

MATERIAL SAFETY DATA SHEET



2621 7th Ave. South
Estherville, Iowa 51334
PH: (712) 362-7737

PRODUCT NAME: ALUMINUM BRIGHTENER

MSDS NO: 51900.03

PAGE 1 OF 2

FOR CHEMICAL EMERGENCY, SPILL, LEAK, FIRE, EXPOSURE CALL: CHEMTREC 1-800-424-9300 OUTSIDE US CALL 1-703-527-3887	FOR MEDICAL EMERGENCY CALL ROCKY MOUNTAIN POISON CENTER: 1-303-623-5716	HEALTH HAZARD: (0 None > 4 Extreme) Health =3 Flammability =0 Reactivity =2
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SECTION 1 – PRODUCT IDENTIFICATION

DATE PREPARED: December 1, 2008

SUPERSEDES: September 05, 2000

PREPARED BY: Dean F. Fernholz

D.O.T. SHIPPING CLASS: Corrosive liquids, Toxic, n.o.s., Class 8, UN2922, PG II, (Contains Sulfuric Acid, Ammonium Hydrogen Fluoride, solution). Class 55

SECTION 2 – HAZARDOUS INGREDIENTS

HAZARDOUS COMPONENTS	CAS. NO.	OSHA PEL	ACGIH TLV	ORAL LD50 RAT	Per-Cent
Ammonium Bifluoride	1341-49-7	NE	NE	NE	5-10%
Sulfuric Acid **	7664-93-9	1 mg/m3 TWA	1 mg/m3 TWA	2140 mg/Kg	15-40%
Quaternary Ammonium Chloride	68187-69-9	NE	NE	NE	1-5%

** subject to reporting requirements 40CFR355, SARA section 302; 40CFR372, SARA section 313; CERCLA 40CFR302

SECTION 3 – PHYSICAL & CHEMICAL CHARACTERISTICS

BOILING POINT: 212 °F

SOLUBILITY IN WATER: Soluble

SPECIFIC GRAVITY: 1.14

VAPOR PRESSURE mm/hg: 23 @ 70 °F

VAPOR DENSITY (Air=1): 1.2

REACTIVITY IN WATER: Strong Acid

pH 5% SOLUTION = 1

MELTING POINT: 10 °F

APPEARANCE AND ODOR: Light tan liquid, strong acid odor

SECTION 4 – FIRE & EXPLOSION DATA

FLASH POINT: NA

FLAMMABILITY LIMITS IN AIR % BY VOLUME:

METHOD USED: NA

LEL LOWER: NA

UEL UPPER: NA

AUTO-IGNITION TEMPERATURE: NA

EXTINGUISHER MEDIA: Water, Alcohol, Carbon Dioxide, Foam, Dry Chemical

SPECIAL FIRE FIGHTING PROCEDURES: Avoid contact with Aluminum Brightener, prevent damage to containers.

UNUSUAL FIRE & EXPLOSION HAZARDS: Avoid contact with alkaline chemicals.

SECTION 5 – PHYSICAL HAZARDS (REACTIVITY DATA)

STABILITY: Stable

INCOMPATIBILITY (MATERIALS TO AVOID): Alkaline Chemicals, Oxidizers

HAZARDOUS DECOMPOSITION PRODUCTS: NA

HAZARDOUS POLYMERIZATION: Will NOT occur

CONDITIONS TO AVOID: NA

SECTION 6 – HEALTH HAZARDS

ACUTE: Eye or skin burns

CHRONIC: None Known

SIGNS & SYMPTOMS OF EXPOSURE: Eye or skin burns

MEDICAL CONDITIONS GENERALLY AGGRAVATED BY EXPOSURE: None Known

CARCINOGEN OR POTENTIAL CARCINOGENS: OSHA: None NTP: None IARC: None ACGIH: None

EMERGENCY FIRST AID:

EYES: Flush immediately with water for at least 15 minutes. Forcibly hold eyelids apart to ensure complete irrigation of eye/lid tissue.

Get immediate medical attention. **DO NOT USE ZEPHIRAN CHLORIDE SOLUTION ON EYES!**

SKIN: In case of contact, immediately flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. If skin becomes irritated, immerse and soak the affected area, for at least 30 minutes, in one of the following: Iced 0.13% aqueous Zephiran Chloride solution, iced 70% Alcohol solution, or ice-cold saturated solution of Magnesium Sulfate. **DO NOT USE ZEPHIRAN CHLORIDE SOLUTION ON EYES.**

INHALATION: Remove to fresh air. If breathing is difficult contact a physician immediately!

INGESTION: Call a physician immediately. If swallowed, do NOT induce vomiting. If conscious, give water, milk or milk of magnesia.

ROUTES OF ENTRY:

INHALATION: Avoid contact with mist.

EYES: Mist will cause eye irritation or burns.

SKIN: Mist will cause skin irritation.

INGESTION: NA

SECTION 7 – SPECIAL PRECAUTIONS & SPILL / LEAK PROCEDURES

HANDLING & STORAGE: Store in a cool dry area. Keep closed when not in use.

OTHER PRECAUTIONS: Always add acid to water and never the reverse.

IN CASE OF SPILL: Neutralize with baking soda, soda ash, lime or limestone.

WASTE DISPOSAL: Dispose of in accordance with all Federal, State and Local pollution control regulations.

SECTION 8 – SPECIAL PROTECTION INFORMATION

RESPIRATORY PROTECTION: Respirator for acid mists.

VENTILATION: Use with adequate ventilation.

PROTECTIVE GLOVES: Rubber or solvent resistant

EYE PROTECTION: Goggles/Face Shield

OTHER: When handling, wear chemical splash goggles, face shield, rubber gloves and protective clothing.

HYGIENIC PRACTICES: Wash thoroughly after handling.

SECTION 9 – COMMUNITY RIGHT TO KNOW LIST

	<u>CHEMICAL NAME:</u>	<u>C.A.S. NO.</u>
1.	Water	7732-18-5
2.	Sulfuric Acid	7664-93-9
3.	Ammonium Bifluoride	1341-49-7
4.	Quaternary Ammonium Chloride	68187-69-9

NA = Not Applicable

NE = None Established

The information provided in this Material Safety Data Sheet has been compiled from our experience and data presented in various technical publications. It is the users responsibility to determine the suitability of this information for the adoption of safety precautions as may be necessary. We reserve the right to revise Material Safety Data Sheets from time to time as new technical information becomes available. The information herein is furnished without warranty of any kind.