

MSDS Cover Sheet



INSTRUMENT CORPORATION
 4356 COMMUNICATIONS DRIVE
 NORCROSS, GA 30093-1877 U.S.A.

Reference Material Zeolite 5A

						DWN BY	J. Exley
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						HR SIG	
						QA SIG	
-	Formal Release	JDE	11/10/11	___	110045	ES SIG	
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Micromeritics Material Safety Data Sheet

Title : Ref. Material Zeolite 5A
Date of Preparation : 10/25/11

MSDS No. : 004/16847/00MSDS
Revision : -

Section 1 - Chemical Product and Company Identification

Product/Chemical Name: Molecular Sieve Activated, Type 5A

Chemical Formula: AlCaNaO₄Si+2

CAS Number: Not Applicable

Other Designations: Molecular Sieve Type 5A; Synthetic Zeolite; Sodium Calcium Silicoaluminate

General Use: Not Applicable

Supplier: Micromeritics Instrument Corp.
4356 Communications Dr.
Norcross, GA 30093-1877 USA

Contact: Human Resources
Phone: (770) 662-3620
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Manufacturer:

Avantor Performance Materials, Inc. 3477 Corporate Parkway, Suite #200 Center Valley, PA 18034 USA
Phone: 855-282-6867; 24 Hour Emergency: 908-859-2151; Chemtec: 800-424-9300

Section 2 - Composition / Information on Ingredients

Ingredient Name	CAS Number	% wt or % vol
Silicic Acid Aluminum Calcium Sodium Salt	1344-01-0	90- 100%

Trace Impurities:

Ingredient	OSHA PEL		ACGIH TLV		NIOSH REL		NIOSH
	TWA	STEL	TWA	STEL	TWA	STEL	IDLH
Molecular Sieve, Activated (1344-01-0)	none estab.	none estab.	1.0 mg/m ³	none estab.	none estab.	none estab.	none estab.

Section 3 - Hazards Identification

☆☆☆☆☆ Emergency Overview ☆☆☆☆☆

Potential Health Effects

HMIS
H 1
F 0
R 0
PPE [†]
[†] Sec. 8

Primary Entry Routes: Dust contact with skin and eyes, Inhalation, Ingestion

Target Organs: Respiratory system. Lungs

Acute Effects

Inhalation: May cause respiratory irritation

Eye: Dust or powder may irritate eye tissue. If irritation should occur, it is expected to be transient

Skin: Dust or powder may irritate the skin.

Ingestion: Expected to be a low ingestion hazard. May cause temporary irritation of the throat, stomach, and gastrointestinal tract.

Carcinogenicity: This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

Medical Conditions Aggravated by Long-Term Exposure: Respiratory conditions

Chronic Effects: Frequent inhalation of dust over a long period of time increases the risk of developing lung diseases. May cause lung damage.

Comments: None

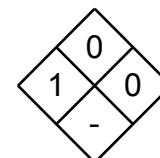
Section 4 - First Aid Measures

Inhalation: Move to fresh air. Treat symptomatically. Get medical attention if symptoms persist.
Eye Contact: Wash out immediately with water. If easy to do, remove contact lenses.
Skin Contact: Wash off with soap and water.
Ingestion: Seek medical advice.
Note to Physicians: Treat symptomatically.
Special Precautions/Procedures: Get medical attention if irritation develops and persists.

Section 5 - Fire-Fighting Measures

Flash Point: Noncombustible
Flash Point Method: Not Applicable
Burning Rate: Not Applicable
Autoignition Temperature: Not Applicable
LEL: Not Applicable
UEL: Not Applicable
Flammability Classification: Not Applicable
Extinguishing Media: Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.
Unusual Fire or Explosion Hazards: None
Hazardous Combustion Products: Not Applicable
Fire-Fighting Instructions: Not Applicable
Fire-Fighting Equipment: Wear self-contained breathing apparatus and full protective gear.

NFPA



Section 6 - Accidental Release Measures

Spill /Leak Procedures: Keep unnecessary personnel away. Keep upwind. Ventilate the area. Avoid inhalation of dust from the spilled material. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing.
Small Spills: Sweep up or vacuum up spillage and collect in suitable container for disposal.
Large Spills
Containment: If sweeping of a contaminated area is necessary use a dust suppressant agent which does not react with the product. Prevent entry into waterways, sewer, basements or confined areas.
Cleanup: Collect dust or particulates using a vacuum cleaner with a HEPA filter. Reduce airborne dust and prevent scattering by moistening with water.
Regulatory Requirements: Refer to Section 15 for reportable quantity and other regulatory data.

Section 7 - Handling and Storage

Handling Precautions: Keep formation of airborne dusts to a minimum. Do not breathe dust; do not get in eyes, on skin, or on clothing. Use only with adequate ventilation. Wash thoroughly after handling. See Section 8 for personal protective equipment.
Storage Requirements: Keep container tightly closed. Store in a well-ventilated area.
Regulatory Requirements: Not Applicable

Section 8 - Exposure Controls / Personal Protection

Engineering Controls: Ventilation should be sufficient to effectively remove and prevent buildup of any dusts or fumes that may be generated during handling or thermal processing. If engineering measures are not sufficient to maintain concentrations of dust particulates below the OEL, suitable respiratory protection must be worn.
Ventilation: Ventilation should be sufficient to remove and prevent buildup of dusts or fumes that may be generated during handling or thermal processing.
Administrative Controls: Not Applicable
Respiratory Protection: If engineering measures are not sufficient to maintain concentrations of dust particulates below the OEL, suitable respiratory protection must be worn. Respirator type: High-efficiency particulate respirator with full facepiece.
Protective Clothing/Equipment: Use tight fitting goggles if dust is generated. Wear appropriate clothing to prevent repeated or prolonged skin contact.
Safety Stations: Eye wash and safety equipment should be readily available

Contaminated Equipment: Not Applicable

Comments: 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.

