Gesswein SDS# – FRF515a

Safety Data Sheet according to Regulation (EC) Nr. 1907/2006
Revisions date: 29.04.2015

1. Identification of the substance and of the company

   Trade name: DEGUSSIT® RUBY STONE
   Product #: 3501002, 3501003, 3501012, 3501013, 3501052, 3501102, 3501103, 3501112, 3501113, 3501114, 3502002, 3502003, 3502011, 3502012, 3502013, 3502021, 3502022, 3502023, 3502033, 3502032, 3502033, 3502023, 3502012, 3502103, 3502111, 3502112, 3502113, 3502121, 3502122, 3502123, 3502131, 3502132, 3502133, 3502142, 3502143, 3502202, 3502203, 3502211, 3502212, 3502213, 3502311, 3502312, 3502401, 3502501, 3502505, 3502613, 3502703, 3502710, 3502712, 3502713, 3502721, 3502722, 3502723, 3502731, 3502732, 3502733, 3502912, 3502913, 3503000
   Supplier: Paul H. Gesswein & Co., Inc.
   201 Hancock Ave., Bridgeport, CT 06605
   Phone: 203-366-5400, FAX: 203-366-3953
   email: info@gesswein.com, www.gesswein.com
   Emergency phone number: CHEMTELL - 800-255-3924

2. Hazards identification
   Not classified as hazardous acc. to GHS or EC-regulation

3. Information on ingredients:

   Characterisation: chromium doped alumina
   Main component: Al₂O₃
   CAS – No: 1344-28-1
   EINECS – No: 215-691-6
   Hazardous ingredients: none

4. First aid measures:
   No special measures necessary

5. Firefighting measures:
   The product itself does not burn

6. Accidental release requirements:
   No special measures necessary

7. Handling and storage:
   Brittle material, handling accordingly

8. Exposure controls and personal protection:
   No special measures necessary

9. Physical and chemical properties:

   Appearance: Physical state: solid ceramic product
   Colour: red
   Odour: none
   Density: approx. 3.9 g/cm³

   Safety relevant basic data:
   Melting point: approx. 2050°C
   Flash point: not applicable
   Explosive limits: not applicable
   Ignition point: not applicable
   Water solubility: insoluble
## 10. Stability and reactivity:
No disclosures required

## 11. Toxicological information:
Not classified as toxic or hazardous

## 12. Ecological information:
Without risk to the environment

## 13. Disposal considerations:
According the local official regulations for ceramic materials

## 14. Transport information:
Not dangerous cargo

## 15. Regulatory information:
A safety data sheet is not mandatory acc. 1907/2006/EU. Provide is voluntary.

## 16. Other information:
The data given here is based on current knowledge and experience. The purpose of this Safety Data Sheet is to describe the product in terms of their safety requirements. The data does not signify any warranty with regard to the product’s properties.

This safety data sheet was created with computer and is valid without signature.
SAFETY DATA SHEET
Gesswein® MOLDMAKER and MOLDMAKER PLUS Finishing Stones

Section 1: Identification Of the Substance/Mixture And Of The Supplier

<table>
<thead>
<tr>
<th>Supplier</th>
<th>Manufacturer</th>
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<tbody>
<tr>
<td>Paul H. Gesswein &amp; Co., Inc.</td>
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<tr>
<td>201 Hancock Ave.</td>
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</tr>
<tr>
<td>Bridgeport, CT 06605</td>
<td>Bridgeport, CT 06605</td>
</tr>
<tr>
<td>Company Contact: John Harsh</td>
<td>Company Contact: John Harsh</td>
</tr>
<tr>
<td>Telephone Number: 203-366-5400</td>
<td>Telephone Number: 203-366-5400</td>
</tr>
<tr>
<td>E-Mail: <a href="mailto:jharsh@gesswein.com">jharsh@gesswein.com</a></td>
<td>E-Mail: <a href="mailto:jharsh@gesswein.com">jharsh@gesswein.com</a></td>
</tr>
<tr>
<td>Web Site: <a href="http://www.gesswein.com">www.gesswein.com</a></td>
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</tr>
</tbody>
</table>

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<tr>
<th>Supplier Emergency Contacts &amp; Phone Number</th>
<th>Manufacturer Emergency Contacts &amp; Phone Number</th>
</tr>
</thead>
<tbody>
<tr>
<td>Chemtel: 800-255-3924</td>
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</tr>
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</table>

Issue Date: 05/14/2015

Product Name: Gesswein® MOLDMAKER and MOLDMAKER PLUS Finishing Stones
CAS Number: Not Established
Chemical Family: carbide abrasive

Synonyms
abrasive stone
bonded silicon carbide
mold stone
polishing stone

Product/Material Uses
Mold and die polishing, grinding, tool sharpening, dressing of grinding and cutting wheels. Vitrified silicon carbide abrasives break down during use. The resulting dust is classified by OSHA as inert or nuisance dust. Data provided pertains primarily to the dust produced during and after use. IMPORTANT: Hazards may change when this product is used in conjunction with solvents, cutting fluids or other chemicals. For more complete information, consult the Safety Data Sheet of chemical products used with vitrified silicon carbide abrasives.

