1. Identification

1.1. Product identifier

Trade name: AEROSIL® 200

Chemical Name: Silicon dioxide, chemically prepared

CAS-No.: 112945-52-5, 7631-86-9

1.2. Recommended use of the chemical and restrictions on use

Relevant applications identified:
- Sealants
- Coloured printing inks
- Paints and varnishes.
- Adhesive
- Silicone rubber
- Cosmetic ingredient
- Cosmetics
- Agrochemicals

Function:
- Anticaking agent
- Antiblocking agents
- Coating agent
- Dispersing agent
- Flow-promoting agent.
- Reinforcing agent.
- Carrier

1.3. Details of the supplier of the safety data sheet

Company: Evonik Corporation USA
299 Jefferson Road
Parsippany, NJ 07054-0677
USA

Telephone: 973-929-8000

Telefax: 973-929-8040

Email address: Product-Regulatory-Services@Evonik.com

1.4. 24 HOUR EMERGENCY TELEPHONE NUMBERS:

CHEMTREC - US & CANADA: 800-424-9300

CHEMTREC MEXICO: 01-800-681-9531

CHEMTREC INTERNATIONAL: +1 703-527-3887 (collect calls accepted)

Product Regulatory Services: 973-929-8060

2. Hazards identification

2.1. Classification of the substance or mixture
SAFETY DATA SHEET
AEROSIL® 200

Classification according to Regulation 29CFR 1910.1200
Remarks Not a hazardous substance or mixture.

2.2. Label elements
Statutory basis Classification according to Regulation 29CFR 1910.1200
Remarks Not a hazardous substance or mixture.

2.3. Other hazards
Silicon dioxide, chemically prepared Not a PBT, vPvB substance as per the criteria of the REACH Regulation.

3. Composition/information on ingredients

3.1. Substances
<table>
<thead>
<tr>
<th>Substance</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Silicon dioxide, chemically prepared</td>
<td>100%</td>
</tr>
</tbody>
</table>

CAS-No. 112945-52-5
Remarks Not a hazardous substance or mixture.

Other information
A new CAS, 112945-52-5, has been assigned to amorphous, fumed silica to distinguish it from crystalline silica. According to the EPA, this product meets TSCA requirements and is listed on the TSCA inventory as silica with CAS 7631-86-9.

3.2. Mixtures
not applicable

4. First aid measures

4.1. Description of first aid measures
Inhalation
In case product dust is released: Possible discomfort: cough, sneezing
Move victims into fresh air.

Skin contact
Wash off with soap and plenty of water.

Eye contact
In case of contact, immediately flush eyes with plenty of water for at least 15 minutes or until all material has been removed. Obtain medical attention.

Ingestion
If accidentally swallowed, rinse mouth thoroughly with water and afterwards, drink plenty of water. In case of discomfort, obtain medical attention.

4.2. Most important symptoms and effects, both acute and delayed
Symptoms
None known

4.3. Indication of any immediate medical attention and special treatment needed
No hazards which require special first aid measures.

5. Fire-fighting measures
5.1. **Extinguishing media**

Suitable extinguishing media: Water spray, foam, CO2, dry powder., Adapt fire-extinguishing measures to surroundings

Unsuitable extinguishing media: Do not use full-force water jet in order to avoid dispersal and spread of the fire.

5.2. **Special hazards arising from the substance or mixture**

None known.

5.3. **Advice for firefighters**

As in any fire, wear self-contained positive-pressure breathing apparatus, (MSHA/NIOSH approved or equivalent) and full protective gear.

6. **Accidental release measures**

6.1. **Personal precautions, protective equipment and emergency procedures**

Use personal protective equipment.

6.2. **Environmental precautions**

Obey relevant local, state, provincial and federal laws and regulations. Do not contaminate any lakes, streams, ponds, groundwater or soil. Do not allow entrance in sewage water, soil stretches of water, groundwater, drainage systems.

6.3. **Methods and material for containment and cleaning up**

Sweep up or vacuum up spillage and collect in suitable container for disposal.

7. **Handling and storage**

7.1. **Precautions for safe handling**

Use with adequate ventilation.

7.2. **Conditions for safe storage, including any incompatibilities**

**Advice on protection against fire and explosion**

Take precautionary measures against static discharges.

