## **Safety Data Sheet**



#### Section 1: Identification

Product Name • Drill-Beads

Product identifier • Not applicable.

Recommended Use • Proppant for oil and natural gas well hydraulic fracturing

Restrictions on Use

• Refer to available literature or ask your local Sales Representative for restrictions on use

and dose limits.

Drillchem Drilling Solutions, LLC.

PO Box 132107
• Spring, TX 77393 (281) 713-8941

Emergency Phone Number • (800) 424-9300 (24 Hours) CHEMTREC

#### Section 2: Hazard Identification

#### **GHS Classification**

Supplier

Not a hazardous substance or mixture.

#### **Hazard Statements**

Physical Hazards • Not classified for physical hazards.

● While the use of this product as intended generally does not create respirable dusts, small amounts may form from transport or conveyance. Prolonged inhalation of insoluble, respirable (less than 10 micron) dusts can lead to pulmonary damage. Use

standard hygenic practices to minimize exposure to dusts that may form.

**Environmental Hazards**• Not classified for hazards to the environment.

Main Symptoms

● Exposure to dust may cause irritation of eyes, nose, throat and mucous membranes.

Prolonged contact with skin may cause irritation. Use of the product as intended does not

result in exposure to dust.

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# Section 3 - Composition/Information on Ingredients

Chemical Name CAS-No. Concentration: (%)

Ceramic materials and wares, chemicals 66402-68-4 100

#### **Composition Comments:**

The full text for all R- and H- is displayed in Section 16. All concentrations are in percent by weight unless ingredients are a gas. Gas concentrations are in percent by volume.

#### **Section 4: First-Aid Measures**

**Eye Contact** 

 Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if irritation or symptoms persist.

**Skin Contact** 

 Wash off with soap and water. Get medical attention if irritation develops or persists.

If Swallowed

• Rinse mouth. Do not induce vomiting. Get medical attention if symptoms occur.

If Inhaled

• Remove to fresh air. Get medical attention if irritation or symptoms occur.

**Protection of First-Aiders** 

In event of emergency asses the danger before taking action. Do not put yourself at risk
of injury. If in doubt, contact emergency responders. Use personal protective equipment as required.

**Notes to Physician** 

• None specified.

Most Important Symptoms and Effects (Both Acute and Delayed)

Exposure to dust may cause irritation of eyes, nose, throat and mucous membranes.
 Prolonged contact with skin may cause irritation. Use of the product as intended does not result in exposure to dust.

Indication of Any Immediate Medical Attention and Special Treatment Needed • Provide general supportive measures and treat symptoms as needed.

## **Section 5: Fire-Fighting Measures**

#### Suitable

#### **Extinguishing Media**

• Not applicable.

# Unsuitable Extinguishing Media

Not applicable.

# Specific Hazards During Firefighting

• Not flammable or combustible.

# Hazardous Combustion Products

Decomposition products may include the following materials:
 Carbon Oxides, Nitrogen Oxides (NOx), and Hydrogen Chloride.

#### Special Protective Equipment For Firefighters

Use personal protective equipment.

# Specific Extinguishing Methods

 Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations. In the event of fire and/or explosion do not breathe fumes.

#### Section 6 - Accidental Release Measures

#### Personal Precautions, Protective Equipment, and Emergency Procedures

Non-Emergency Personnel: Avoid dust formation. Wear suitable protective clothing.

Avoid contact with skin and eyes.
 Emergency Responders: Use personal protection recommended in Section 8 of the SDS.

#### **Environmental Precautions**

None known.

# Methods and Materials for Containment and Cleaning Up

 Sweep up spilled substance and remove to safe place. Pick up and arrange for disposal without creating dust. Spilled material can reduce traction and may present a slip hazard. Collect and dispose of spillage as indicated in Section 13.

## **Reference to Other Sections**

For personal protection, see Section 8.
 For waste disposal, see Section 13.

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# Section 7 - Handling and Storage

#### **Advice on Safe Handling**

 Avoid dust formation. Avoid breathing dust. Observe good industrial hygiene practices. Spilled material can reduce traction and may present a slip hazard.

#### **Conditions for Safe Storage**

 Keep container tightly closed. Store in accordance with local, regional, national and international regulations.

#### Suitable Material

• Keep in properly labeled containers.

#### **Unsuitable Material**

Not determined.