Section 2: Hazards Identification

WARNING

Hazard Classification(s)

HAZARD CLASSIFICATION(S):
Specific Target Organ Toxicity, Repeated Exposure: Category 3 (lung)

SIGNAL WORD: WARNING

HAZARD STATEMENTS:
May cause respiratory irritation (H335)

PRECAUTIONARY STATEMENTS:
P261 - Avoid breathing mist, vapor or spray.
P271 - Use only outdoors or in a well-ventilated area.
P304+P340 - IF INHALED: remove person to fresh air and keep comfortable for breathing.
P312 - Call a Poison Center or Doctor if you feel unwell.
P403+P233 - Store in a well-ventilated place. Keep container tightly closed.
P405 - Store locked up.
P501 - Dispose of contents/container in accordance with local, state, federal and international regulation.
SAFETY DATA SHEET
Gesswein® MOLDMAKER and MOLDMAKER PLUS Finishing Stones

Section 3: Composition/Information On Ingredients

<table>
<thead>
<tr>
<th>Ingredient Name</th>
<th>CAS Number</th>
<th>Percent Of Total Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td>cured marking ink</td>
<td>NA</td>
<td>&lt; 1</td>
</tr>
<tr>
<td>felt/clay</td>
<td>65997-18-4</td>
<td>5 - 30</td>
</tr>
<tr>
<td>silicon carbide, non-fibrous</td>
<td>409-21-2</td>
<td>60 - 95</td>
</tr>
</tbody>
</table>

Vitrified silicon carbide abrasives are ceramic articles that may be further treated with cured resin, oil or wax. End use of vitrified silicon carbide abrasives (i.e., grinding, polishing) may produce dust which is classified as inert or nuisance dust. Product may contain trace concentrations of crystalline silica.

Section 4: First Aid Measures

Eye
Hold eyelids apart and flush eyes with plenty of water for at least 15 minutes. Get medical attention immediately if irritation or blurred vision develops and persists.

Skin
In case of contact, wash skin with soap and water. Get medical attention if irritation (redness, rash, blistering) develops and persists.

Ingestion
Call a physician or a poison control center immediately in case a large amount is accidently swallowed. No treatment is thought to be necessary for ingestion of small amounts of dust. Rinse mouth with water.

Inhalation
Remove person from source of exposure to fresh air. Get medical attention if irritation, coughing, sneezing or shortness of breath develops and persists.

Section 5: Fire Fighting Measures

Flammability Class: None flammable or combustible.

Fire And Explosion Hazards
Not applicable for untreated silicon carbide abrasives. Oils, wax or solvents applied to the stone or tools may be flammable - see (M)SDS for chemicals used during tool sharpening.

Extinguishing Media
Use the appropriate extinguishing media for the surrounding fire - water spray, carbon dioxide, dry chemical, foam.

Fire Fighting Instructions
Not applicable for untreated silicon carbide abrasives. Consulting fire fighting instructions for oils, waxes and solvents applied to stone.

Section 6: Accidental Release Measures

Small amounts of dust may be swept up into a suitable, closeable container for disposal. Use a vacuum or wet clean-up methods, such as water mist, for large amounts of dust. Avoid generating airborne dust.

Section 7: Handling And Storage

Handling Precautions
Avoid generating airborne dust. Use with adequate ventilation to control dust. Do not use compressed air, or shake clothing, rags or other items, to remove dust. Remove dust by washing or vacuuming. See ANSI Standard B7.1 safety requirements for the use of abrasive grinding wheels.
SAFETY DATA SHEET
Gesswein® MOLDMAKER and MOLDMAKER PLUS Finishing Stones

Section 7: Handling And Storage - Continued

Storage Precautions
Not applicable.

Work/Hygienic Practices
Use good personal hygiene. Wash thoroughly with soap and water after handling.

Section 8: Exposure Controls/Personal Protection

Engineering Controls
Use with adequate general and local exhaust ventilation. Local exhaust ventilation should be provided, if possible, to maintain exposures below recommended occupational exposure limits. Used good housekeeping and hygiene practices.

Eye/Face Protection
Goggles or faceshield over safety glasses should be worn when using the product for grinding, cutting and polishing.

Skin Protection
Protective gloves, such as leather work gloves, are recommended but not required when using abrasives. However, use gloves with care around rotating grinding wheels or similar equipment where gloves and clothing may get caught in pinch points on the grinders.

Respiratory Protection
General room ventilation is normally adequate. Engineering controls should be implemented preferentially to reduce exposures. In case of inadequate ventilation, use NIOSH-approved 95-series respirator for dust. Note that R or P-series dust filters may be necessary when using cutting oils on abrasives. The level of respiratory protection needed should be based on the required protection factor after evaluating chemical exposures using appropriate industrial hygiene monitoring and/or OSHA guidance.

Other/General Protection
Hearing protection, such as muffs or plugs, should be used for high noise levels during grinding. Get medical attention in the event of hearing problems or ringing in the ears.

