Section I. Chemical Product and Company Identification

**Supplier:**
Hummel Croton Inc.
10 Harmich Road
South Plainfield, NJ 07080
(908)-754-1800

**Chemical Name:**
Aminoguanidine Bicarbonate

**Synonym:**
Aminoguanidine Hydrogen Carbonate

**CAS Number:** 2582-30-1

**Chemical Formula:**
HN=C(NH₂)NH-NH₂-H₂CO₃

---

**HMIS Rating**

<table>
<thead>
<tr>
<th></th>
<th>Health</th>
<th>Flammability</th>
<th>Reactivity</th>
<th>Personal Protection</th>
</tr>
</thead>
<tbody>
<tr>
<td>Health</td>
<td>1</td>
<td></td>
<td></td>
<td>E</td>
</tr>
<tr>
<td>Flammability</td>
<td>0</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Reactivity</td>
<td>0</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Personal Protection</td>
<td>E</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

---

Section II. Composition and Information on Ingredients

<table>
<thead>
<tr>
<th>Material</th>
<th>CAS#</th>
<th>%</th>
<th>OSHA</th>
<th>ACGIH</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aminoguanidine Bicarbonate</td>
<td>2582-30-1</td>
<td>100%</td>
<td>Not Established</td>
<td>Not Established</td>
</tr>
</tbody>
</table>

Since no Exposure limits have been established for Aminoguanidine Bicarbonate by OSHA & ACGIH, we recommend that our product should be treated as a nuisance dust 15 mg/m³.

Section III Hazards Identification:

**Acute Health Effects:** Irritating to the skin and eyes on contact. Inhalation will cause irritation to the lungs and mucus membrane. Irritation to the eyes will cause watering and redness. Reddening, scaling, and itching are characteristics of skin inflammation. Follow safe industrial hygiene practices and always wear protective equipment when handling this compound.

**Chronic Health Effects:** This product has no known chronic effects. Repeated or prolong exposure to this compound is not known to aggravate medical conditions.

**Acute Health Effects:** This product is not listed by NTP, IARC or regulated as a Carcinogen by OSHA.

Section IV. First Aid Measures

**First Aid For Eye:** In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Call a physician.

**First Aid For Skin:** In case of contact, flush skin with water. Wash clothing before reuse. Call a physician if irritation occurs.

**First Aid For Inhalation:** If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen.
Call a physician.

First Aid For Ingestion: If swallowed, call a physician immediately.

Section V. Fire and Explosion Data

**Flammability:** Non-Flammable
**Flash Points:** Not Applicable
**Auto-Ignition:** 473 F (245 C); DIN 51794
**Flammable Limits:** Not Applicable
**Extinguishing Media:** Water, Carbon Dioxide, & Foam
**Fire Fighting Procedure:** Firefighters should be equipped with self-contained breathing apparatus to protect against potentially toxic and irritating fumes. Avoid dusting.
**Fire/Explosion Hazards:** Avoid dusting.

Section VI. Accidental Release Measures

**Spill Or Leak Procedures:** Utilize recommended protective clothing and equipment. Clean spills in a manner that does not disperse dust into the air. Spill area can be washed with water. Collect wash water for approved disposal. Keep from entering water or ground water.

Section VII. Handling and Storage

**Storage Temperatures:** Product must be stored below 30°C (85°F) to reduce the risk of decomposition and discoloration.
**Shelf Life:** Unlimited in tightly closed container.
**Special Sensitivity:** Sensitive to heat and light will discolor
**Handling/Storage Precautions:** Avoid breathing dust. Avoid getting in eyes or on skin. Wash thoroughly after handling. Store in a dry place away from direct sunlight, heat and incompatible materials (see Section X). Reseal containers immediately after use. Store away from food and beverages.

