

MATERIAL SAFETY DATA SHEET

Natro-Cel 6320-A

Date Revised: November 11, 2014_____ Page 1 of 4

1. CHEMICAL PRODUCT & COMPANY IDENTIFICATION

PRODUCT NAME: Natro-Cel 6320-A HMIS 1-1-0

SYNONYMNS: Blend of adipate polyester and silica

Issue Date: November 11, 2014

Manufactured by: NATROCHEM, INC.

P.O. Box 1205

Savannah, GA 31402-1205

For Product Information (8 a.m. to 4 p.m. Eastern time) telephone: 1-912-236-4464

Transportation Emergencies:

CHEMTREC (U.S.A.): (800) 424-9300 (24 hours)

CHEMTREC (International): (202) 483-7616 (24 hours, call collect)

2. COMPOSITION AND INFORMATION ON INGREDIENTS

<u>COMPONENT NAME</u> <u>CAS#</u> <u>PERCENT</u>

Hexanedioic acid polymer with 1,4-butanediol and 1,2-propane

 diol, 2EH ester.
 68332-61-6
 72

 Silicon Dioxide
 112926-00-8
 28

(Contains no detectable crystalline silica; detection limit <0.01% by weight).

3. HAZARDS IDENTIFICATION

HMIS 1-1-0

EMERGENCY OVERVIEW: CAUTION! Dust may be irritating to eyes and upper respiratory tract. Prolonged or repeated skin contact may cause irritation due to drying action.

Precautions: Avoid contact with eyes. Avoid prolonged or repeated contact with skin. Avoid prolonged, repeated or excessive inhalation. Use only with adequate ventilation. Ventilation must be sufficient to limit employee exposure to this product below permissible exposure limits. Wear respiratory protection when dust exposure is above permissible exposure limits. Wash thoroughly every day after work. Do not eat, drink or smoke in work area.

The main component of this product (adipate polyester) has an OSHA status of: Nonhazardous.

4. FIRST AID MEASURES

INHALATION: Remove from area to fresh air. Get medical attention if respiratory irritation develops or if breathing becomes difficult. If symptomatic, contact a poison control center, emergency room or physician for treatment information.

EYE CONTACT: Remove contact lens and pour a gentle stream of warm water through the affected eye for at least 15 minutes. If irritation persists, contact a poison control center, emergency room or physician as further treatment may be necessary.

SKIN CONTACT: Run a gentle stream of water over the affected area for 15 minutes. A mild soap may be used if available. If any symptoms persist, contact a poison control center, emergency room or physician as further treatment may be necessary.

INGESTION: Gently wipe or rinse the inside of the mouth with water. Sips of water can be given. Never give anything by mouth to an unconscious person. Contact a poison control center, emergency room or physician for treatment information.

5. FIRE FIGHTING MEASURES

FLASH POINT: 249°C (480°F) closed cup

EXTINGUISHING MEDIA: water spray, dry chemical, foam or carbon dioxide.

SPECIAL FIREFIGHTING PROCEDURES: Wear self-contained breathing apparatus and protective clothing. Use water spray to cool any containers exposed to fire.

6. ACCIDENTAL RELEASE MEASURES

Remove ignition sources. Wear appropriate protective clothing. Sweep up spilled material being careful to minimize dust generation. Place in a closed bag for disposal. Prevent run-off from entering drains, sewers or streams.

7. HANDLING AND STORAGE

Handle in accordance with good industrial hygiene and safety practices. Avoid unnecessary exposure. Keep away from sources of ignition. Store in a dry area. When transferring material use proper grounding to avoid electrical sparks. Product surface alterations caused by calcining or mixing with additives may alter toxicological properties.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Exposure Limits: 8-hour Time Weighted Average (TWA); 15-minute Short-Term Exposure Limit (STEL)

OSHA: 6 mg/m³ (total dust) TWA.

ACGIH: 10 mg/m³ (total amorphous dust) TWA. 3 mg/m³ (respirable nuisance particulate) TWA.

RESPIRATORY PROTECTION: Use NIOSH approve dust filter respirator for exposure above permissible exposure limits. The respiratory use limitations made by NIOSH or the manufacturer must be observed.

VENTILATION: Use general or local exhaust sufficient to maintain employee exposure below permissible exposure limits. If engineering controls do not maintain airborne concentrations below recommended exposure limits, an approved respirator must be worn.

EYE AND FACE PROTECTION: If eye exposure to powder is likely, use tight fitting protective goggles.

PROTECTIVE GLOVES: Cloth, leather or rubber.

OTHER PROTECTIVE EQUIPMENT: Boots, aprons, or chemical suits should be used when necessary to prevent skin contact. Eyewash station and safety shower are recommended. Wash thoroughly after handling product. Wash contaminated clothing before reuse.