**Storage**

Keep containers tightly closed in a dry, cool place.

8. **Exposure controls/personal protection**

8.1. **Control parameters**

<table>
<thead>
<tr>
<th>Silicon dioxide, chemically prepared</th>
</tr>
</thead>
<tbody>
<tr>
<td>CAS-No.</td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td>Control parameters</td>
</tr>
<tr>
<td>Time Weighted Average (TWA)</td>
</tr>
<tr>
<td>Control parameters</td>
</tr>
<tr>
<td>Time Weighted Average (TWA)</td>
</tr>
</tbody>
</table>

The exposure limit is calculated from the equation, 80/(%SiO₂), using a value of 100% SiO₂. Lower values of % SiO₂ will give higher exposure limits.

8.2. **Exposure controls**

**Personal protective equipment**
Respiratory protection
A respiratory protection program that meets OSHA 1910.134 and ANSI Z88.2 or applicable federal/provincial requirements must be followed whenever workplace conditions warrant respirator use. NIOSH’s “Respirator Decision Logic” may be useful in determining the suitability of various types of respirators.

Hand protection
Use impermeable gloves.

Eye protection
Wear safety glasses with side shields. In case dusts are formed, wear close fitting protective goggles.

Skin and body protection
A safety shower and eye wash fountain should be readily available.
To identify additional Personal Protective Equipment (PPE) requirements, it is recommended that a hazard assessment in accordance with the OSHA PPE Standard (29CFR1910.132) be conducted before using this product.

Hygiene measures
When using, do not eat, drink or smoke. Wash face and/or hands before break and end of work.
To ensure ideal skin protection: use super fatted soaps and skin cream for skin care.
Wash contaminated clothing before re-use.

Protective measures
Handle in accordance with good industrial hygiene and safety practice.
If there is the possibility of skin/eye contact, the indicated hand/eye/body protection should be used.
If the workplace threshold limit value is exceeded and/or the substance is released, use appropriate respiratory protection.

9. Physical and chemical properties

9.1. Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical state</td>
<td>solid</td>
</tr>
<tr>
<td>Colour</td>
<td>white</td>
</tr>
<tr>
<td>Form</td>
<td>powder</td>
</tr>
<tr>
<td>Odour</td>
<td>odorless</td>
</tr>
<tr>
<td>Odour Threshold</td>
<td>not applicable</td>
</tr>
<tr>
<td>pH</td>
<td>3.7 - 4.5 (40 g / l) (20 °C)</td>
</tr>
<tr>
<td>Melting point/range</td>
<td>ca. 1700 °C</td>
</tr>
<tr>
<td>Boiling point/range</td>
<td>not determined</td>
</tr>
<tr>
<td>Flash point</td>
<td>not applicable</td>
</tr>
<tr>
<td>Evaporation rate</td>
<td>not applicable</td>
</tr>
<tr>
<td>Flammability (solid, gas)</td>
<td>not applicable</td>
</tr>
<tr>
<td>Lower explosion limit</td>
<td>not applicable</td>
</tr>
<tr>
<td>Upper explosion limit</td>
<td>not applicable</td>
</tr>
<tr>
<td>Vapour pressure</td>
<td>not applicable</td>
</tr>
</tbody>
</table>
9.2. Other information

Explosiveness
Not to be expected in view of the structure

Minimum ignition energy
not applicable

Tapped density
ca. 50 g/l
Method: DIN / ISO 787/11

10. Stability and reactivity

10.1. Reactivity
No dangerous reaction known under conditions of normal use.

10.2. Chemical stability
Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions
Possibility of hazardous reactions
See Sect. 10.1 Reactivity.

10.4. Conditions to avoid
No dangerous reaction known under conditions of normal use.
Operations that create dust.

10.5. Incompatible materials
None known.

10.6. Hazardous decomposition products
None known.

Stable under normal conditions.
Product will not undergo hazardous polymerization.

11. Toxicological information

11.1. Information on toxicological effects
Acute oral toxicity
LD50 Rat: > 3300 mg/kg
No deaths occurred.

LD50 Rat: > 5000 mg/kg
SAFETY DATA SHEET
AEROSIL® 200

Method: OECD Test Guideline 401 comparable product

Acute inhalation toxicity LC0 Rat: 0.139 mg/l / 4 h
Method: analogous OECD method (maximum concentration attainable in experiments)
No deaths occurred.

