

Safety Data Sheet: Lightweight Expanded Clay Aggregate

According to European Community Guideline 1907/2006

Date: 20/01/2013

1. Productname: lightweight expanded clay aggregate
Intended use: Light Weight Aggregate
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2. Possible dangers:

Excessive and prolonged daily inhalation of dust must be avoided.

3. Composition / Details of components

Mineral ceramic material, clay fired at 1100 °C, consisting of alumino silicate with chemical composition:

SiO₂: 60 % ± 5 %

Al₂O₃: 17 % ± 3 %

Fe₂O₃: 14 % ± 2 %

Other elements (K₂O, CaO, MgO, TiO₂, Na₂O) : 9 % ± 2 %

| | CAS-number | |
|--------|------------|--------|
| quartz | 14808-60-7 | ± 10 % |

4. First Aid Measures

after inhalation: respiration in fresh air

after skin contact: no known irritation

after eye-contact: wash with water

after ingestion: there is no known oral toxicity

Although they should not be ingested, no harmful effects will result from quantities as much as 1 liter.

5. Fire Fighting Measures

Non-combustible and Non-flammable. Suitable for fire extinction.

6. Measures in Case of unintentional Release

Protective measurements for the environment: **not required**

7. Storage, Handling, Transportation

Avoid dust formation. Dust formation can be prevented by wetting.

No further precautions.

8. Exposition Limits and Personal Protection Gear

Exposition limits at the workplace

| | |
|-------------------|----------------------------|
| Dust (in general) | MAC 10 mg/m ³ |
| Quartz | MAC 0,10 mg/m ³ |

Personal protection Gear

| | |
|------------------------------|---|
| Breathing protection: | If atmosphere is dusty: dust mask, filter P3 |
| Hand protection: | not required |
| Eye protection: | not required |
| Body protection: | not required |
| General protection measures: | none |
| Hygienic measures: | none |

9. Physical and chemical characteristics

| | |
|----------------------|--|
| Form: | crushed aggregate |
| Density: | 320-750 kg/m ³ (depending on size and type) |
| Color: | red / brown / black |
| Odor: | odorless |
| pH at 20°C: | 6 to 10 in contact with water |
| Water solubility: | not soluble |
| Boiling point: | not relevant |
| Melting point: | > 1100 °C |
| Flash point: | not relevant |
| Self Ignition temp.: | not relevant |
| Explosion risk: | none |
| Combustion : | incombustible |

10. Stability and Reactivity

| | |
|-------------------------------------|-------------|
| Conditions to avoid : | none |
| Materials to avoid : | none |
| Dangerous desintegration products : | none |

11. Details of Toxicity

non-toxic (LD 50 scale)

12. Details of Ecology

- Persistence and ability to decompose: ceramic product
 - Biological decomposition / evaluation: not able to decompose biologically, used as substrate in biological filters.
 - Physical + chemical elimination / evaluation: inert, insoluble, do not decompose easy to eliminate from water
 - Toxic effects on ecology: **no known toxicity**
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13. Tips for Disposal

- Product: can be reused and recycled. Discarded materials may be disposed off with construction debris in conformity with regulations. Small quantities as household waste.
- Packing: Normally delivered unpacked. Plastics bags and wooden pallets may be reused, recycled or disposed according to local regulation.
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14. Transport Details

Not a dangerous substance according to National and European Transport.
Transport classification : **none**

15. Regulations

Not dangerous material according to European Community Guidelines, 67/548 and 93/21 (packing and marking of dangerous products).

16. Other Details **none**