

MATERIAL SAFETY DATA SHEET (MSDS)

BARIUM HYDROXIDE AR

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

1.1. Product identifier

Trade name : BARIUM HYDROXIDE AR

Product code : B0036500500

: BARIUM HYDROXIDE EXTRA PURE (OCTAHYDRATE) 97% Identification of the product

CAS No: 12230-71-6

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

Use : Industrial. For professional use only.

1.3. Details of the supplier of the safety data sheet

Company identification Chaitanya Tower, 2nd Floor, Office # 206,

Siddharth Nagar, S.V. Road,

Goregaon (West), Mumbai - 400062,

Maharashtra, India.

SUVCHEM

Contact: +91 22 28725393 / 94 / 95

Email ID: info@suvchem.com/care@suvchem.com

1.4. Emergency telephone number

Phone no. : + 91 22 28725393 / 94 / 95 (9:00am - 6:00 pm) [Office hours]

2. Hazards identification -DSD

2.1. Classification of the substance or mixture

Classification EC 67/548 or EC 1999/45

Classification : Xn; R20

C: R34

Hazard Class and Category Code(s), Regulation (EC) No 1272/2008 (CLP)

: Acute toxicity, Oral - Category 4 - Warning (CLP : Acute Tox. 4) H302 **Health hazards**

Acute toxicity, Inhalation - Category 4 - Warning (CLP: Acute Tox. 4) H332

Skin corrosion - Category 1B - Danger (CLP: Skin Corr. 1B) H314

2.2. Label elements

Labelling EC 67/548 or EC 1999/45

Symbol(s)







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2. Hazards identification -DSD (continued)

Symbol(s) : C : Corrosive

T: Toxic

: R20 : Harmful by inhalation. R Phrase(s)

R22: Harmful if swallowed. R34: Causes burns.

S Phrase(s) : S26: In case of contact with eyes, rinse immediately with plenty of water and seek

medical advice.

S36: Wear suitable protective clothing.

S37: Wear suitable gloves. S39: Wear eye/face protection.

S45: In case of accident or if you feel unwell, seek medical advice immediately (

show the label when possible).

Labelling Regulation EC 1272/2008 (CLP)

Hazard pictograms





: Danger Signal words

Hazard statements : H314 : Causes severe skin burns and eye damage.

H302: Harmful if swallowed. H332: Harmful if inhaled.

Precautionary statements

 Prevention : P280: Wear protective gloves, protective clothing, eye protection, face protection.

P271: Use only outdoors or in a well-ventilated area.

P260: Do not breathe dust, fume, gas, mist, vapours, spray.

P264: Wash thoroughly after handling.

P270: Do not eat, drink or smoke when using this product.

: P301+P330+P331: IF SWALLOWED : Rinse mouth. Do NOT induce vomiting. Response

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

Remove contact lenses, if present and easy to do. Continue rinsing.

P304+P340: IF INHALED : Remove to fresh air and keep at rest in a position

comfortable for breathing.

P303+P361+P353: IF ON SKIN (or hair): Remove immediately all contaminated

clothing. Rinse skin with water/shower.

P363: Wash contaminated clothing before reuse.

: P405: Store locked up. Storage

: P501: Dispose of this material and its container to hazardous or special waste Disposal considerations

collection point, in accordance with local, regional, national and/or international

regulation.

2.3. Other hazards

Other hazards : The substance does not fulfil the criteria to be identified as PBT substance or vPvB

substance according to Annex XIII of Regulation REACH.



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3. Composition/information on ingredients

Substance / Preparation : BARIUM HYDROXIDE EXTRA PURE (OCTAHYDRATE) 97%

Substance

Contains no other components or impurities which will influence the classification of the product.

4. First aid measures

4.1. Description of first aid measures

Inhalation : Immediately call a POISON CENTER or doctor. Remove to fresh air and keep at

rest in a position comfortable for breathing.

Skin contact : Remove/Take off immediately all contaminated clothing. Wash with plenty of soap

and water. Immediately call a POISON CENTER or doctor.

Eye contact: Rinse cautiously with water for several minutes. Remove contact lenses, if present

and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor.

Ingestion : Immediately call a POISON CENTER or doctor. Rinse mouth. Do NOT induce

vomiting. Call a POISON CENTER or doctor if you feel unwell.