9. PHYSICAL AND CHEMICAL PROPERTIES

BOILING POINT: NA

SPECIFIC GRAVITY (Water = 1): NDA SOLUBILITY (wt.% in water): Insoluble

VAPOR PRESSURE: 0.001 PHYSICAL STATE: powder

COLOR: off-white

VAPOR DENSITY (Air=1): NDA FREEZING/MELTING POINT: NA

% VOLATILE: NDA

EVAPORATION RATE: NDA ODOR: slight organic; mild ester

10. STABILITY AND REACTIVITY

STABILITY: Stable

HAZARDOUS POLYMERIZATION: Will not occur.

INCOMPATIBILITY: Keep away from heat and flames. Avoid calcining temperatures (>800°C) which may result in crystalline formation. Avoid mixing with additives. Avoid alteration of product properties which may alter toxicological properties.

HAZARDOUS THERMAL DECOMPOSITION/COMBUSTION PRODUCTS: None known.

11. TOXICOLOGICAL INFORMATION

SKIN IRRITATION: Mildly irritating. EYE IRRITATION: Mildly irritating.

CARCINOGENICITY: This product is not listed as a carcinogen or suspected carcinogen by NTP, IARC, ACGIH,

or OSHA.

EFFECTS OF OVEREXPOSURE:

ACUTE: May cause eye and skin irritation. Mist, vapors or dust from hot processign may cause eye and skin irritation, nausea and vomiting. May be harmful if swallowed. Handle in accordance with good industrial hygiene and safety practices.

Excessive contact with powder can cause drying of mucous membranes of nose, eyes, and throat due to absorption of moisture and oils. This material can also cause nasal irritation and nosebleeds. Eye contact with powder can result in mild irritation.

CHRONIC: None know for the main component, adipate polyester. For the silica, an epidemiological study was conducted which included 165 precipitated silica workers who had been exposed an average time span of 8.6 years. Of these 165 workers, 44 had bee exposed for an average of 18 years. No adverse effects were noted in complete medical examinations (including chest roentgenograms) of these workers. Pulmonary function decrements were correlated only with smoking and age but not with the degree of duration of dust exposures. Laboratory studies have also been conducted in small animals via inhalation to levels of precipitated silica dust of up to 126 mg/m³ per periods from six months to two years. Although precipitated silica was temporarily deposited in the animals' lungs, most of the deposited material was cleared soon after the dust exposure ended. The results of the studies performed by, or known to, PPG indicate a very low order of pulmonary activity for synthetic precipitated silica. PPG recommends that persons with breathing problems or lung disease should not work in dusty areas unless a physician approves and certifies their fitness to wear respiratory protection.

IARC reviewed the data on amorphous silica in 1996 and concluded there was inadequate evidence from both epidemiology and experimental studies that amorphous silica is a carcinogenic risk factor. The organization concluded that amorphous silica is in Group 3.

12. ECOLOGICAL INFORMATION

ECOTOXICOLOGICAL INFORMATION: The main ingredient of the product, glycol adipate, has not been tested for environmental effects. Do not allow product to reach ground water, water course or sewage systems. For the silica:

EC₀: >1000 ppm (daphnia magna) (24-hour acute immobilization test) Silica: Slight to very low toxicity.

EC₀: >10,000 ppm (rainbow trout) (4-day static study) Silica: Slight to very low toxicity.

EC₀: >10,000 ppm (freshwater fish (96-hour static acute toxicity study) Silica: Slight to very low toxicity.

ENVIRONMENTAL FATE:

No data at this time.

13. DISPOSAL CONSIDERATIONS

DISPOSAL METHOD: Waste from this product may be disposed of in a sanitary landfill if state and local regulations permit. Care should be taken to avoid creation of dust during disposal operations.

14. TRANSPORT INFORMATION

Proper Shipping Name: Not DOT regulated.

15. REGULATORY INFORMATION

The main ingredient of this product, adipate polyester, is listed on the TSCA inventory. Any impurities present are exempt from listing. Synthetic amorphous silica is listed on the TSCA Inventory as its general CAS# 7631-86-9. Synthetic amorphous silica is listed on EINECS (231-545-4) as its general CAS# 7631-86-9.

SARA TITLE III: SARA (311,312) Hazard Class: Silicon Dioxide – Acute Health Hazard.

SARA (313): Not listed.

SARA Section 302: Not listed as an Extremely Hazardous Substance.

CERCLA: Not listed.

16. OTHER INFORMATION

Revision Date: original issue November 11, 2014 Prepared by: Craig Moore

NA = Not applicable ND = Not determined NDA = No Data Available NE = Not established

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