# Safety Data Sheet

## 1. IDENTIFICATION

<table>
<thead>
<tr>
<th>Product Identifier</th>
<th>Product Name</th>
<th>Form-A-Tread, Part B</th>
</tr>
</thead>
<tbody>
<tr>
<td>SDS #</td>
<td></td>
<td>141120-64</td>
</tr>
</tbody>
</table>

### Recommended use of the chemical and restrictions on use

**Recommended Use**
Form in Place Tread Making Epoxy

### Details of the supplier of the safety data sheet

**Supplier Address**
RGF Materials Company  
P.O. Box 941  
Phoenixville, PA 19460-0941 USA  
PH: 610-994-2138

**Emergency Telephone Number**
Emergency Telephone (24 hr) 610-952-7750

## 2. HAZARDS IDENTIFICATION

<table>
<thead>
<tr>
<th>Appearance</th>
<th>Grainy, Various colors</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical State</td>
<td>Paste</td>
</tr>
<tr>
<td>Odor</td>
<td>Slight amine</td>
</tr>
</tbody>
</table>

### Classification

<table>
<thead>
<tr>
<th>Acute toxicity - Dermal</th>
<th>Category 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>Skin corrosion/irritation</td>
<td>Category 2</td>
</tr>
<tr>
<td>Serious eye damage/eye irritation</td>
<td>Category 1</td>
</tr>
<tr>
<td>Skin sensitization</td>
<td></td>
</tr>
</tbody>
</table>

### Hazards Not Otherwise Classified (HNOC)

May be harmful if swallowed

### Signal Word

**Warning**

### Hazard Statements

Harmful in contact with skin  
Causes skin irritation  
Causes serious eye irritation  
May cause an allergic skin reaction
Precautionary Statements - Prevention
Wear protective gloves/protective clothing/eye protection/face protection
Wash face, hands and any exposed skin thoroughly after handling
Avoid breathing dust/fume/gas/mist/vapors/spray
Contaminated work clothing should not be allowed out of the workplace

Precautionary Statements - Response
IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing
If eye irritation persists: Get medical advice/attention
IF ON SKIN: Wash with plenty of soap and water
Take off contaminated clothing and wash it before reuse
If skin irritation or rash occurs: Get medical advice/attention

Precautionary Statements - Disposal
Dispose of contents/container to an approved waste disposal plant

Unknown Acute Toxicity
60-65% of the mixture consists of ingredient(s) of unknown toxicity

3. COMPOSITION/INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>CAS No</th>
<th>Weight-%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proprietary silicate</td>
<td>Proprietary</td>
<td>30-40</td>
</tr>
<tr>
<td>Proprietary Polyamide</td>
<td>Proprietary</td>
<td>1-10</td>
</tr>
<tr>
<td>N-Aminoethyl piperazine</td>
<td>Proprietary</td>
<td>1-10</td>
</tr>
<tr>
<td>Proprietary Silica</td>
<td>Proprietary</td>
<td>1-10</td>
</tr>
</tbody>
</table>

**If Chemical Name/CAS No is "proprietary" and/or Weight-% is listed as a range, the specific chemical identity and/or percentage of composition has been withheld as a trade secret.**

4. FIRST-AID MEASURES

First Aid Measures

**General Advice**
Provide this SDS to medical personnel for treatment. After first aid, get appropriate in-plant, paramedic, or community medical support.

**Eye Contact**
Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. If eye irritation persists: Get medical advice/attention.

**Skin Contact**
Wash with soap and water. Remove and wash contaminated clothing before reuse. If skin irritation or rash occurs: Get medical advice/attention.

**Inhalation**
Remove exposed individual(s) to fresh air for 20 minutes. Consult a physician/poison center if individual's condition declines or if symptoms persist.

**Ingestion**
Clean mouth with water and drink afterwards plenty of water. Do not induce vomiting. Never give anything by mouth to an unconscious person. Seek medical advice.
Self-Protection of the First Aider

First Aid responders should pay attention to self-protection and use the recommended protective clothing (chemical resistant gloves, splash protection). If potential for exposure exists refer to Section 8 for specific personal protective equipment.

Most important symptoms and effects

Symptoms

Causes eye and skin irritation. Direct contact may cause temporary redness and discomfort. Inhalation only possible at elevated temperatures. May cause irritation. May cause an allergic skin reaction.

Indication of any immediate medical attention and special treatment needed

Notes to Physician

Skin and eye conditions may be aggravated by long term exposure. No specific antidote. Treatment of exposure should be directed at the control of symptoms and the clinical condition of the patient.

5. FIRE-FIGHTING MEASURES

Suitable Extinguishing Media

Carbon dioxide (CO2), Dry chemical, Alcohol foam.

Unsuitable Extinguishing Media

Not determined.

Specific Hazards Arising from the Chemical

Product is not flammable.

Hazardous Combustion Products

Carbon monoxide, Carbon dioxide (CO2), Aldehydes.

