ZEO Natural Zeolites

Safety Data Sheet

Section 1: Identification

Product identified: Clinoptilolite – Natural Zeolite
Product name: Natural zeolites - Branded, unbranded, and private label
Recommended use: Contact ZEO or visit www.zeoinc.com for use instructions.
Restrictions on use or sale: None
Company: ZEO, Inc.
PO Box 2353 (Mailing) Phone: 972-542-0053
2104 Augusta (Physical) Fax: 972-542-0211
McKinney, TX 75070 Website: www.zeoinc.com
Emergency telephone number: 800-530-8283 Email at: www.zeoinc.com
Brand names: EcoSand, ZAR-MIN, and ZeoSand are registered trade names of ZEO, Inc.

Section 2: Hazard Identification

Regulation (EU) No 1272/2008
GHS regulations: Not classified as hazardous.
CLP regulation: Not classified as hazardous.
Directive 67/548/EEC: Not applicable
Directive 1999/45/EC: Not applicable
Classification system: The classification is according to the latest editions of the EU-lists and extended by company literature data. The classification is in accordance with the latest editions of international substances lists and is supplemented by information from technical literature.

Label elements:
Regulation (EC) No 1272/2008: Not regulated
Hazard pictogram: Not regulated
Signal word: Not regulated
Hazard determining components: None
Hazard statements: Not regulated

NFPA Hazard Rating (Scale 0 to 4)

Health (Blue) 0 No precaution necessary.
Flammability (Red) 0 Non combustible.
Reactivity (Yellow) 0 Not reactive when mixed with water.
Special (White) None
Section 3: Composition/Information on ingredients

<table>
<thead>
<tr>
<th>Chemical and common name</th>
<th>Wt. %</th>
<th>CAS Registry</th>
<th>EINECS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clinoptilolite (natural zeolite)</td>
<td>90-97</td>
<td>12173-10-3</td>
<td>215-283-8</td>
</tr>
<tr>
<td>Water</td>
<td>3-10</td>
<td>7732-18-5</td>
<td>231-791-2</td>
</tr>
</tbody>
</table>

Metonymy or similar names:
- Zeolite 1318-02-1
- Sodium aluminosilicate 1344-00-9
- Hydrated sodium calcium aluminosilicate 1318-93-0
- Aluminosilicate. Mesostructural 1318-02-1

Section 4. First Aid Measures

General: No special measures required.

After inhalation: Supply fresh air; consult doctor in case of complaints.

After skin contact: Clean with water and soap. If skin irritation is experienced, consult a doctor.

After eye contact: Remove contact lenses if worn. Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.

After swallowing: Rinse out mouth and then drink plenty of water. Do not induce vomiting. Treat symptomatically.

Section 5. Fire-Fighting Measures

Suitable extinguishing media: Noncombustible

Extinguishing media: Compatible with all extinguishing media

Unusual hazards: None known

Section 6. Accidental Release Measures

Personal precautions: Avoid dust

Environmental precautions: No special measures required.

Protection equipment: Safety glasses

Spills cleanup: Pick up mechanically and place in a suitable container. Avoid generating dust.
Section 7. Handling and Storage

Safe handling: Avoid contact with eyes, skin, and clothing. Avoid generating and breathing dust.
Safe storage: No special requirements.

Section 8. Exposure Controls and Personal Protection

Limit values: Does not contain any relevant quantities of materials with critical values that have to be monitored in the workplace.
DNEL: No further information available.
DNEC: No further information available.
General protection: Use in a well ventilate workplace. Avoid generating and contacting dust.
Eye protection: Wear safety glasses.
Respiratory protection: Not necessary in well-ventilated area.
Skin protection: Wear protective gloves against mechanical hazards according to NIOSH or EN 388.
Body protection: Not required under normal conditions of use.

Sections 9. Physical and Chemical Properties

Appearance: Light tan to light green solid (powders and granules).
Odor: Odorless.
Odor threshold: Not determined.
PH values: Not applicable.
Change in condition: Melting point/melting range: Not determined
Boiling point/boiling range: Not determined
Flash point: Not applicable. Will not burn.
Evaporation rate: Not applicable; does not evaporate.
Flammability (solid, gas): Not flammable
Upper/lower limits: Not applicable
Danger of explosion: Does not present and explosive hazard.
Upper/lower limits: Not applicable
Vapor density: Does not apply. Does not evaporate.
Relative density: Not determined
Solubility: Water Insoluble
Alcohol Insoluble
Partition coefficient: Not applicable (insoluble in n-octanol and water)
Auto ignition temperature: Will not auto ignite.
Decomposition temperature: Not determined.
Viscosity: Not applicable - solid.

