MATERIAL SAFETY DATA SHEET

SECTION 1 - IDENTIT		Draduct Name	DRAM	
Manufactured by: PuroChem Inc.		Product Name SYNONYMS		
1203 Ambassador Blvd.	CHEMICAL	FAMILY: INORGA		
St. Louis, MO 63132	CHEMICAL	FAMILT. INORGA	ANIC ACI	U GLEANER
PHONE: (314) 872-9333	EMER	GENCY TELEPH	ONE: (80	00) 535-5053
HMIS RATING: HEALTH	: 3	REACTIVITY:	2	
FIRE:	0	SPECIAL:	С	
SECTION	II - PRODUCT	COMPOSITION		
- INGREDIENT	%	CAS #		TLV
SULFURIC ACID	93.2%	7664-9	3-9	1mg/m ³
WATER, DYE	BALANC	E		
* This product is subject to SAR/	A Title III Repo	orting		
DOT SHIPPING DESCRIPTION		Sulfuric ac	id. 8. UN	1830, PG II
		gredients Are Liste		
SECTION	N III - PHYSICA	L PROPERTIES		
BOILING RANGE:				550'F
SPECIFIC GRAVITY (H ₂ O=1):				1.84
VAPOR PRESSURE (mm of Hg)			1.0 @ 300F
VAPOR DENSITY (AIR = 1):				NONE
SOLUBILITY IN H ₂ O:			1	COMPLETE
EVAPORATION RATE (=1):				SLOW
% VOLATILE:				(
REACTIVITY IN WATER:	Mixes vio	Mixes violently with water with generation of hea		
PH(CONCENTRATE):		RED TO AMBER LIQUID WITH NO ODOR		
APPEARANCE AND ODOR:				I NO ODOF
	V - FIRE AND P	EXPLOSION DATA	d	
SECTION IN				
FLAMMABILITY LIMITS (% IN A	and a second		LEL N	I/A UEL N/A
FLAMMABILITY LIMITS (% IN A FLASH POINT (c.c.):	IR):			IONE (TCC
FLAMMABILITY LIMITS (% IN A FLASH POINT (c.c.): FLAMMABILITY CLASSIFICATIO	IR): ON:		N	IONE (TCC N/A
FLAMMABILITY LIMITS (% IN A FLASH POINT (c.c.):	IR): ON: IING MEDIA:		None	IONE (TCC N/A combustible

SECTION V - HEALTH INFORMATION

THRESHOLD LIMIT VALUE (PPM): 0.2 (MIST ONLY) OSHA PEL: 1mg/m³ ACUTE EFFECTS OF OVEREXPOSURE: Corrosive to skin and eyes on contact. Eye contact can produce corneal damage or blindness. Skin contact can produce inflammation, reddening, and blistering. Inhalation of spray mist or vapors may produce irritation, burning, or destruction of tissues in the respiratory tract, characterized by coughing choking, pain, or shortness of breath. Severe overexposure may lead to fatal lung damage. Ingestion can cause abdominal pain, nausea, vomiting, and collapse, along with tissue destruction in the gastrointestinal tract.

CHRONIC EFFECTS OF OVEREXPOSURE: Untreated or prolonged contact with spray mist may produce chronic eye irritation and severe skin irritation. Repeated or prolonged exposure to spray mist may produce respiratory tract irritation leading to frequent attacks of bronchial infection. None of the hazardous ingredients are listed as carcinogens by IARC, NTP, & OSHA.

EMERGENCY FIRST AID PROCEDURES:	
EYE CONTACT: Flush eyes with cool running water for 30 minutes occasion	ally
lifting upper and lower lids. Get IMMEDIATE MEDICAL ATTENTION	
SKIN CONTACT: Remove contaminated clothing and shoes. Wash exposed an	eas
thoroughly with soap and water. Get medical attention.	
INHALATION: Remove to fresh air. If breathing has stopped give artif respiration. Get IMMEDIATE MEDICAL ATTENTION	icial
INGESTION: DO NOT INDUCE VOMITING. If victim is conscious give plent water to drink. Get IMMEDIATE MEDICAL ATTENTION	y of
Route(s) of Entry: Inhalation? X Skin? X Ingestion? X	
Health Hazards	
1.) Acute - Causes chemical burns	
2.) Chronic - Information on chronic health hazard not currently available.	
Chemical Listed as Carcinogen or Potential Carcinogen:	
National Toxicology Program: YES X NO	
I.A.R.C. Monographs: YES X NO	
OSHA:YES X NO	
Signs and Symptoms of Exposure: Irritation, burning of skin, mucous membra	nes

and respiratory system.

STABILITY:	Stable
CONDITIONS TO AVOID:	Extreme heat
INCOMPATIBILITY (AVOID): Strong	g alkalis, oxidizers, and active metals.
HAZARDOUS DECOMPOSITION: HYDRO	GEN GAS FROM REACTION WITH
STEEL OR ACTIVE METALS: SULFUR DIO	KIDE AND SULFUR TRIOXIDE.
HAZARDOUS POLYMERIZATION:	Will not occur

SECTION VII - SPILL OR LEAK PROCEDURES

PROCEDURES IF MATERIAL IS SPILLED OR RELEASED: Observe safety precautions in section 9 & 10 during clean-up. Use protective equipment to avoid contact with skin or eyes. Absorb spill on an inert absorbent material; pick up and place in a clean D.O.T. specification container for disposal. Wash area thoroughly with a detergent solution and then rinse well with water

WASTE DISPOSAL PROCEDURES: Dispose of in accordance with existing local, state or Federal regulations

SECTION VIII - SPECIAL PROTECTION INFORMATION

RESPIRATORY PROTECTION: If ventilation is inadequate, wear a properly fitting MSHA or OHSA-approved respirator.

VENTILATION: If vapors are detected, ventilate work area by opening windows and using exhaust fans.

PROTECTIVE CLOTHING: Wear rubber or neoprene gloves and a face shield when using. A rubber apron and boots are strongly recommended.

EYE PROTECTION: Wear splash-proof safety goggles especially if contact lenses are worn.

SECTION IX - ADDITIONAL PRECAUTIONS

PRECAUTIONS IN HANDLING AND STORAGE AND OTHER PRECAUTIONS: Store tightly closed container in a dry area at temps. between 40-120 degrees F. Store away from highly alkaline products and oxidizing compounds. Keep product away from skin and eyes. Do not breathe spray mists or vapors. Keep away from food and food products. Clothing or shoes which become contaminated with substance should be removed promptly and not reworn until thoroughly cleaned. KEEP OUT OF REACH OF CHILDREN.

** ADDITIONAL INFORMATION **

This information is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for particular purposes.

> Prepared by: TECHNICAL DEPARTMENT Revised: 01/31/03