# **Section 8 - Exposure Controls/Personal Protection**

# **Components with Workplace Control Parameters**

| Component                              | CAS No.    | Type | Value | Form |  |
|--|------------|------|-------|------|--|
| Ceramic materials and wares, chemicals | 66402-68-4 | N/A  | N/A   | N/A  |  |

Consult local authorities for acceptable exposure limits.

#### **Engineering Measures**

Observe occupational exposure limits and prevent generation of dusts.

# **Personal Protective Equipment**

Personal protective equipment should be chosen according to applicable standards and in consultation with the supplier of the personal protective equipment. Spilled material can reduce traction and may present a slip hazard.

#### **Eye Protection**

 Wear safety glases with side shields or goggles. Avoid wearing contact lenses while handling.

#### **Hand Protection**

Wear protective gloves.

#### **Skin Protection**

· Minimize skin contact.

#### **Respiratory Protection**

In case of inadequate ventilation or risk of inhalation of dust, use a suitable air purifying respirator with particle filter or dust mask (Type P2).

#### **Hygiene Measures**

 Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants.

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# **Section 9 - Physical and Chemical Properties**

| Form   | Solid spheres                    | Explosive properties                    | Not applicable           |
|--|----------------------------------|---|--------------------------|
| Color  | Brown to dark green to black     | Explosive limit                         | Not applicable           |
| Odor   | Odorless                         | Vapor pressure                          | Not applicable           |
| Odor threshold   | Not applicable                   | Vapor density                           | Not applicable           |
| рН   | Not applicable                   | Evaporation rate                        | Not applicable           |
| Melting/freezing point                                 | 4,000°F / 2,204°C<br>(Estimated) | Relative density                        | 3.3 (water = 1)          |
| Boiling point, initial boiling point and boiling range | Not applicable                   | Partition coefficient (n-octanol/water) | No data available        |
| Flash point  | Not applicable                   | Solubility (water)                      | Insoluble in water       |
| Auto-ignition temperature                              | Not applicable                   | Decomposition temperature               | No data available        |
| Flammability (solid, gas)                              | Not applicable                   | Bulk density                            | 118 lb/ft³ (1,890 kg/m³) |
| Flammability limit-lower%                              | Not applicable                   | Viscosity                               | Not applicable           |
| Flammability limit-upper%                              | Not applicable                   | VOC (weight %)                          | 0 %                      |
| Oxidizing properties                                   | Not applicable                   | Percent volatile                        | Not applicable           |

# Section 10 - Stability and Reactivity

**Chemical Stability** 

• Material is stable under normal conditions.

Possibility of Hazardous Reactions

Hazardous polymerization does not occur under normal conditions.

**Conditions to Avoid** 

None known.

**Incompatible Materials** 

Strong oxidizers.

Hazardous Decomposition Products

• Not applicable.

# **Section 11 - Toxicological Information**

# **General Information on Likely Routes of Exposure**

Ingestion

• May cause discomfort if swallowed.

Inhalation

• Inhalation of dust may cause respiratory irritation. Use of this product as intended does not result in exposure to dust.

| Skin Contact | t |
|--------------|---|
|--------------|---|

• Dust may irritate skin. Use of this product as intended does not result in exposure to dust.

#### **Eye Contact**

• Dust may irritate eyes. Use of this product as intended does not result in exposure to dust.

#### **Symptoms**

 Exposure to dust may cause irritation of eyes, nose, throat and mucous membranes. Prolonged contact with skin may cause irritation. Use of this product as intended does not result in exposure to dust.

## **Toxicity**

| Acute Oral Toxicity       | <ul> <li>No data were identified<br/>for this product.</li> </ul> | Carcinogenicity           | • no data available                      |
|---------------------------|---|---------------------------|--|
| Acute Inhalation          | <ul> <li>No data were identified</li></ul>                        | Reproductive              | no data available                        |
| Toxicity                  | for this product.   | Effects                   |  |
| Acute Dermal Toxicity     | <ul> <li>No data were identified<br/>for this product.</li> </ul> | Germ Cell<br>Mutagenicity | no data available                        |
| Skin Corrosion/Irritation | <ul> <li>No data were identified<br/>for this product.</li> </ul> | Teratogenicity            | no data available                        |
| Serious Eye Damage/       | <ul> <li>No data were identified</li></ul>                        | STOT -                    | no data available                        |
| Eye Irritation            | for this product.   | Single Exposure           |  |
| Respiratory or            | <ul> <li>No data were identified</li></ul>                        | Aspiration Toxicity       | <ul> <li>Not relevant based on</li></ul> |
| Skin Sensitization        | for this product.   |                           | physical form of the product.            |

# STOT - Repeated Exposure

 While the use of this product as intended generally does not create respirable dusts, small amounts may form from transport or conveyance. Prolonged inhalation of insoluble, respirable (less than 10 micron) dusts can lead to pulmonary damage. Use standard hygienic practices to minimize exposure to dusts that may form.

