

MATERIAL SAFETY DATA SHEET

Manufacturer: Metatron Mfg.Co Address: Río Rhin No. 56, Col. Cuauhtémoc, 06500, Del. Cuauhtémoc, México D.F.		Emergency Response Number: Telephone: (52) 55-30 93 99 40 E-mail: info@metatron.com.mx					
PRODUCT INFORMATION							
Chemical Family: Fluorinated Grease		Trade Name: Metatron 38 NLGI 2					
Formula: Proprietary Mixture							
HAZARDOUS INGREDIENTS							
COMPONENTS-CHEMICAL NAMES AND COMMON NAMES	CAS Number	%	Exposure Limits				
			TVL		PEL		
			Ppm	mg/m ³	ppm	mg/m ³	
Perfluoroalkylether	60164-51-4 73-82						
PTFE	9002-84-0 18-27						
HAZARDS IDENTIFICATION							
<p>Potential Health Effects Skin contact may cause skin irritation with discomfort or rash. Prolonged skin contact may cause redness and inflammation of the hair follicles without skin sensitization. Eye contact may cause eye irritation with discomfort, tearing or lurring of vision. Inhalation of fluorine compounds released as decomposition products above 290 degC (554 degF) may cause lung irritation and pulmonary edema which require medical treatment. Inhalation of fumes or smoke from overheated or burning grease may cause polymer fume fever, a temporary flu-like illness accompanied by fever, chills, and sometimes cough, of approximately 24 hours duration. Repeated episodes of polymer fume fever may cause lung damage. Carcinogenicity Information None of the components present in this material at concentrations equal to or greater than 0.1% are listed by IARC, NTP, OSHA or ACGIH as a carcinogen.</p>							
FIRST AID MEASURES							
<p>INHALATION If inhaled, remove to fresh air. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Call a physician.</p> <p>SKIN CONTACT Flush skin with water after contact. Wash contaminated clothing before reuse.</p> <p>EYE CONTACT In case of contact, immediately flush eyes with plenty of water for at least 15 minutes. Call a physician.</p> <p>INGESTION If swallowed, do not induce vomiting. Immediately give 2 glasses of water. Never give anything by mouth to an unconscious person. Call a physician. Notes to Physicians Activated charcoal mixture may be administered. To prepare activated charcoal mixture, suspend 50 grams activated charcoal in 400 mL water and mix thoroughly. Administer 5 mL/kg, or 350 mL for an average adult.</p>							
FIRE FIGHTING MEASURES							
<p>Flammable Properties Flash Point : Does not ignite Method : PMCC Noncombustible. Extinguishing Media Use media appropriate for surrounding material. Fire Fighting Instructions Wear self-contained breathing apparatus. Wear full protective equipment. Decomposition at flame temperatures may form toxic fluorine compounds. Avoid breathing decomposition products.</p>							
ACCIDENTAL RELEASE MEASURES							
<p>Safeguards (Personnel) NOTE: Review FIRE FIGHTING MEASURES and HANDLING (PERSONNEL) sections before proceeding with clean-up. Use appropriate PERSONAL PROTECTIVE EQUIPMENT during clean-up. Accidental Release Measures Place in container for disposal. Remove source of heat and flame.</p>							
HANDLING AND STORAGE							
<p>Handling (Personnel) Avoid contact with eyes. Avoid contact with skin. Wash thoroughly after handling. Do not store or consume food, drink or tobacco in areas where they may become contaminated with this material. Storage Keep container tightly closed. Do not store or consume food, drink or tobacco in areas where they may become contaminated with this material. Keep away from heat and flames to avoid decomposition products.</p>							

EXPOSURE CONTROLS/PERSONAL PROTECTION

Engineering Controls

Keep container tightly closed.

Keep away from heat and flames.

Personal Protective Equipment

EYE/FACE PROTECTION

Wear safety glasses or coverall chemical splash goggles.

RESPIRATOR

Where the potential exists for exposure to decomposition products due to heating or elevated temperatures, wear

NIOSH approved respiratory protection as appropriate.

PROTECTIVE CLOTHING

Where there is potential for skin contact have available and wear as appropriate, impervious gloves, apron, pants, and jacket.

Exposure Guidelines

Applicable Exposure Limits

PTFE

PEL (OSHA) : None Established

TLV (ACGIH) : None Established

AEL * (Metatron Mfg.) : 10 mg/m³, 8 Hr. TWA, total dust

5 mg/m³, 8 Hr. TWA, respirable dust

* AEL is Metatron Mfg.'s Acceptable Exposure Limit. Where governmentally imposed occupational exposure limits which are lower than the AEL are in effect, such limits shall take precedence.

PHYSICAL AND CHEMICAL PROPERTIES

Physical Data

Melting Point : 320 C (608 F)

Solubility in Water : Negligible

pH : Neutral

Odor : Odorless

Form : Solid, waxy grease

Color : White

Specific Gravity : 1.89-1.93 @ 24 deg C (75 deg F)

STABILITY AND REACTIVITY

Chemical Stability

Stable.

Incompatibility with Other Materials

None reasonably foreseeable.

Decomposition

Heating above 260-290 degC (500-554 degF) may form potentially toxic fluorine compounds. Depolymerization may occur in the presence of some metal oxides at temperatures above 288 degC (550 degF). Decomposition occurs at increasing rates as temperature is raised above 355 degC (670 degF). Polymerization

Polymerization will not occur.

TOXICOLOGICAL INFORMATION

Animal Data

Perfluoroalkylether:

Inhalation 4 hour ALC: 19.54 mg/l in rats

Skin absorption ALD: >17,000 mg/kg in rats

Oral ALD: >25,000 mg/kg in rats

The product contains a mild eye irritant. A single inhalation exposure to perfluoroalkylether caused nonspecific effects such as respiratory irritation. Toxic effects described in animals exposed to decomposition products of perfluoroalkylether formed above 260 degC (500 degF) include lung irritation, irregular respiration, tremors and increased liver weight. Pulmonary edema and death occurred in rats exposed to the decomposition products of perfluoroalkylether formed at around 290 degC (554 degF). A single inhalation exposure to PTFE caused irritation of the lungs. A repeated ingestion exposure caused no significant toxicological effects. Long-term ingestion exposure caused altered white blood cell count.

DISPOSAL CONSIDERATIONS

Waste Disposal

Treatment, storage, transportation, and disposal must be in accordance with applicable Federal, State/Provincial, and Local regulations. Do not flush to surface water or sanitary sewer system

TRANSPORTATION INFORMATION

Shipping Information

DOT/IMO/IATA

Proper Shipping Name : Not Regulated

Shipping Containers:

2,8 oz. polyethylene tubes

1 lb. double wall jars (polypropylene inner; polystyrene outer)

5 Kgrs . polyethylene pails

10 & 20 Kgrs. high density polyethylene pails

OTHER INFORMATION

NFPA, NPCA-HMIS

NPCA-HMIS Rating

Health : 1

Flammability : 0

Reactivity : 0

Personal Protection rating to be supplied by user depending on use conditions.

The data in this Material Safety Data Sheet relates only to the specific material designated herein and does not relate to use in combination with any other material or in any process. Responsibility for MSDS : MSDS Coordinator

Address : Industrias Certanium SA DE CV.

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Col. Cuauhtémoc, 06500,

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Indicates updated section.

This information is based upon technical information believed to be reliable. It is subject to revision as additional knowledge and experience is gained.