Protective equipment and precautions for firefighters

A face shield should be worn. Firefighters should wear butyl rubber boots, gloves, and body suit and a self-contained breathing apparatus. Water spray may be used to cool closed containers exposed to fire. Retain expended liquids from fire fighting for later disposal. Do not release runoff from fire control methods to sewers or waterways. NFPA Class IIIB.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal Precautions

Wear protective gloves/protective clothing and eye/face protection. Avoid breathing vapors, mist or gas. Remove any contaminated clothing and wash thoroughly before reuse.

For Emergency Responders

Follow applicable OSHA regulations (29 CFR 1910.120).

Environmental Precautions

See Section 12 for additional Ecological Information. Do not release into sewers or waterways.

Methods and material for containment and cleaning up

Methods for Containment

Prevent further leakage or spillage if safe to do so. Soak up and contain spill with an absorbent material.

Methods for Clean-Up

Sweep up absorbed material and shovel into suitable containers for disposal. Discard any product, residue, disposable container or liner in full compliance with federal, state, and local regulations. For waste disposal, see section 13 of the SDS.
7. HANDLING AND STORAGE

Precautions for safe handling

Advice on Safe Handling
Handle in accordance with good industrial hygiene and safety practice. Wear appropriate personal protective equipment. Do not eat, drink or smoke when using this product. Wash face, hands, and any exposed skin thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace. Avoid breathing dust/fume/gas/mist/vapors/spray.

Conditions for safe storage, including any incompatibilities

Storage Conditions
Keep containers tightly closed in a dry, cool and well-ventilated place. Store contents under <90F (32C). NFPA Class IIIB storage.

Incompatible Materials
None known based on information supplied.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Exposure Guidelines

Appropriate engineering controls

Engineering Controls
Provide general or local exhaust ventilation if product is sanded or ground. Suitable emergency eye wash facility should be available in work area.

Individual protection measures, such as personal protective equipment

Eye/Face Protection
Chemical safety goggles/faceshield.

Skin and Body Protection
Wear protective gloves and protective clothing.

Respiratory Protection
Follow OSHA respirator regulations (29 CFR 1910.134) and, if necessary, wear a MSHA/NIOSH-approved respirator.

General Hygiene Considerations
Handle in accordance with good industrial hygiene and safety practice. Do not eat, drink or smoke when using this product. Wash contaminated clothing before reuse.

9. PHYSICAL AND CHEMICAL PROPERTIES

Information on basic physical and chemical properties

<table>
<thead>
<tr>
<th>Property</th>
<th>Values</th>
<th>Odor</th>
<th>Odor Threshold</th>
<th>Remarks</th>
<th>Method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physical State</td>
<td>Paste</td>
<td>Slight amine</td>
<td>Not determined</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Appearance</td>
<td>Grainy</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Color</td>
<td>Black</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Property</td>
<td>Values</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>pH</td>
<td>&gt;2.0 and &lt;11.5</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Melting Point/Freezing Point</td>
<td>Not available</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Boiling Point/Boiling Range</td>
<td>No data</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flash Point</td>
<td>248.88 °C / 480 °F</td>
<td></td>
<td></td>
<td>CC (closed cup)</td>
<td></td>
</tr>
<tr>
<td>Evaporation Rate</td>
<td>Not determined</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Flammability (Solid, Gas)</td>
<td>Not determined</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Upper Flammability Limits: Not available
Lower Flammability Limit: Not available
Vapor Pressure: Not determined
Vapor Density: Not available
Specific Gravity: 1.05 (1=Water) @ 4°C
Water Solubility: Insoluble in water
Solubility in other solvents: Alcohols
Partition Coefficient: Not determined
Auto-ignition Temperature: Not determined
Decomposition Temperature: Not determined
Kinematic Viscosity: Not determined
Dynamic Viscosity: Not determined
Explosive Properties: Not determined
Oxidizing Properties: Not determined
VOC Content: 0 g/L EPA Method 24
Density: 8.8 lbs/gal

10. STABILITY AND REACTIVITY

Reactivity
Not reactive under normal conditions.

Chemical Stability
Stable under recommended storage conditions.

Possibility of Hazardous Reactions
None under normal processing.

Hazardous Polymerization
Hazardous polymerization does not occur.

Conditions to Avoid
Keep out of reach of children.

Incompatible Materials
None known based on information supplied.

Hazardous Decomposition Products
None known based on information supplied.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure

Product Information

Eye Contact
Causes serious eye irritation.

Skin Contact
Causes skin irritation. May cause an allergic skin reaction.

Inhalation
Under normal conditions of intended use, this material is not expected to be an inhalation hazard.