#### Conclusion/Summary

• This product is not expected to produce toxic effects.

# **Section 12 - Ecological Information**

## **Ecotoxicity**

| Test                                      | Result (mg/L)                             | Species    | Exposure  |
|---|---|------------|-----------|
| ISO 10253:2006                            | • EC50: >1,000<br>EC90: >1,000            | • Algae    | • 72 hour |
| ISO 14669:1999                            | • LC50: 304<br>LC100: >1,000<br>NOEC: 26  | Crustacean | • 48 hour |
| OECD 203: Fish<br>Acute Toxicity          | • LC50: >304<br>NOEC: >304                | • Fish     | • 96 hour |
| OSPAR Protocol 2006<br>(Sediment Reworker | LC50: >12,196 mg/kg<br>NOEC: 12,196 mg/kg | Crustacean | • 10 day  |

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## Persistence and Degradability

 Product is not biodegradable with low solubility in water and is not expected to decompose in the environment.

**Mobility** 

• no data available

#### **Bioaccumulative Potential**

 Product is not biodegradable with low solubility in water and is not expected to accumulate in the environment.

#### Other Information

• This product is not classified as hazardous to the environment.

# **Section 13 - Disposal Considerations**

The information presented only applies to the material as supplied. The classification or waste code may not apply if the material has been used or otherwise contaminated. It is the responsibility of the waste generator to determine the toxicity and physical properties of the material generated to determine the proper waste identification and disposal methods in compliance with applicable regulations.

#### **Residual Waste**

• Dispose of in accordance with all applicable regulations.

#### **Contaminated Packaging**

 Empty containers should be taken to an approved waste handling site for recycling or disposal.

#### Disposal Methods/ Information

Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dispose of contents/container in accordance with local, regional, national, and international regulations.

# Section 14 - Transportation Information

The shipper/consignor/sender is responsible to ensure that the packaging, labeling, and markings are in compliance with the selected mode of transport.

**UN Number** 

**UN Proper Shipping Name** 

**Transport Hazard Class(es)** 

**Packing Group** 

**Environmental Hazards** 

**Special Precautions For User** 

Transport in Bulk According to Annex II MARPOL 73/78 and the IBC Code

- Not applicable, not regulated as hazardous for transport.
- Not applicable, not regulated as hazardous for transport.
- Not applicable, not regulated as hazardous for transport.
- Not applicable, not regulated as hazardous for transport.
- Not applicable, not regulated as hazardous for transport.
- Not applicable, not regulated as hazardous for transport.
- Not applicable, not regulated as hazardous for transport.

The transport regulation may vary based on the country of use. Check for the appropriate regulations in the country of transport or usage of this product.

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# Section 15 - Regulatory Information

# **EPCRA - Emergency Planning and Community Right-to-Know Act**

29 CFR 1910.1200 Hazard Communication Standard (HCS):

Not hazardous.

TSCA - U.S. Inventory (TSCA 8b):

Exempt/Compliant

SARA Title III - Section 302, Extremely Hazardous Substances (EHS):

• Not listed.

**CERCLA - Hazardous Substances:** 

Not listed.

Release of CERCLA hazardous substances in excess of any reportable quantity threshold to the environment requires notification to the National Response Center (1-800-424-8802 or 1-202-267-2675).

SARA Title III - 311/312, Hazard Classes:

Fire/Flammability

Acute Health Hazard No

No

Reactivity

No

Chronic Health Hazard

No

Release of Pressure

• No

**SARA 313 - Toxic Chemicals** 

• Not listed.

**USA State Regulations** 

• To the best of our knowledge, this product does not contain chemicals at levels which require reporting under any State Regulations.

Other Regulations

None specified

#### Section 16 - Other Information

**Label Requirements:** 

None.

Revision Date Version Number Prepared By

• 09/21/2015

HSE Coordinator

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designe donly as a guidance for safet handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

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