



SAFETY DATA SHEET (SDS)

1 - IDENTIFICATION

TUBEFORM 390-TF

Chemical family: Emulsifiable Mineral Oil

Recommended use: Drawing & Forming Metalworking

Tower Metalworking Fluids

4300 South Tripp Ave.
Chicago, IL 60632

Information telephone #: (773) 927-6161 (7:30 AM to 4 PM, CST, Monday to Friday)

24 Hr. emergency telephone #: CHEMTREC: (800) 424-9300

2 - HAZARDS IDENTIFICATION

Classification of chemical:

This material is classified as hazardous under OSHA regulations (29CFR 1910.1200) (Hazcom 2012).

Signal word: WARNING

Hazard Pictogram:



Hazard statement:

H317 May cause an allergic skin reaction.

Precautionary statement:

Prevention

- P261 Avoid breathing mist/vapors/spray.
- P272 Contaminated work clothing should not be allowed out of the workplace.
- P280 Wear chemical resistant gloves, goggles and face shield.

Response

- P302 + P352 IF ON SKIN: Wash with plenty of water and mild soap.
- P333 + P313 If skin irritation or rash occurs: Get medical advice/attention.
- P362 + P364 Take off contaminated clothing and wash it before reuse.

Disposal

- P501 Dispose of contents/containers in accordance with federal, state and local regulations.

3 - COMPOSITION/ INFORMATION ON INGREDIENTS

Chemical name	CAS #	Concentration
Ingredients classified as non-hazardous under OSHA regulations (29CFR 1900-1200) (Hazcom 2012)		

4 - FIRST-AID MEASURES

Description of first aid measures:

- Inhalation: If overcome by fumes from hot product, move to fresh air. Get medical attention.
- Ingestion: Do not induce vomiting. Get medical attention.
- Skin: Wash with warm water and mild soap. Remove contaminated clothing. Launder or dry-clean soiled clothing before reuse.
- Eye: Remove contact lenses, if present and easy to do. Flush with water for 15 minutes or until irritation subsides. Get medical attention.

Symptoms and effects, both acute and delayed:

- Acute: Skin exposure may cause slight irritation to personnel with allergenic tendencies. Eye contact may result in transient corneal inflammation.
- Chronic: Prolonged or repeated skin contact may tend to remove natural oils, resulting in the development of dermatitis.

5 - FIRE-FIGHTING MEASURES

Extinguishing media:

- Suitable: Foam, carbon dioxide, dry chemicals, water fog or spray.
- Unsuitable: Do not use straight streams of water, as this will spread the fire.

Specific hazards and combustion products: Products may include and are not limited to oxides of carbon, nitrogen, sulfur, possible hydrogen chloride evolution upon combustion.

Special protective equipment and precautions for fire-fighters: If near fire, cool exposed containers with cold water to prevent rupture. If a spill has not ignited, use water spray to disperse vapors. Minimize breathing fumes. Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full protective clothing. Treat as oil fire.

6 - ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures: All persons dealing with the spill should wear appropriate personal protective equipment. Keep others away from spill. Restrict access to area until the spill has been cleaned up.

Methods and materials for containment and cleaning up: Contain spill and transfer to suitable containers or soak up in absorbent medium. If spill enters sewer, notify proper authorities.

7 - HANDLING AND STORAGE

Precautions for safe handling: Wear proper personal protective equipment. Minimize breathing hot vapors. Avoid prolonged or repeated contact with skin, eyes and clothing. Wash thoroughly before meals and at end of work periods. Launder or dry-clean soiled clothing before reuse.

Conditions for safe storage: Keep containers closed when not in use. Protect from freezing temperatures. Avoid heating above 120°F for prolonged periods of time. Do not store or handle near ignition sources or strong oxidants. Empty containers may retain product residue; all precautions apply to empty containers.

Incompatible materials: Strong oxidizing materials.

8 - EXPOSURE CONTROLS/ PERSONAL PROTECTION

Exposure limits: 5 mg/m³ as oil mist in air.

Engineering controls: Good general ventilation should be used.

Individual protection measures and personal protective equipment: Splash goggles, face shield, chemical and oil resistant gloves. Use chemical resistant apron if needed to avoid prolonged or repeated skin contact.

