1 Identification

· Product identifier
· Trade name: Magnesium oxide
· Article number: 142450
· CAS Number:
  1309-48-4
· EC number:
  215-171-9
· Index number:
  025-199-09-0
· Application of the substance / the mixture Laboratory chemicals for research and development
· Details of the supplier of the safety data sheet
· Manufacturer/Supplier:
  BeanTown Chemical
  9 Sagamore Park Road
  Hudson, NH 03051
  USA

  Phone: (603) 402-2234
  Fax: (603) 402-9713
  Email: technical@beantownchem.com
  www.beantownchem.com
· Information department: Technical Support Department
· Emergency telephone number:
  During normal operating hours, please call (603) 402-2234
  After hours, please call Chemtrec at (800) 424-9300

2 Hazard(s) identification

· Classification of the substance or mixture
  The substance is not classified according to the Globally Harmonized System (GHS).
· Label elements
  · GHS label elements Void
  · Hazard pictograms Void
  · Signal word Void
  · Hazard statements Void
· Other hazards
  · Results of PBT and vPvB assessment
    · PBT: Not applicable.
    · vPvB: Not applicable.

3 Composition/information on ingredients

· Chemical characterization: Substances
· CAS No. Description
  1309-48-4 magnesium oxide
· Identification number(s)
· EC number: 215-171-9
· Index number: 025-199-09-0

(Contd. on page 2)
4 First-aid measures

- Description of first aid measures
- General information: No special measures required.
- After inhalation: Supply fresh air; consult doctor in case of complaints.
- After skin contact: Generally the product does not irritate the skin.
- After eye contact: Rinse opened eye for several minutes under running water.
- After swallowing: If symptoms persist consult doctor.
- Information for doctor:
  - Most important symptoms and effects, both acute and delayed: No further relevant information available.
  - Indication of any immediate medical attention and special treatment needed: No further relevant information available.

5 Fire-fighting measures

- Extinguishing media
- Suitable extinguishing agents: CO2, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.
- Special hazards arising from the substance or mixture: No further relevant information available.
- Advice for firefighters
- Protective equipment: No special measures required.

6 Accidental release measures

- Personal precautions, protective equipment and emergency procedures: Not required.
- Environmental precautions: No special measures required.
- Methods and material for containment and cleaning up: Pick up mechanically.
- Reference to other sections
  - See Section 7 for information on safe handling.
  - See Section 8 for information on personal protection equipment.
  - See Section 13 for disposal information.

7 Handling and storage

- Handling:
- Precautions for safe handling: No special measures required.
- Information about protection against explosions and fires: No special measures required.
- Conditions for safe storage, including any incompatibilities
- Storage:
  - Requirements to be met by storerooms and receptacles: No special requirements.
  - Information about storage in one common storage facility: Not required.
  - Further information about storage conditions: None.
- Specific end use(s): No further relevant information available.

8 Exposure controls/personal protection

- Additional information about design of technical systems:
  - Properly operating chemical fume hood designed for hazardous chemicals and having an average face velocity of at least 100 feet per minute

(Contd. of page 1)
### Safety Data Sheet


**Printing date 03/06/2015**

**Reviewed on 12/01/2014**

**Trade name: Magnesium oxide**

(Contd. of page 2)

**Control parameters**

**Components with limit values that require monitoring at the workplace:**

<table>
<thead>
<tr>
<th>PEL</th>
<th>Long-term value: 15* mg/m³</th>
</tr>
</thead>
<tbody>
<tr>
<td>fume; *total particulate</td>
<td></td>
</tr>
<tr>
<td>TLV</td>
<td>Long-term value: 10* mg/m³</td>
</tr>
<tr>
<td>*as inhalable fraction</td>
<td></td>
</tr>
</tbody>
</table>

**Additional information:** The lists that were valid during the creation were used as basis.

**Exposure controls**

**Personal protective equipment:**

**General protective and hygienic measures:**

The usual precautionary measures for handling chemicals should be followed.

**Breathing equipment:** Not required.

**Protection of hands:**

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

**Material of gloves**

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer.

**Penetration time of glove material**

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

**Eye protection:** Not required.

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**9 Physical and chemical properties**

**Information on basic physical and chemical properties**

**General Information**

- **Appearance:**
  - **Form:** Powder
  - **Color:** Not determined.
  - **Odor:** Characteristic
  - **Odour threshold:** Not determined.

- **pH-value:** Not applicable.

- **Change in condition**
  - **Melting point/Melting range:** 2852 °C (5166 °F)
  - **Boiling point/Boiling range:** 3600 °C (6512 °F)

- **Flash point:** Not applicable.

- **Flammability (solid, gaseous):** Product is not flammable.

- **Ignition temperature:**
  - **Decomposition temperature:** Not determined.
  - **Auto igniting:** Not determined.

- **Danger of explosion:** Product does not present an explosion hazard.

