

# MATERIAL SAFETY DATA SHEET

(Prepared According to 29 CFR 1910.1200)

Date Prepared: 7-13-2007

Code: 9210

## SECTION 1 - PRODUCT IDENTIFICATION

Distributor: <b>Nuance Solutions</b>	Emergency Phone: 1-800-621-8553
Address: 900 East 103rd Street, Chicago, IL 60628	Prepared By:
Trade Name: <b>COLD CLEAN PLUS</b>	Product Type: Low Temp. Freezer Cleaner

## SECTION 2 - INGREDIENTS

CHEMICAL NAME/COMMON NAME	CAS NO.	PERCENT(optional)	TLV(Source)
Ethylene Glycol (Section 313)	107-21-1	55-65%	50ppm / 125mg/M3
Tetrasodium E.D.T.A.	64-02-8	<5%	None Established
Ethanolamine	141-43-5	<5%	3ppm (TWA) ; 6ppm (STEL)

SARA HAZARD: TITLE III, SECTION 313: Contains ethylene glycol at 55-65%.

## SECTION 3 - PHYSICAL DATA

Boiling point (°F.): 212 (IBP)	Specific Gravity (H2O=1.0): 1.1 ± 0.005	pH: 11.9	± 0.5
Vapor Pressure (mm Hg): Not Determined	Vapor Density (Air=1): Not Determined		
Solubility in water: <input checked="" type="checkbox"/> Complete <input type="checkbox"/> Insoluble <input type="checkbox"/> Emulsifiable (or Dispersible) <input type="checkbox"/> Slight (or Partial)			
Evaporation Rate (vs. H2O): <input type="checkbox"/> <input checked="" type="checkbox"/> Slower <input type="checkbox"/> About the Same		Appearance and Odor: Blue-colored liquid with no distinct odor.	

## SECTION 4 - FIRE AND EXPLOSION HAZARD DATA

Flash Point (T.C.C.): °F. <input checked="" type="checkbox"/> None to Boiling	Flammable Limits: N/A Upper Lower
Extinguishing Media: Product is noncombustible. Water Spray (Fog), Dry Chemical; CO2; or Foam may be used where product is stored.	
Special Firefighting Procedures: Do not enter confined fire-spaces without protective clothing and self-contained air supply.	
Unusual Fire and Explosion Hazards: None	

## SECTION 5 - REACTIVITY DATA

Stability: Stable	Incompatibility: Strong acids/oxidizers. Do not mix with chlorinated detergents (bleach). Strong bases/alkalis.
Hazardous Decomposition Products: Burning may produce oxides of carbon and nitrogen.	

## SECTION 6 - HEALTH HAZARD DATA

Primary Routes of Exposure: <input checked="" type="checkbox"/> Eye <input type="checkbox"/> Skin <input checked="" type="checkbox"/> Oral <input type="checkbox"/> Inhalation <input type="checkbox"/> Other	
Signs and Symptoms of Overexposure (Acute): Ingestion may cause abdominal discomfort of pain, nausea, vomiting and central nervous system effects including irregular eye movement and perhaps convulsions. Ingestion of significant amount may cause cardiac failure and pulmonary edema or to be fatal. Inhalation of mists may cause similar symptoms. Contact with skin or eyes may cause transitory irritation.	
Signs and Symptoms of Overexposure (Chronic): Ingestion of large amounts of Ethylene Glycol has been shown to produce kidney damage and birth defects based on animal data.	
Medical Conditions Aggravated by Overexposure: An existing dermatitis.	
Carcinogen or Suspect Carcinogen Ingredients: <input type="checkbox"/> NTP <input type="checkbox"/> IARC <input type="checkbox"/> OSHA <input checked="" type="checkbox"/> NONE	

## SECTION 7 - EMERGENCY AND FIRST AID PROCEDURES

Eyes: Flush eyes with water for at least 15 minutes and call a physician immediately.	
Skin: Wash with large amounts of soap and water. If irritation persists, consult a physician.	
Ingestion: If conscious give 2 glasses of water and induce vomiting. Call a physician immediately. Early administration of ethanol may counter toxic effects of ethylene glycol	
Inhalation: Remove to fresh air. Start artificial respiration if necessary. Oxygen may be administered. Call a physician.	

## SECTION 8 - SPECIAL PROTECTION INFORMATION

Respiratory Protection: If TLV of component is exceeded (mists) wear a NIOSH approved face mask with organic vapor cartridge & mist prefilter. Use local ventilation if used at elevated temperatures.	
Ventilation Requirements: Normal <input type="checkbox"/> Local Exhaust <input type="checkbox"/> Mechanical <input type="checkbox"/> Other <input type="checkbox"/>	Eye Protection: Safety Glasses/Goggles
Protective Gloves: Rubber/PVC	Other Protective Clothing: Impervious protective clothing appropriate to minimize contact (ie: boots, apron, faceshield) depending on operation.

## SECTION 9 - SPILL OR LEAK PROCEDURES

Steps to be Taken if Released or Spilled: Do not touch or walk through spilled material. Stop leak if you can without risk. Dike ahead of large spills to prevent run-off. Mop, pump or take up with sand or other inert absorbent and reclaim into sound containers for reuse, recycle or disposal.	
Waste Disposal Methods: Dispose of in an approved waste facility according to Federal, State and local regulations.	

## SECTION 10 - STORAGE AND HANDLING INFORMATION

Precautions to be Taken In Handling and Storage: Do not get in eyes, on skin or clothing. Do not breathe mist from spray. Wash thoroughly after handling. Ingestion of large amounts (150 ml or greater) could be fatal.	
--	--

The health hazards given on this Material Safety Data Sheet apply to this product in its concentrated form (as supplied) and may differ significantly at use dilution. The signs and symptoms of overexposure apply only to negligence in handling or misuse of the concentrated product and not to the routine exposure of the diluted product under conditions of ordinary use.

HMIS  
HAZARD  
RATING

HEALTH	2
FLAMMABILITY	0
REACTIVITY	0
PERSONAL PROTECTION	X

0 - LEAST  
1 - SLIGHT  
2 - MODERATE  
3 - HIGH  
4 - EXTREME