Ingredient(s) - Exposure Limits
silicon carbide, non-fibrous
ACGIH TLV-TWA: 10 mg/m³ (inhalable dust)
ACGIH TLV-TWA: 3 mg/m³ (respirable dust)
OSHA PEL-TWA: 15 mg/m³ (total dust)
OSHA PEL-TWA: 5 mg/m³ (respirable dust)
NIOSH REL-TWA: 10 mg/m³ (total dust, 10 hrs)
NIOSH REL-TWA: 5 mg/m³ (respirable dust, 10 hrs)

Section 9: Physical And Chemical Properties

Appearance
Solid, green, gray or black block or wheel.

Odor
Odorless for untreated silicon carbide abrasives. Slight paraffin odor for oil or wax treated products.

Chemical Type: Mixture
Physical State: Solid
Specific Gravity: 1.5 to 2.5
Percent Volatiles: NA
Percent VOCs: NA
Vapor Pressure: NA
Vapor Density: NA
Section 9: Physical And Chemical Properties - Continued

Solubility: insoluble
Evaporation Rate: NA

Section 10: Stability And Reactivity

Stability: Stable
Hazardous Polymerization: Will not occur

Conditions To Avoid (Stability)
Not applicable for untreated silicon carbide abrasives. See (M)SDSs for waxes, oils or solvents applied to abrasives. May be flammable. May evolve toxic or irritating thermal decomposition products.

Incompatible Materials
Not applicable for untreated silicon carbide abrasives. See (M)SDSs for waxes, oils or solvents applied to abrasives.

Hazardous Decomposition Products
Not applicable for untreated silicon carbide abrasives. See (M)SDSs for waxes, oils or solvents applied to abrasives. May be flammable. May evolve toxic or irritating thermal decomposition products.

Section 11: Toxicological Information

Eye Effects
Dust can scratch the cornea and cause mechanical irritation, resulting in redness and watering of the eyes and blurred vision.

Skin Effects
Contact with dust may cause mechanical irritation, resulting in redness and rash of the skin. Although product is not expected to be a significant skin irritant.

Acute Oral Effects
Ingestion is not an anticipated route of exposure due to the physical form of the product. However, small amounts may be ingested from contact of contaminated hands with the mouth, such as during eating and smoking. Abrasive particles may cause mechanical irritation of the mouth and throat.

Acute Inhalation Effects
Inhalation is not anticipated directly from the product. However, dust generated from grinding and polishing may be inhaled. High dust concentrations may cause nose and throat irritation, sneezing and coughing.

Long-term inhalation of dust may decrease the ability of the lungs to clear particulate matter, which may cause shortness of breath and increased susceptibility to respiratory disease, pneumoconiosis. There is an increased risk of developing tuberculosis if pneumoconiosis develops.

Subchronic (Target Organ Effects)
Grinding may create high noise and vibration levels which could affect or damage hearing. High noise levels may result in hearing loss and/or tinnitus (ringing in the ears). Prolonged or repeated exposure to excessive vibration may cause circulatory effects in the hands. Prolonged or repeated exposure to vibration may result in a tingling or numbness sensation of the fingers and hands (i.e., Reynauds Disease).

Chronic/Carcinogenicity
Product does NOT contain fibrous silicon carbide. Non-fibrous silicon carbide is not considered to be carcinogenic by NTP, IARC, OSHA or ACGIH.

Product may contain trace amounts of crystalline silica. Prolonged exposure to crystalline silica may cause silicosis of the lungs, a severely disabling, progressive and often fatal pulmonary disease. Crystalline silica is characterized as a known human carcinogen by the National Toxicology Program (NTP) and is listed as an IARC Group 1 human carcinogen.
## Section 11: Toxicological Information - Continued

### Conditions Aggravated By Exposure

Nuisance dust may aggravate pre-existing lung conditions.

### Ingredient(s) - Toxicological Data

| frit/clay | LD50 (oral, rat): >3,000 mg/kg |

## Section 12: Ecological Information

### Ecotoxicological Information

No ecotoxicological information is available. However, untreated silicon carbide abrasives are not expected to represent a significant ecological hazard.

## Section 13: Disposal Considerations

Dispose in accordance with applicable federal, state and local government regulations. Dispose of bulk amounts in an environmentally responsible manner. Untreated silicon carbide abrasives can generally be disposed in an approved sanitary landfill.

## Section 14: Transport Information

### Proper Shipping Name

Not regulated for transportation.

## Section 15: Regulatory Information

### U.S. Regulatory Information

All ingredients of this product are listed or are excluded from listing under the U.S. Toxic Substances Control Act (TSCA) Chemical Substance Inventory.

### SARA Hazard Classes

Chronic Health Hazard

### SARA Section 313 Notification

This product does not contain any ingredients regulated under Section 313 of the Emergency Planning and Community Right-To-Know Act of 1986 or 40 CFR 372.

### Ingredient(s) - State Regulations

- silicon carbide, non-fibrous
  - New Jersey - Workplace Hazard
  - Pennsylvania - Workplace Hazard

## Section 16: Other Information

### NFPA Rating

- Health: 0
- Fire: 0
- Reactivity: 0

### HMIS Rating

- Health: 0
- Fire: 0
- Reactivity: 0
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Paul H. Gesswein & Co., Inc.