



ALDON CORPORATION

MATERIAL SAFETY DATA SHEET

1533 W. Henrietta Rd.
Avon, New York 14414
(716) 226-6177

MSDS No. TT 285
Effective Date May 24, 1999

SECTION V HEALTH HAZARD DATA

TT 285

Threshold Limited Value None established (ACGIH 1992-93).
Toxicity data: Oral-rat LD50: 5900 mg/kg.

Effects of Overexposure **TARGET ORGANS AFFECTED:** Liver, kidneys.
SKIN: Prolonged contact with skin may cause irritation or allergic reaction. **EYES:** Causes irritation. **INHALATION:** May cause irritation of the mucous membranes and upper respiratory tract. **INGESTION:** Causes gastrointestinal irritation, nausea, vomiting, diarrhea.

Emergency and First Aid Procedures **SKIN:** Flush thoroughly with water, then wash with mild soap and water. **EYES:** Flush thoroughly with water for 15 minutes, lifting lower and upper eyelids occasionally. If irritation develops or persists, get medical attention. **INHALATION:** Remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. **INGESTION:** If swallowed, rinse mouth with water. Call physician immediately. Never give anything by mouth to an unconscious person.

SECTION VI REACTIVITY DATA

Stability	Unstable		Conditions to Avoid	Excessive temperature, heat or flame. Protect from moisture.
	Stable	X		

Incompatibility (Materials to Avoid) Strong oxidizing materials, bases, acids, aldehydes, copper, brass and aluminum.

Hazardous Decomposition Products When heated to decomposition, emits toxic fumes of nitrogen oxides, carbon dioxide and carbon monoxide.

Hazardous Polymerization	May Occur	Will Not Occur	Conditions to Avoid	Not applicable.

SECTION VII SPILL OR LEAK PROCEDURES

Steps to be taken in case material is released or spilled Wear protective safety equipment. Use adequate ventilation. Sweep up and place in a suitable container for proper disposal. Wash spill area with soap and water.

Waste Disposal Method Discharge, treatment, or disposal may be subject to Federal, State or Local laws. These disposal guidelines are intended for the disposal of catalog-size quantities only.
Dispose of in an approved chemical landfill or contract with a licensed waste disposal service.

SECTION VIII SPECIAL PROTECTION INFORMATION

Respiration Protection (Specify Type) None needed in normal laboratory handling. If dusty conditions prevail, work in ventilation hood or wear a NIOSH/MSHA-approved dust mask or respirator.

Ventilation	Local Exhaust	Recommended.	Special	No.
	Mechanical (General)	Recommended.	Other	No.

Protective Gloves Rubber. **Eye Protection** Chemical safety glasses.

Other Protective Equipment Lab coat, apron, eye wash station, proper gloves.

SECTION IX SPECIAL PRECAUTIONS

Precautions to be Taken in Handling & Storing Store in a cool dry area, preferably at 15-35°C. Wash thoroughly after handling.
Keep container tightly closed when not in use.

Other Precautions Read label on container before using. Do not wear contact lenses when working with chemicals.

Avoid prolonged or repeated contact. Use adequate ventilation. Remove and wash contaminated clothing.

For laboratory use only. Not for drug, food or household use. Keep out of reach of children.

Revision No. 2	Date 5/24/99	Approved Michael Raszeja	Chemical Safety Coordinator MR
-----------------------	---------------------	---------------------------------	---------------------------------------

The information contained herein is furnished without warranty of any kind. Employers should use this information only as a supplement to other information gathered by them and must make independent determinations of suitability and completeness of information from all sources to assure proper use of these materials and the safety and health of employees. * Hazardous Materials Industrial Standards. Printed on recycled paper.

SECTION I NAME 24 HOUR EMERGENCY ASSISTANCE

Product	TRIS TROMETHAMINE	 <p>CHEMTREC 800-424-9300 Day 716-226-6177</p> <p>NFPA HAZARD RATING</p> <table border="1"> <tr> <td>LEAST</td> <td>SLIGHT</td> <td>MODERATE</td> <td>HIGH</td> <td>EXTREME</td> </tr> <tr> <td>0</td> <td>1</td> <td>2</td> <td>3</td> <td>4</td> </tr> </table> <p>HMIS *</p> <table border="1"> <tr> <td>Health</td> <td>2</td> </tr> <tr> <td>Fire</td> <td>1</td> </tr> <tr> <td>Reactivity</td> <td>0</td> </tr> </table>	LEAST	SLIGHT	MODERATE	HIGH	EXTREME	0	1	2	3	4	Health	2	Fire	1	Reactivity	0
LEAST	SLIGHT		MODERATE	HIGH	EXTREME													
0	1		2	3	4													
Health	2																	
Fire	1																	
Reactivity	0																	
Chemical Synonyms	2-amino-2-hydroxymethyl, Tris (Hydroxymethyl) Aminomethane, 1,3 Propanediol																	
Formula	C ₄ H ₁₁ NO ₃																	
Unit Size	up to 2.5 kg.																	
C.A.S. No.	77-86-1																	

SECTION II INGREDIENTS OF MIXTURES

Principal Component(s)	%	TLV Units
Tris Tromethamine	>99.9%	None established.

CAUTION! CAUSES IRRITATION TO

SKIN, EYES AND MUCOUS MEMBRANES.

SECTION III PHYSICAL DATA

Melting Point (°F)	167°-170°C (333°-338°F)	Specific Gravity (H₂O = 1)	Not applicable.
Boiling Point (°F)	219°C (426.2°F)	Percent Volatile by Volume (%)	Non-volatile.
Vapor Pressure (mm Hg)	Not applicable.	Evaporation Rate (=1)	Not applicable.
Vapor Density (Air=1)	Not applicable.		
Solubility in Water	Complete.		
Appearance & Odor	White crystalline powder; no odor.		

SECTION IV FIRE AND EXPLOSION HAZARD DATA

Flash Point (Method Used)	N/A	Flammable Limits in Air % by Volume	N/A	Lower	Upper
				-----	-----

Extinguisher Media Use any media suitable for extinguishing supporting fire.

SPECIAL FIREFIGHTING PROCEDURES

In fire conditions wear full protective clothing and appropriate NIOSH/MSHA approved self-contained breathing apparatus.

UNUSUAL FIRE AND EXPLOSION HAZARDS

Fire or excessive heat may produce hazardous decomposition products of oxides of Nitrogen. Can react with strong oxidizing materials.

D.O.T. NON-REGULATED.

Approved by U.S. Department of Labor "essentially similar" to form OSHA-20