Ingestion
Ingestion may cause irritation to mucous membranes. May be harmful if swallowed.
**Component Information**

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Oral LD50</th>
<th>Dermal LD50</th>
<th>Inhalation LC50</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proprietary Polyaminoamide</td>
<td>&gt;2000 mg/kg (rat)</td>
<td>2000 mg/kg (rat)</td>
<td>-</td>
</tr>
<tr>
<td>N-Aminoethyl piperazine</td>
<td>= 2140 mg/kg (Rat)</td>
<td>= 880 µL/kg (Rabbit)</td>
<td>-</td>
</tr>
</tbody>
</table>

**Information on physical, chemical and toxicological effects**

**Symptoms**
Please see section 4 of this SDS for symptoms.

**Delayed and immediate effects as well as chronic effects from short and long-term exposure**

**Sensitization**
May cause an allergic skin reaction.

**Carcinogenicity**
The table below indicates whether each agency has listed any ingredient as a carcinogen. However, the product as a whole has not been tested.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>ACGIH</th>
<th>IARC</th>
<th>NTP</th>
<th>OSHA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proprietary silicate</td>
<td></td>
<td>Group 3</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Legend**

IARC (International Agency for Research on Cancer)  
Group 3 IARC components are "not classifiable as human carcinogens"  

**Numerical measures of toxicity**
Not determined

**Unknown Acute Toxicity**
60-65% of the mixture consists of ingredient(s) of unknown toxicity.

**12. ECOLOGICAL INFORMATION**

**Ecotoxicity**
An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.

**Component Information**

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>Algae/aquatic plants</th>
<th>Fish</th>
<th>Toxicity to microorganisms</th>
<th>Crustacea</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proprietary silicate</td>
<td></td>
<td>100: 96 h Brachydanio rerio g/L LC50 semi-static</td>
<td></td>
<td></td>
</tr>
<tr>
<td>N-Aminoethyl piperazine</td>
<td>495: 72 h Pseudokirchneriella subcapitata mg/L EC50</td>
<td>1950 - 2460: 96 h Pimephales promelas mg/L LC50 flow-through 1000: 96 h Poecilia reticulata mg/L LC50 semi-static 100: 96 h Oncorhynchus mykiss mg/L LC50 semi-static</td>
<td>32: 48 h Daphnia magna mg/L EC50</td>
<td></td>
</tr>
</tbody>
</table>

**Persistence/Degradability**
Not determined.

**Bioaccumulation**
Not determined.
14. TRANSPORT INFORMATION

Note
Please see current shipping paper for most up to date shipping information, including exemptions and special circumstances.

DOT
Not regulated

IATA
Not regulated

IMDG
Not regulated

15. REGULATORY INFORMATION

International Inventories

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>TSCA</th>
<th>DSL</th>
<th>NDSL</th>
<th>EINECS</th>
<th>ELINCS</th>
<th>ENCS</th>
<th>IECSC</th>
<th>KECL</th>
<th>PICCS</th>
<th>AICS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proprietary Silicate</td>
<td>Present</td>
<td>X</td>
<td></td>
<td>Present</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proprietary Polyaminoamide</td>
<td>Present</td>
<td>X</td>
<td></td>
<td>Present</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>N-Aminoethyl piperazine</td>
<td>Present</td>
<td>X</td>
<td></td>
<td>Present</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Proprietary Silicone</td>
<td>Present</td>
<td>X</td>
<td></td>
<td>Present</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Legend:

- **TSCA** - United States Toxic Substances Control Act Section 8(b) Inventory
- **DSL/NDSL** - Canadian Domestic Substances List/Non-Domestic Substances List
- **EINECS/ELINCS** - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances
- **ENCS** - Japan Existing and New Chemical Substances
- **IECSC** - China Inventory of Existing Chemical Substances
- **KECL** - Korean Existing and Evaluated Chemical Substances
- **PICCS** - Philippines Inventory of Chemicals and Chemical Substances
- **AICS** - Australian Inventory of Chemical Substances
US Federal Regulations

CERCLA
This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355).

SARA 313
Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

CWA (Clean Water Act)
This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

US State Regulations

California Proposition 65
This product does not contain any Proposition 65 chemicals.

U.S. State Right-to-Know Regulations

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>New Jersey</th>
<th>Massachusetts</th>
<th>Pennsylvania</th>
</tr>
</thead>
<tbody>
<tr>
<td>Proprietary silicate</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>N-Aminoethyl piperazine</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
</tbody>
</table>

16. OTHER INFORMATION

<table>
<thead>
<tr>
<th>NFPA</th>
<th>Health Hazards</th>
<th>Flammability</th>
<th>Instability</th>
<th>Special Hazards</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>1</td>
<td>0</td>
<td>0</td>
<td>Not determined</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>HMIS</th>
<th>Health Hazards</th>
<th>Flammability</th>
<th>Physical Hazards</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>1</td>
<td>0</td>
<td>B- Safety Glasses, Gloves</td>
</tr>
</tbody>
</table>

Issue Date: 2 – Feb - 2015
Revision Date: 31-May-2017
Revision Note: Remove non haz ingredients

Disclaimer
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 designed only as a guidance for safe 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.

End of Safety Data Sheet