(Contd. on page 4)
Trade name: Magnesium oxide

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>· Explosion limits</td>
<td>Not determined.</td>
</tr>
<tr>
<td>Lower:</td>
<td></td>
</tr>
<tr>
<td>Upper:</td>
<td></td>
</tr>
<tr>
<td>· Vapor pressure</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>· Density at 20 °C (68 °F):</td>
<td>3.58 g/cm³ (29.875 lbs/gal)</td>
</tr>
<tr>
<td>· Relative density</td>
<td>Not determined.</td>
</tr>
<tr>
<td>· Vapour density</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>· Evaporation rate</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>· Solubility in / Miscibility with Water</td>
<td>Insoluble.</td>
</tr>
<tr>
<td>· Partition coefficient (n-octanol/water)</td>
<td>Not determined.</td>
</tr>
<tr>
<td>· Viscosity</td>
<td></td>
</tr>
<tr>
<td>Dynamic</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Kinematic</td>
<td>Not applicable.</td>
</tr>
<tr>
<td>Organic solvents</td>
<td>0.0 %</td>
</tr>
<tr>
<td>· Solids content</td>
<td>100.0 %</td>
</tr>
<tr>
<td>· Other information</td>
<td>No further relevant information available.</td>
</tr>
</tbody>
</table>

10 Stability and reactivity

· Reactivity
· Chemical stability
· Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
· Possibility of hazardous reactions: No dangerous reactions known.
· Conditions to avoid: No further relevant information available.
· Incompatible materials: No further relevant information available.
· Hazardous decomposition products: No dangerous decomposition products known.

11 Toxicological information

· Information on toxicological effects
· Acute toxicity:
· Primary irritant effect:
· on the skin: No irritant effect.
· on the eye: No irritating effect.
· Sensitization: No sensitizing effects known.
· Additional toxicological information:
  When used and handled according to specifications, the product does not have any harmful effects according to our experience and the information provided to us. The substance is not subject to classification.
· Carcinogenic categories
· IARC (International Agency for Research on Cancer)
  Substance is not listed.
· NTP (National Toxicology Program)
  Substance is not listed.
12 Ecological information

- Toxicity
- Aquatic toxicity: No further relevant information available.
- Persistence and degradability: No further relevant information available.
- Behavior in environmental systems:
- Bioaccumulative potential: No further relevant information available.
- Mobility in soil: No further relevant information available.
- Additional ecological information:
- General notes: Not known to be hazardous to water.
- Results of PBT and vPvB assessment
- PBT: Not applicable.
- vPvB: Not applicable.
- Other adverse effects: No further relevant information available.

13 Disposal considerations

- Waste treatment methods
- Recommendation: Smaller quantities can be disposed of with household waste.
- Uncleaned packagings:
- Recommendation: Disposal must be made according to official regulations.

14 Transport information

- UN-Number
  - DOT, ADN, IMDG, IATA: not regulated
- UN proper shipping name
  - DOT, ADN, IMDG, IATA: not regulated
- Transport hazard class(es)
  - DOT, ADN, IMDG, IATA: not regulated
- Class
  - DOT, ADN, IMDG, IATA: not regulated
- Packing group
  - DOT, IMDG, IATA: not regulated
- Environmental hazards:
  - Marine pollutant: No
- Special precautions for user
  - Not applicable.
- Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code
  - Not applicable.
- UN "Model Regulation":
## 15 Regulatory information

- Safety, health and environmental regulations/legislation specific for the substance or mixture
  - **Sara**
    
    - **Section 355 (extremely hazardous substances):**
      Substance is not listed.
    
    - **Section 313 (Specific toxic chemical listings):**
      Substance is not listed.
    
    - **TSCA (Toxic Substances Control Act):**
      Substance is listed.
    
    - **Proposition 65**
      
      - **Chemicals known to cause cancer:**
        Substance is not listed.
      
      - **Chemicals known to cause reproductive toxicity for females:**
        Substance is not listed.
      
      - **Chemicals known to cause reproductive toxicity for males:**
        Substance is not listed.
      
      - **Chemicals known to cause developmental toxicity:**
        Substance is not listed.
      
    - **Carcinogenic categories**
      
      - **EPA (Environmental Protection Agency)**
        Substance is not listed.
      
    - **TLV (Threshold Limit Value established by ACGIH)**
      - 1309-48-4 magnesium oxide
      
    - **NIOSH-Ca (National Institute for Occupational Safety and Health)**
      Substance is not listed.
    
    - **RTECS**
      Substance is not listed.
    
    - **Chemical safety assessment: A Chemical Safety Assessment has not been carried out.**

## 16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

- **NFPA ratings (scale 0-4)**
  - Health = 0
  - Fire = 0
  - Reactivity = 0

- **HMIS ratings (scale 0-4)**
  - Health = 0
  - Fire = 0
  - Reactivity = 0

- **Department issuing SDS:** Technical Support Department
- **Contact:** Technical Support Department
- **Date of preparation / last revision** 03/06/2015 / -
Abbreviations and acronyms:

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)
ACGIH: American Conference of Governmental Industrial Hygienists
EINECS: European Inventory of Existing Commercial Chemical Substances
CAS: Chemical Abstracts Service (division of the American Chemical Society)