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

Symptoms relating to use : Causes severe skin burns and eye damage.

Danger of serious damage to health by prolonged exposure through inhalation. Swallowing a small quantity of this material will result in serious health hazard.

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

General information : Never give anything by mouth to an unconscious person. If you feel unwell, seek

medical advice (show the label where possible).

5. Fire-fighting measures

5.1. Extinguishing media

Suitable extinguishing media : Foam. Dry powder. Carbon dioxide. Water spray. Sand.

Unsuitable extinguishing media: Do not use a heavy water stream.

Surrounding fires : Use water spray or fog for cooling exposed containers.

5.2. Special hazards arising from the substance or mixture

Hazardous combustion products : Under fire conditions, hazardous fumes will be present.

Thermal decomposition generates: Corrosive vapours.

5.3. Advice for fire-fighters

Protection against fire : Do not enter fire area without proper protective equipment, including respiratory

protection.



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5. Fire-fighting measures (continued)

Special procedures : Exercise caution when fighting any chemical fire. Avoid (reject) fire-fighting water to

enter environment.

6. Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For emergency responders : Equip cleanup crew with proper protection.

Ventilate area.

For non-emergency personnel : Evacuate unnecessary personnel.

6.2. Environmental precautions

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

sewers or public waters.

6.3. Methods and material for containment and cleaning up

Clean up methods : On land, sweep or shovel into suitable containers. Minimize generation of dust.

Store away from other materials.

6.4. Reference to other sections

See section 8. Exposure controls/personal protection

7. Handling and storage

7.1. Precautions for safe handling

Handling : Wash contaminated clothing before reuse. Wash thoroughly after handling. Do not

breathe dust, fume, gas, mist, vapours, spray. Use only outdoors or in a well-

ventilated area. Do not eat, drink or smoke when using this product.

Technical protective measures: Provide good ventilation in process area to prevent formation of vapour.

7.2. Conditions for safe storage, including any incompatibilities

Storage : Keep only in the original container in a cool, well ventilated place. Keep container

closed when not in use.

Storage regulation : Comply with applicable regulations.

Storage - away from : Strong bases. Strong acids. Sources of ignition. Direct sunlight.

7.3. Specific end use(s)

Specific end use(s) : None.



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8. Exposure controls/personal protection

8.1. Exposure controls

Personal protection : Avoid all unnecessary exposure.

• Respiratory protection : In case of insufficient ventilation, wear suitable respiratory equipment.

• Hand protection : Wear protective gloves.

Skin protection
Eye protection
: Wear suitable protective clothing.
: Chemical goggles or face shield.

• Others : When using, do not eat, drink or smoke.

8.2. Control parameters

Occupational Exposure Limits : No data available.

9. Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state at 20 °C : Solid.

Colour : White crystalline

Odour : Odorless

Odour threshold : No data available. pH value : Not applicable.

: 78 °C Melting point [°C] Decomposition point [°C] : N/A Critical temperature [°C] : N/A Auto-ignition temperature [°C] : N/A Flammability (solid, gas) : N/A : N/A Flash point [°C] : 7800C Boiling point [°C] : N/A Initial boiling point [°C] Final boiling point [°C] : N/A **Evaporation rate** : N/A Vapour pressure [20°C] : N/A Vapour pressure mm/Hg : N/A Vapour density : N/A Density [g/cm3] : 2,18 : N/A Relative density, gas (air=1)

Solubility in water [% weight] : 5.6g/100g water @ 15

: N/A

Solubility in water : N/A

Relative density, liquid (water=1)



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9. Physical and chemical properties (continued)

Log Pow octanol / water at 20°C : No data available.

Solubility : 12.5 at 50 g/l at 20

Viscosity at 40°C [mm2/s] : N/A

9.2. Other information

Explosive properties : N/A
Explosion limits - upper [%] : N/A
Explosion limits - lower [%] : N/A

Oxidising properties : No data available.

10. Stability and reactivity

10.1. Reactivity

Reactivity: Not established.

10.2. Chemical stability

Chemical stability : Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

Hazardous reactions : Not established.

10.4. Conditions to avoid

Conditions to avoid : Direct sunlight. Extremely high or low temperatures.

10.5. Incompatible materials

Materials to avoid : Strong acids. Strong bases.

