



# Material Safety Data Sheet

## Barium Sulphate

Edition: 16/10/2024  
In compliance with Regulation (EC) 1907/2006, And  
Annex II/ Regulation (EC) 453/2010

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### 1. Identification of substance and of the company undertaking:

<b>Material</b>	Barium Sulphate
<b>CAS No</b>	7723-43-7
<b>EC No</b>	231-784-4
<b>REACH Registration No</b>	Exempted in accordance with Annex V.7
<b>Company</b>	Inoxia Ltd 45.7 Dunsfold Park Stovolds Hill Cranleigh Surrey GU6 8TB Tel: 02032 909990 safety@inoxia.co.uk <a href="http://www.inoxia.co.uk">www.inoxia.co.uk</a>

### 2. Relevant identified uses of substance or mixture and uses advised against

Use of the substance/preparation:

Substance used as such, in formulation or in formulation of products such as:

- Fillers
- Coatings
- Polymers
- Adhesives
- Sealants
- Paper
- Glass
- Ceramics
- Steel industries

Uses advised against

- None

Full text of use descriptors: see section 16.

### 3. Hazards identification:

**Classifications according to Regulation (EC) No. 1272/2008 (CLP)**

**GHS classification**

**Physical hazards and chemical hazards:** Not classified

**Human health:** Not classified

**Environmental hazards:** Not classified

Full text of H-phrases: see section 16

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

Not classified

Full text of R-phrases: see section 16

### **Adverse physicochemical, human health and environmental effects**

Depending on the type of handling and use (e.g. grinding, drying etc), airborne respirable crystalline silica may be generated. Prolonged and/or massive inhalation of respirable crystalline silica dust may cause lung fibrosis, commonly referred to as silicosis. Principle symptoms of silicosis are cough and breathlessness. Occupational exposure to respirable crystalline silica dust should be monitored and controlled.

### **GHS label elements**

#### **Labelling according to Regulation (EC) No. 1272/2008 (CLP)**

**Hazard Pictogram:** No hazard pictogram is used

**Signal words:** No signal word is used

**Hazard statement:** Not applicable

**Precautionary statement**

**Prevention:** Not applicable

**Response:** Not applicable

**Storage:** Not applicable

**Disposal:** Not applicable

**Other hazards:** Not available

## **3. Composition on Ingredients**

Chemical name	CAS no.	EC-No.	%	Classification (67/548/EEC)	Classification (1272/2008/EC)
Barium Sulphate	7727-43-7	231-784-4	>80	N/A	N/A
Respirable Crystalline (Quartz)	14808-60-7	238-878-4	<1	Xn; R48/20	STOT RE 1 H372

Full text of R-, H- and EUH-phrases: see section 16

**Reach Registration Numbers:** Respirable Crystalline (Quartz) are exempt.

## **4. First aid measures**

### **Description of first aid measures**

**Inhalation:** Move the exposed person to fresh air at once. Get medical attention if any discomfort continues.

**Ingestion:** Rinse mouth thoroughly.

**Skin contact:** Wash skin with soap and water. Get medical attention if irritation persists after washing.

**Eye contact:** Make sure to remove any contact lenses from the eyes before rinsing. Rinse eye with water immediately. Get medical attention if any discomfort continues.

### **Most important symptoms and effects, both acute and delayed**

**Inhalation:** May cause coughing

**Ingestion:** May cause ingestion

**Skin contact:** No specific symptoms noted

**Eye contact:** May cause acute redness of the eyes

**Indication of any immediate medical attention and special treatment needed:** Treat symptomatically

## 5. Firefighting measure

**Special Hazards:** Not flammable, no explosive properties known, stable under normal conditions of handling and storage.

**Suitable extinguishing media:** No specific extinguishing media is needed.

**Protection during firefighting:** No specific fire fighting procedures given.

## 6. Accidental release measures

**General measures:** Keep public away from danger area. See section 8.2

**For non-emergency personnel:** No additional information available

**For emergency responders:** No additional information available

**Environmental precautions:** Prevent entry to sewers and soil. Notify authorities if product enters sewers or public waters.

**Methods and materials for containment and cleaning up:**

Methods for cleaning up: sweep or shovel spills into appropriate container for disposal. Avoid dust production.

**Reference to other sections:**

See section 8 and 13 for more information.

## 7. Handling and storage

**Precautions for safe handling:** Do not breathe dust. Wash hands plentifully and other exposed areas with water after handling. Remove contaminated clothing and shoes. Wash clothing before re-using.

**Packaging:** Even those that have been emptied, will retain product residue. Always obey safety warnings and handle empty packages as if they were full. Avoid all contact with this substance.

**Hygiene measures:** When using do not eat, drink or smoke. Wash hands and other exposed areas with mild soap and water before eat, drink or smoke and when leaving work. Remove contaminated clothing and shoes.

**Storage conditions:** Store in dry, cool, well-ventilated area. Keep away from food, drink and animal feeding stuffs.

## 8. Exposure Controls / Personal Protection

Chemical Name	TWA (UK) Respirable Dust	TWA (UK) Inhalable Dust
Barium Sulphate	4 mg/m <sup>3</sup>	10mg/m <sup>3</sup>
Respirable Crystalline Silica (Quartz)	0.1 mg/m <sup>3</sup>	

## Exposure limits:

Follow workplace regulatory exposure limits for all types of airborne dust (e.g. total dust, respirable dust).