Acute dermal toxicity LD50 Rabbit: > 5000 mg/kg comparable product

Skin irritation Rabbit not irritating
Method: analogous OECD method

Eye irritation Rabbit not irritating
Method: analogous OECD method

Sensitization not known

Repeated dose toxicity Oral No negative effects.
Inhalation.
No irreversible changes and no indication of silicosis.

Assessment of STOT single exposure no evidence for hazardous properties
Assessment of STOT repeat exposure no evidence for hazardous properties
Risk of aspiration toxicity No aspiration toxicity classification

Mutagenicity assessment no evidence of mutagenic effects
No evidence of mutagenic effects reported in literature.

Carcinogenicity No negative effects.
carcinogenicity assessment Contains no carcinogenic substances as defined by NTP, IARC and/or OSHA.

Toxicity to reproduction No negative effects.

Human experience Silicosis or other product specific illnesses of the respiratory tract have not been reported.

12. Ecological information
12.1. Toxicity
Toxicity to fish LC50 (Brachydanio rerio): > 10000 mg/l / 96 h
Method: OECD 203
The reported toxic effects relate to the nominal concentration.

Method: analogous OECD method
The reported toxic effects relate to the nominal concentration.
12.2. Persistence and degradability
Biodegradability: The methods for determining biodegradability are not applicable to inorganic substances.

12.3. Bioaccumulative potential
Bioaccumulation: Not to be expected.

12.4. Mobility in soil
Mobility: No remarkable mobility in soil is to be expected.

12.5. Other adverse effects
Further Information: The classification criteria are not met based on the available data.

13. Disposal considerations
13.1. Waste treatment methods
Product: Waste must be disposed of in accordance with federal, state, provincial and local regulations.

Uncleaned packaging: Packaging material should be recycled or disposed of in accordance with federal, state and local regulations.

14. Transport information
Not dangerous according to transport regulations.

14.1. UN number: --
14.2. UN proper shipping name: --
14.3. Transport hazard class(es): --
14.4. Packing group: --
14.5. Environmental hazards (Marine pollutant): --
14.6. Special precautions for user: Yes
   Not dangerous according to transport regulations.

15. Regulatory information

US Federal Regulations
OSHA
If listed below, chemical specific standards apply to the product or components:

- None listed

Clean Air Act Section (112)
If listed below, components present at or above the de minimus level are hazardous air pollutants:

- None listed

CERCLA Reportable Quantities
If listed below, a reportable quantity (RQ) applies to the product based on the percent of the named component:

- None listed

SARA Title III Section 311/312 Hazard Categories
The product meets the criteria only for the listed hazard classes:

- No SARA Hazards

SARA Title III Section 313 Reportable Substances
If listed below, components are subject to the reporting requirements of Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 and 40 CFR Part 372:

- None listed

Toxic Substances Control Act (TSCA)
If listed below, non-proprietary substances are subject to export notification under Section 12 (b) of TSCA:

- None listed

State Regulations
The Listing requirements of the Right to Know (RTK) legislation varies by state. All information for NJ, PA, MA and other states can be derived from the listing of hazardous and non-hazardous components in section 2 and 15 of this MSDS.

California Proposition 65
A warning under the California Drinking Water Act is required only if listed below:

- None listed

An employer using HMIS/NFPA labeling must through training ensure that its employees are fully aware of the hazards of the chemicals used.

HMIS Ratings

Health : 1
16. Other information

Further information

Revision date 04/30/2015

Changes since the last version are highlighted in the margin. This version replaces all previous versions.

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<th>Material no.</th>
<th>Version</th>
<th>Revision date</th>
<th>Print Date</th>
<th>Page</th>
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<td>132138</td>
<td>4.1 / US</td>
<td>04/30/2015</td>
<td>01/05/2016</td>
<td>11 / 11</td>
</tr>
</tbody>
</table>

**voc**

volatile organic compounds

**WHMIS**

Workplace Hazardous Materials Information System

**WHO**

World Health Organization