Section 10. Stability and Reactivity

Chemical stability: Stable if used as intended.
Thermal stability: Stable if used as intended.
Hazardous reaction: Possibility of hazardous reaction with strong acids and strong alkali.
Conditions to avoid: No further information available.

Materials to avoid: Strong acids and strong bases.

Hazardous decomposition: No further information available.

Section 11. Toxicological Information

Toxicological: When used and handled according to instructions, the product does not have any harmful effects based upon our experience.

Sensitization: No sensitizing effects known.

General EU Guidelines: Not subject to classification according to the calculation method of the General EU Classification Guidelines for Preparations as issued in the latest version.


IARC: International Agency for Research on Cancer MONOGRAPHS VOLUME 68: clinoptilolite cannot be evaluated as to the carcinogenicity to humans (Group 3).

Section 12. Ecological Information

Toxicity: No known toxicity to plants or animals.

Environmental fate: Inorganic material does not decompose and is not eliminated from environment by means of biological cleaning processes.

Bioaccumulation: Does not bioaccumulate in animal or plants.

Mobility in soil: Not mobile.

Section 13. Disposal Consideration

Classification: Not a RCRA Hazardous Waste.

Disposal method: Small uncontaminated quantities can be disposed of with household waste. Dispose in accordance with federal, state (provincial), and local regulations.

Section 14. Transportation Information

UN Number: DOT, ADR, ADN, IMDG, IATA: Not Regulated

UN Proper Shipping Name: DOT, ADR, ADN, IMDG, IATA: Not Regulated

Transport Hazard Class: DOT, ADR, ADN, IMDG, IATA: Not Regulated

Packing Group: DOT, ADR, IMDG, IATA: Not Regulated

Marine pollutant: No.

Proper shipping name: Non-Hazardous for Transport.

Hazard Symbol: None required.

Hazard Id Number (HIM): None.

15. Regulatory Information

United States

SARA 355: Extremely hazardous substances: None of the ingredient listed.

SARA 313: Specific toxic chemical listings: None of the ingredients listed.

TSCA: All of the ingredient are listed.

California Prop 65: Known to cause cancer: None of the ingredients is listed.
Known to cause reproductive toxicity: None of the ingredients is listed.
Known to cause developmental toxicity: None of the ingredients is listed.

Carcinogen categories:
- EPA None of the ingredients is listed.
- IARC None of the ingredients is listed.
- TLV by ACGHI None of the ingredients is listed.
- NIOSH-Ca None of the ingredients is listed.

Canada:
- Domestic Substances List (DLS) All ingredients are listed.
- Ingredients Disclosure List (limit 0.1%) None of the ingredient is listed.
- Ingredients Disclosure List (limit 1%) None of the ingredient is listed.

REACH, Article 57:
Substances of very high concern (SVHC) None of the ingredient is listed.

Chemical Safety Assessment: A Chemical Safety Assessment has not been carried out.

16. Other information

Safety Data Sheet:
- Approved by: F. L. Bunger
- Date: March 8, 2017

Abbreviations:
- ACGIH American Conference of Governmental Industrial Hygienists
- ADR European Agreement concerning the International Carriage of Dangerous Goods by Road
- ADN European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways
- CAS Chemical Abstracts Service (division of the American Chemical Society)
- CLP Classification, Labeling, and Packaging Regulation (EC) No 1272/2008
- DNEL Derived No-Effect Level (REACH)
- DOT US Department of Transportation
- DSL Domestic Substance List
- EINECS European Inventory of Existing Commercial Chemical Substances
- ELINCS European List of Notified Chemical Substances
- EPA Environmental Protection Agency
- GHS Globally Harmonized System of Classification and Labelling of Chemicals
- HMIS Hazardous Materials Identification System (USA)
- IARC International Agency of Research on Cancer
- IATA International Air Transport Association
- IMDG International Maritime Code for Dangerous Goods
- NIOSH National Institute of Occupational Safety and Health
- NFPA National Fire Protection Association (USA)
- NTP National Toxicological Program
- PBT Persistent, Bioaccumulative, and Toxic
- PNEC Predicted No-Effect Concentration (REACH)
- REACH Registration, Evaluation, Authorisation, and Restriction of Chemicals; (EC) 1907/2008
- RCRA Resource Conservation and Recovery Act
- SARA Superfund Amendment and Reauthorization Act
- SVHC Substances of very high concern
- TSCA Toxic Substances Control Act
- TLV Threshold Limit Value
- vPvB Very persistent and very bioaccumulative
The information on this Safety Data Sheet is believed to be accurate and is the best information available to ZEO, Inc. This document is intended only as a guide to the appropriate precautions for handling. ZEO, Inc. makes no warranty of merchantability or any other warrant, expressed or implied with respect to the information or the product to which this Safety Sheet relates. Users and handlers of this product should make their own investigations to determine the suitability of the information provided herein for their own purposes.