## Ingredients comments:

Dust contains respirable silica. Prolonged and/or massive inhalation of respirable silica dust may cause lung fibrosis. Commonly referred to as silicosis. Principle symptoms of silicosis are cough and breathlessness. Occupational exposure to respirable dust should be monitored and controlled. The product should be handled using methods and techniques that minimise or eliminate dust generation. The product contains less than 1% w/w RCS (respirable crystalline silica) as determined by the SWERF method. The respirable crystalline silica content can be measured using the "Size-Weighted Respirable Fraction – SWERF" method. All details about the SWERF method are available at [www.crystallinesilica.eu](http://www.crystallinesilica.eu)

**Appropriate engineering controls:** Use as far as possible in a closed system. Provide a regular control of the atmosphere. Emergency eye wash fountains and safety showers should be available in the immediate vicinity of any potential exposure. Local exhaust and general ventilation must be adequate to meet exposure standards. Please refer to the annex (exposure scenarios).

**Hand protection:** Use gloves resistant to chemical products corresponding to EN 374:3. Take advice to gloves' manufacturer.

**Eye protection:** Wear safety glasses with side shields according EN 166.

**Skin and body protection:** Wear closed protective clothing.

**Respiratory protection:** Use respiratory protection mask according to EN 140 or EN 405 with filter type P3 according to EN 143:2000 or FFP3 according to EN 149:2001.

**Environmental exposure controls:** Avoid release to the environment.

## 9. Physical and Chemical properties

**Physical state:** Powder

**Colour:** White

**Odour:** Odourless

**Odour threshold:** Not applicable

**pH:** 9 (@10% aqueous dispersion)

**Relative evaporation rate (butylacetate=1):** No data available

**Melting point/Freezing point:** Decomposes

**Boiling point:** Decomposes

**Flash point:** Not applicable (not flammable)

**Self ignition temperature:** Not applicable

**Decomposition temperature:** >1,000°C

**Flammability (solid, gas):** Not flammable

**Vapour Pressure:** Not applicable

**Relative vapour density at 20 °C:** No data available

**Relative density:** 4.4 (water = 1)

**Density:** No data available

**Solubility:** Negligible

**Log Pow:** Not applicable  
**Log Kow:** Not applicable  
**Viscosity, kinematic:** Not applicable  
**Viscosity, dynamic:** Not applicable  
**Explosive properties:** Not explosive  
**Oxidising properties:** Non oxidizing material according to EC criteria  
**Explosive limits:** Not applicable

## 10. Stability and Reactivity

**Reactivity:** No specific reactivity hazards associated with this product.  
**Chemical stability:** Stable under normal conditions of handling and storage.  
**Possibility of hazardous reactions:** No hazardous reactions.  
**Conditions to avoid:** Not relevant  
**Incompatible materials:** No specific, or groups of materials, are likely to react to produce a hazardous situation.  
**Hazardous decomposition products:** BaO, SO<sub>x</sub> @ >1,000C

## 11. Toxicological Information

**Acute toxicity:** Based on available data, the classification criteria are not met.  
**Skin corrosion/irritation:** Based on available data, the classification criteria are not met.  
**Serious eye damage/irritation:** Based on available data, the classification criteria are not met.  
**Respiratory or skin sensitisation:** Based on available data, the classification criteria are not met.  
**Germ cell mutagenicity:** Based on available data, the classification criteria are not met.  
**Carcinogenicity:** Based on available data, the classification criteria are not met.  
**Reproductive toxicity:** Based on available data, the classification criteria are not met.  
**STOT – single exposure:** Based on available data, the classification criteria are not met.  
**STOT – repeated exposure:** Based on available data, the classification criteria are not met.  
**Aspiration hazard:** Based on available data, the classification criteria are not met.

## 12. Ecological Information

**Toxicity:** Not relevant.  
**Persistence and degradability:** Not relevant.  
**Bioaccumulative potential:** Not relevant.  
**Mobility in soil:** Negligible.  
**Results of PBT and vPvB assessment:** This substance/mixture does not meet the PBT or vPvB criteria of REACH, annex XIII.  
**Other adverse effects:** None known.

## 13. Disposal considerations

**Waste treatment methods:** Dispose of this material and residues in accordance with local authority requirements.  
**Additional information:** Empty packaging can have residues or dusts and are subject to proper waste disposal, as above.

**Ecology - waste materials:** See the European waste catalogue.

## 14. Transport

**Basic shipping requirements:**

**UN number:** The product is not covered by international regulation on transport of dangerous goods (IMDG, IATA, ADR/RID).

**UN proper shipping name:** Not classified for transportation

**Transport hazard class(es):** Not classified for transportation.

**Packing group:** Not classified for transportation

**Environmental hazards:** Other information: No environmental hazards known with this product.

**Special precautions for user:** Not classified for transportation.

**Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code:** Not applicable.

## 15. Regulatory Information

**National regulatory information:** No information available.

**International legislation/requirements:** No information available.

**Chemical Safety Assessment:** Exempted from REACH Registration in accordance with Annex V.7

## 16. Other Information

**Full text of R-phrases referred to under sections 2 and 3:** R48/20 – Harmful: danger of serious damage to health by prolonged exposure through inhalation.

**Full text of R-phrases referred to under sections 2 and 3:** H372 – Causes damage to lung through prolonged or repeated exposure by inhalation.

*This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.*

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