Section VIII. Exposure Controls/Personal Protection

**Eye Protection:** Safety glasses or goggles.
**Skin Protection:** PVC gloves with impervious boots, apron or coveralls. Employees should wash their hands and face before eating, drinking or using tobacco products.
**Respirator:** Work ambient concentrations should be monitored and if the recommended exposure limit is exceeded, a NIOSH/MSHA approved dust respirator must be worn.
**Ventilation:** Use local ventilation if dusting is a problem, to maintain air levels below the recommended exposure limit.
**Additional Protective Measures:** Emergency showers and eye wash stations should be available. Educate and train employees in the safe use and handling of hazardous chemicals.

Section IX. Physical and Chemical Properties

**Physical Form:** Fine Crystals
**Color:** White-It. Yellow-Pink
**Odor:** Odorless
**Molecular Weight:** 136.09
**Boiling Point:** Not Applicable
**Melting/Freezing Point:** ~170°
**Solubility In Water:** Insoluble
**Specific Gravity:** Not Established

Section X. Stability And Reactivity

**Stability:** Will Discolor with exposure to light and heat. Keep below 30°C(85°F)
**Hazardous Polymerization:** Will Not occur
**Incompatibilities:** Oxidizing substances, acids, hydroxides
**Instable Conditions:** Excessive temperatures (see Incompatibilities).
**Decomposition Temperature:** ~170°C (dec)
**Decomposition products:** Oxides of Carbon and Nitrogen

Section XI. Toxicological Infomation

**RTECS Number:** Not Applicable
Routes of Exposure: Eye contact. Ingestion. Inhalation. Skin contact. 

Toxicity Data: To the best of our Knowledge this material has not been tested For guidance purpose sees Aminoguanidine RTECS# ME8225000 (scu-rat LD50 1258mg/kg, scu-mus LD50: 963 mg/kg)

Chronic Toxic Effects: This compound has not been fully tested. 

Acute Toxic Effects: Harmful if swallowed, inhaled, or absorbed through skin. Material can be destructive to tissue of the mucous membranes and upper respiratory tract, eyes and skin. Inhalation could be fatal as a result of spasm, inflammation and edema of the larynx and bronchi, chemical pneumonitis and pulmonary edema. Symptoms of exposure may include burning sensation, coughing, wheezing, laryngitis, shortness of breath, headache, nausea and vomiting. 

Section XII. Ecological Information

Ecotoxicity: Not available at this time. 

Section XIII. Disposal Considerations

Waste Disposal Method: Waste disposal should be in accordance with existing federal, state and local environmental regulations. 

Section XIV. Transportation Information

Proper Shipping Name: Aminoguanidine Bicarbonate  
UN Number: N/A  
Class: N/A  
P.G.: N/A  
Label Code: N/A  

Section XV. Regulatory Information

OSHA Status: This product is hazardous under the criteria of the Federal OSHA Hazard Communication Standard 29 CFR 1910.1200. 

TSCA Chemical Inventory: This compound is on the EPA Toxic Substance Control Act (TSCA) inventory List 

California Proposition 65: To the best of our knowledge, this product contains no levels of listed substances, which the state of California has found to cause cancer, birth defects or other reproductive effects. 

SARA 313 Title III: 
Section 302 Extremely Hazardous Substances: None  
Section 311/312 Hazardous Categories: None  
Section 313 Toxic Chemicals: None  

Section XVI. Other Information

Prepared By: Mark Dugan  
Date: January 05, 2009  
Reason For Issue: Updated Format 

No warranty, expressed or implied, or merchantability, fitness for a particular purpose or otherwise is made, except that the products herein discussed comply with the chemical description on the labels. Buyer assumes risks of the use, storage and handling. Hummel shall not be liable for any incidental or consequential damages arising directly or indirectly in connection with the purchase, use, storage or handling of this product. The information contained herein is, to the best of our knowledge, true and accurate. However, all recommendations or suggestions are made without guarantee, since the conditions of use are beyond our control. We disclaim any liability incurred in connection with the use of these data or suggestions. This information is not to be taken as a license to operate under, or a recommendation to infringe any patent(s). The observance of all regulations and patents is the responsibility of the user. No agent, representative or employee of this company is authorized to vary any terms of this notice.