Section 9 - Physical and Chemical Properties

Physical State: Solid

Appearance and Odor: Tan or Grey to white, odorless

Odor Threshold: Not Applicable

Vapor Pressure: Not Applicable

Vapor Density (Air=1): Not Applicable

Formula Weight: Not Applicable

Density: Not Applicable

Specific Gravity (H₂O=1, at 4 °C): 2.1

pH: Not Applicable

Water Solubility: Negligible

Other Solubilities: Not Applicable

Boiling Point: Not Applicable

Freezing/Melting Point: Not Applicable

Viscosity: Not Applicable

Refractive Index: Not Applicable

Surface Tension: Not Applicable

% Volatile: Not Applicable

Evaporation Rate: Not Applicable

Section 10 - Stability and Reactivity

Stability: Stable under normal temperature conditions.

Polymerization: Hazardous polymerization does not occur.

Chemical Incompatibilities: Strong oxidizing agents. Chlorinated compounds. Ethylene Oxide.

Conditions to Avoid: Excessive heat.

Materials to Avoid: Strong oxidizing agents. Chlorinated compounds, Ethylene Oxide.

Hazardous Decomposition Products: None known.

Section 11- Toxicological Information

Toxicity Data:

Eye Effects: Eye irritation.

Skin Effects: Skin irritation.

Acute Inhalation Effects: Irritation to the respiratory system.

Acute Oral Effects: Not Applicable

Chronic Effects: Frequent inhalation of dust over a long period of time increases the risk of developing diseases. May cause lung damage.

Carcinogenicity: This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.

Mutagenicity: No data available to indicate product or any components present at greater than 0.1% are mutagenic or genotoxic.

Teratogenicity: No data available to indicate product or any components present at greater than 0.1% may cause birth defects.

Section 12 - Ecological Information

Ecotoxicity: The product components are not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

Environmental Fate: An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.

Environmental Degradation: Not Applicable

Soil Absorption/Mobility: Not Applicable

Section 13 - Disposal Considerations

Disposal: Dispose of contents/container in accordance with local/regional/national/international regulations. Incinerate the material under controlled conditions in an approved incinerator.

Disposal Regulatory Requirements: Material does not have an EPA Waste number and is not a listed waste; however, consultation with a permitted waste disposal site (TSD) should be accomplished. ALWAYS CONTACT A PERMITTED WASTE DISPOSER (TSD) TO ASSURE COMPLIANCE WITH ALL CURRENT LOCAL, STATE, AND FEDERAL REGULATIONS

Container Cleaning and Disposal: Offer rinsed packaging material to local recycling facilities. Since emptied containers retain product residue, follow label warnings even after container is emptied.

Section 14 - Transport Information

DOT Transportation Data (49 CFR 172.101):

Shipping Name: Non-regulated	Packaging Authorizations	Quantity Limitations
Shipping Symbols: Not Applicable	a) Exceptions: Not Applicable	a) Passenger, Aircraft, or Railcar: Not Applicable
Hazard Class: Not Applicable	b) Non-bulk Packaging: Not Applicable	b) Cargo Aircraft Only: Not Applicable
ID No.: None	c) Bulk Packaging: Not Applicable	Vessel Stowage Requirements
Packing Group: Not Applicable		a) Vessel Stowage: Not Applicable
Label: Not Applicable		b) Other: Not Applicable
Special Provisions (172.102): Not Applicable		

Section 15 - Regulatory Information

EPA Regulations: Not Applicable

OSHA Regulations: This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

CERCLA (Superfund) Reportable Quantity: None

SARA Hazard Categories: Immediate Hazard - Yes
 Delayed Hazard - Yes
 Fire Hazard - No
 Pressure Hazard - No
 Reactivity Hazard - No
 Section 311 Hazardous Chemical - Yes

Safe Drinking Water Act (SDWA): Contaminate candidate list.

State Regulations: This product does not contain a chemical known to the State of California to cause cancer, birth defects, or other reproductive harm.

US-Pennsylvania RTK – Hazardous Substances: Listed substance
 Silicic Acid Aluminum Calcium Sodium Salt Listed.
 (CAS 1344-01-0)

TSCA Inventory: All components of this product comply with the inventory requirements administered by the governing country(s).

Section 16 - Other Information

Prepared By:

Revision Notes: Not Applicable

Additional Hazard Rating Systems: Not Applicable

Disclaimer: The information presented herein is believed to be accurate and was obtained from sources believed to be reliable. However, the information is provided without any representation or warranty, expressed or implied, with respect to its accuracy or completeness. It is the users' responsibility to determine the suitability of this product and the relevance of this information for their use.

Comments: None.