keep containers adequately sealed during material transfer, transport, or when not in use. Use safe work practices to avoid eye or skin contact and inhalation. Observe good personal hygiene, including washing hands before eating. Prohibit eating, drinking and smoking in contaminated areas (e.g. if container is damaged). Wash exposed skin thoroughly after handling.
<b>Conditions for safe storage</b>	Ensure packages are adequately labelled, protected from physical damage and sealed when not in use.
<b>Store site requirements</b>	Store in a cool, dry, well-ventilated area, away from moisture, oxidising agents (e.g. hydrogen fluoride, phosphorus oxide), acids, ethanol, inter-halogens (e.g. chlorine trifluoride) and foodstuffs.
<b>Packaging</b>	Ensure packages are adequately labelled, protected from physical damage and sealed when not in use.

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**Section 8: Exposure Control/Personal Protection**

<b>Workplace exposure standards</b>	<p>NIOSH REL : TWA 10 mg/m<sup>3</sup> (total) TWA 5 mg/m<sup>3</sup> (resp)          OSHA PEL †: TWA 50 mppcf          Hexavalent chromium (CR(VI)) (18540-29-9) TWA 0.05 mg/m<sup>3</sup></p>
<b>Application in the workplace</b>	Use with adequate natural ventilation. Where dust inhalation hazard exists, mechanical extraction ventilation is recommended.
<b>Exposure standards</b>	No TEL or EEL is set for this substance at this time.
<b>outside the workplace Personal protection</b>	Wear dust-proof goggles and rubber or PVC gloves. At high dust levels, wear a class P3 (particulate) respirator or a powered air purifying respirator (PAPR) with class P3 (particulate) filter. Where an inhalation risk exists, wear a class P1 (particulate) respirator. When using large quantities or where heavy contamination is likely, wear overalls. Contaminated work clothing should not be allowed out of the workplace.
<b>Engineering controls</b>	Where possible ventilation should be used (with a suitable dust trap or filter) to maintain the environment below the workplace exposure standard.

**Section 9: Physical and Chemical Properties**

<b>Appearance</b>	Fine white to dark grey powder.
<b>pH</b>	11 to 13
<b>Melting Point</b>	>1,200°C
<b>Respirable dust fraction</b>	0.2 mg/m <sup>3</sup> Crystalline silica quartz (respirable)
<b>Bulk Density</b>	Not known.
<b>Specific Gravity</b>	2.9 - 3.2
<b>Vapour Pressure</b>	Not known.
<b>Solubility (water)</b>	< 10g/L

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### Section 10: Stability and Reactivity

<b>Stability of the substance</b>	Stable.
<b>Conditions to avoid</b>	Water contact may increase product temperature 2-3°C.
<b>Material to avoid</b>	Wet cement dust is alkaline. It is incompatible with oxidising agents (e.g. hypochlorites), ethanol, acids (e.g. hydrofluoric acid) and interhalogens (e.g. chlorine trifluoride).
<b>Hazardous decomposition products</b>	May evolve toxic gases if heated to decomposition.

### Section 11: Toxicological Information

<b>Summary</b>	Corrosive. Avoid eye or skin contact or dust inhalation. This product has the potential to cause acute and chronic health effects with over exposure. Crystalline silica can cause silicosis (lung disease) with chronic over exposure, however due to low levels present and product application, adverse health effects are not anticipated. Crystalline silica and hexavalent chromium compounds are classified as carcinogenic to humans (IARC Group 1).
<b>Eye</b>	Corrosive. Severe irritant upon contact with powder/ dust. Over exposure may result in pain, redness, corneal burns and ulceration with possible permanent damage.
<b>Inhalation</b>	Corrosive. Over exposure may result in severe mucous membrane irritation & bronchitis. Hexavalent chromium is reported to cause respiratory sensitisation, however due to the trace amount present; a hazard is not anticipated under normal conditions of use.
<b>Skin</b>	Corrosive. Prolonged and repeated contact with powder or wetted form may result in skin rash, dermatitis and sensitisation.
<b>Ingestion</b>	Corrosive. Ingestion may result in burns to the mouth and throat, with vomiting and abdominal pain. Due to product form, ingestion is not considered a likely exposure route.
<b>TEL</b>	No TEL is set for this substance at this time.

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## Section 12: Environmental Information

### Effects for active ingredient only

<b>AQUATIC</b>	Classified as an aquatic ecotoxic under the Hazardous Substances and New Organisms Act.
<b>SOIL</b>	Not classified as a soil ecotoxic under the Hazardous Substances and New Organisms Act.
<b>TERRESTRIAL VERTEBRATES</b>	Not classified as toxic to terrestrial vertebrates under the Hazardous Substances and New Organisms Act.
<b>TERRESTRIAL INVERTEBRATES</b>	Not classified as toxic to terrestrial invertebrates under the Hazardous Substances and New Organisms Act.
<b>EEL</b>	No EEL is set for this substance at this time.

## Section 13: Disposal Considerations

<b>Disposal information</b>	Reuse or recycle where possible. Alternatively, ensure product is covered with moist soil to prevent dust generation and dispose of to an approved landfill site.
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## Section 14: Transport Information

<b>Relevant information</b>	None.
<b>Other requirements</b>	Not regulated for transport purposes.

## Section 15: Regulatory Information

<b>Regulatory status</b>	ERMA Approval Code: HSR002543 - Group standard:for Construction Products (Corrosive [8.2C]) (toxic [6.7A]) Group Standard 2006. . For full listings of controls see <a href="http://www.ermanz.govt.nz">www.ermanz.govt.nz</a> - Group Standards
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## Section 16: Other Information

<b>Relevant information</b>	<p>mg/m<sup>3</sup> - milligrams per cubic metre.          ppm - parts per million.          Mppcf - million particles per cubic foot          TWA - time weighted average.          pH - relates to hydrogen ion concentration - this value will relate to a scale of 0 - 14, where 0 is highly acidic and 14 is highly alkaline.          CAS# - chemical abstract service number - used to uniquely identify chemical compounds.          IARC - International Agency for Research on Cancer.</p>
<b>Additional information</b>	<p>None.</p> <p>Although reasonable care has been taken in the preparation of this document, Golden Bay Cement extends no warranties and makes no representations as to the accuracy or completeness of the information contained therein, and assumes no responsibility regarding the suitability of this information for the user's intended purposes or for the consequence of its use. Each individual should make a determination as to the suitability of the information for their particular purpose (s).</p>