10.6. Hazardous decomposition products

Hazardous decomposition products: Fumes. Carbon monoxide. Carbon dioxide.

Thermal decomposition generates: Corrosive vapours.

11. Toxicological information

11.1. Information on toxicological effects

Acute toxicity

• Inhalation : Harmful if inhaled.



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11. Toxicological information (continued)

• **Dermal** : Based on available data, the classification criteria are not met.

• Ingestion : Harmful if swallowed.

Corrosion : Causes severe skin burns and eye damage.

: Based on available data, the classification criteria are not met. Irritation Sensitization : Based on available data, the classification criteria are not met. Mutagenicity : Based on available data, the classification criteria are not met. Carcinogenicity : Based on available data, the classification criteria are not met. Toxic for reproduction : Based on available data, the classification criteria are not met. STOT-single exposure : Based on available data, the classification criteria are not met. : 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**

12. Ecological information

12.1. Toxicity

Toxicity information : Not established.

12.2. Persistence - degradability

Persistence - degradability : Biodegradable.

12.3. Bioaccumulative potential

Bioaccumulative potential : Not established.

12.4. Mobility in soil

Mobility in soil : Not established.

12.5. Results of PBT and vPvB assessment

Results of PBT and vPvB assessment: The substance does not fulfil the criteria to be identified as PBT substance or vPvB

substance according to Annex XIII of Regulation REACH.

12.6. Other adverse effects

Environmental precautions : Avoid release to the environment.

13. Disposal considerations

13.1. Waste treatment methods

General : Avoid release to the environment. Dispose in a safe manner in accordance with

local/national regulations.



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13. Disposal considerations (continued)

Dispose of this material and its container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation.

14. Transport information

14.1. Land transport (ADR-RID)

Proper shipping name : CORROSIVE SOLID, TOXIC, N.O.S.

UN N° : 2923 H.I. nr : 86 ADR - Class : 8

Labelling - Transport : 8 : Corrosive substance. 6.1 : Toxic substances.





ADR - Classification code : CT2 CT2

CT2

: 1 KG

ADR - Group : ||
ADR - Packing instructions : P002

ADR - Limited Quantity
ADR - Tunnel code



: E : Passage forbidden through tunnels of category E.

14.2. Sea transport (IMDG) [English only]

Proper shipping name : CORROSIVE SOLID, TOXIC, N.O.S.

UN N° : 2923

IMO-IMDG - Class or division : 8 : Corrosive substance. (6.1 : Toxic substances.)

IMO-IMDG - Packing group : II

IMO- IMDG - Packing instructions : P002

IMO-IMDG - Limited quantities : 1 kg

IMO-IMDG - Marine pollution : Yes

EMS-Nr : F-A S-B

14.3. Air transport (ICAO-IATA) [English only]

Proper shipping name : CORROSIVE SOLID, TOXIC, N.O.S.



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14. Transport information (continued)

UN N° : 2923

IATA - Class or division : 8 : Corrosive substance. (6.1 : Toxic substances.)

IATA - Packing group : ||

IATA - Passenger and Cargo Aircraft : ALLOWED

- Passenger and Cargo - Packing : 859

instruction

- Passenger and Cargo - Maximum : 15 kg

Quantity/Packing

IATA - Cargo only : ALLOWED

- Cargo only - Packing instruction : 863 - Cargo only - Maximum Quantity/ : 50 kg

Packing

IATA - Limited Quantites : 5 kg ERG-Nr : 8P

15. Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

Safety, health and environmental: Ensure all national/local regulations are observed.

regulations/legislation specific for the

substance or mixture

REACH Restrictions - Annex XVII : The components of this product are not subject to restrictions.

REACH Authorisation - Annex XIV : The components of this product are not subject to authorization.

15.2. Chemical Safety Assessment

Chemical Safety Assessment : It has not been carried out.

16. Other information

Revision - See : *

Abbreviations and acronyms : PBT: persistent, bioaccumulative and toxic.

vPvB: very persistent and very bioaccumulative

Sources of key data used : REGULATION (EC) No 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF

THE COUNCIL of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and

1999/45/EC, and amending Regulation (EC) No 1907/2006

Further information : None.

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In accordance with REACH Regulation (CE) No 1907/2006 and with CLP Regulation (CE) No 1272/2008

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