TLV (THRESHOLD LIMIT VALUE): 5mg/m³ as oil mist in air over an 8 hour daily exposure (ACGIH)

9 - PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Amber Liquid
Odor:	Bland Hydrocarbon
Odor threshold:	Data currently unavailable
Product pH:	9.3
Freezing point:	32°F
Boiling point:	Data currently unavailable
Flash point:	Typical 340°F (171°C)
Evaporation rate:	<0.01 (BA = 1)
Flammability:	Information not available
Upper/lower flammability limits:	LEL: 0.9% UEL: 7.0%
Vapor pressure:	<0.01 mm Hg
Vapor density:	>1 (Air = 1)
Relative density:	1.00 (Water = 1)
Solubility:	Emulsifies in water
Partition coefficient (n-octanol/water):	Information not available
Auto-ignition temperature:	Information not available
Decomposition temperature:	Information not available
Viscosity:	Information not available

10 - STABILITY AND REACTIVITY

Chemical stability: Material is stable under normal conditions.

Possibility of hazardous reactions: Hazardous polymerization will not occur.

Conditions to avoid: Avoid heat, sparks, open flames and other ignition sources.

Incompatible materials: Strong oxidizing agents.

Hazardous decomposition products: Material does not decompose at ambient temperatures. Decomposition products may include and are not limited to oxides of carbon, nitrogen, sulfur, possible hydrogen chloride evolution upon combustion.

11 - TOXICOLOGICAL INFORMATION

Information on likely routes of exposure:

Inhalation: Yes

Ingestion: Yes

Skin: Yes
Eye: Yes

Potential Symptoms of exposure:

Inhalation: May cause irritation of respiratory tract. Avoid breathing vapors or mist of this product. Prolonged inhalation may be harmful.

Ingestion: Do not ingest. Small amounts (a tablespoonful) swallowed during normal handling operations are not likely to cause injury; swallowing amounts larger than that may cause injury.

Skin: Minimally toxic under normal use. May be mildly irritating with prolonged and/or repeated skin contact.

Eye: Direct contact with eyes may cause irritation. Injuries not expected under normal use.

Toxicological data: Data not available.

NTP, IARC or OSHA carcinogen: None of the constituents of this product have been identified as possible or proven carcinogens by NTP, IARC, or OSHA.

12 - ECOLOGICAL INFORMATION

Ecotoxicity: May cause long-term adverse effects in the aquatic environment.

Persistence and degradability: Data not available.

Bioaccumulative potential: Has the potential to bioaccumulate.

Mobility in soil: Data not available.

Other adverse effects: None known.

13 - DISPOSAL CONSIDERATIONS

Waste disposal method: Dispose of in accordance with federal, state and local regulations. This product contains chlorinated paraffins which are not subject to section 313 provisions of SARA Title III.

14 - TRANSPORT INFORMATION

DOT Shipping: Not regulated by the U.S. Department of Transportation as a hazardous material.

15 - REGULATORY INFORMATION

Sara III (Superfund Amendment and Reauthorization Act of 1986) 40 CFR Part 372 and 40 CFR Part 355

Sections 302, 304 and 40 CFR Part 355 – Extremely Hazardous Substances:

Component	%	RQ (lbs.)	TPQ (lbs.)	CAS#
NONE	–	–	–	–

Sections 311, 312 and 40 CFR Part 355 – Hazard Categories:

ACCUTE(IMMEDIATE HEALTH HAZARD):	YES	FIRE HAZARD:	YES
CHRONIC (DELATED HEALTH HAZARD):	NO	REACTIVE HAZARD:	NO
SUDDEN PRESSURE RELEASE:	NO		

Sections 313 and 40 CFR Part 372 – Toxic Chemicals:

Component	%	CAS#
NONE	–	–

CERCLA (Comprehensive Environmental Response, Compensation and Liability Act)

Section 102 and 40 CFR Part 302 – Hazardous Substances:

Component	%	RQ (lbs.)	CAS#
NONE	–	–	–

CLEAN WATER ACT

Under section 311 (b) (4) of this act, contamination of surface waters by petroleum products must be reported immediately to the National Response Center. SECTION 311 (b) (4) DOES APPLY TO TUBEFORM 390-TF

California Proposition 65: None of the ingredients are listed.

TSCA (Toxic Substances Control Act): All components of this formula are listed in the TSCA inventory.

16 - OTHER INFORMATION

Preparation Date: June 01, 2015

Revision Date: June 1, 2017

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