



**Section 4 - First Aid Measures**

**Inhalation:** Remove victim to fresh air and provide oxygen if breathing is difficult. Give artificial respiration if not breathing. Get medical attention immediately.

**Eye Contact:** Immediately flush eyes with running water for at least 15 minutes. Get medical attention.

**Skin Contact:** Immediately flush skin with running water and remove contaminated clothing. Wash exposed area with soap and water. Get medical attention.

**Ingestion:** Do not induce vomiting. Get medical attention immediately.

**Note to Physicians:** This product contains several organic solvents (Toluene, Heptane, Acetone and Xylene).

**Special Precautions/Procedures:** Whenever possible, remove the worker from the source of contamination.

**Section 5 - Fire-Fighting Measures**

**Flash Point:** 40°F (4.4°C)

**Flash Point Method:** CC

**Autoignition Temperature:** 433.4°F (223°C)

**LEL:** 1.27% v/v

**UEL:** 7.10% v/v

**Flammability Classification:** Division 2

**Extinguishing Media:** In case of fire, use dry chemical, carbon dioxide, or foam. Water may not be effective as an extinguishing agent. Water fog or spray may be used to provide a smothering effect on fire and to cool fire-exposed containers and surrounding combustibles. Do not use a solid stream of water because it can scatter and spread the fire.

**Unusual Fire or Explosion Hazards:** Extremely flammable. Store and use away from all sources of heat, flame, or sparks. Do not smoke while applying. Vapors are heavier than air and may travel along ground or may be moved by ventilation and ignited by pilot lights, other flames, sparks, heaters, smoking, electrical motors, static discharge, or other ignition sources at location distant from material handling point and flashback. All containers should be grounded when material is transferred.

**Hazardous Combustion Products:** Toxic gases or vapors, such as carbon monoxide, carbon dioxide, hydrogen cyanide, or oxides of nitrogen may be released in a fire.

**Fire-Fighting Instructions:** This product contains solvents that are dangerous fire and explosion hazards when exposed to heat or flame. Fire fighters should wear self-contained breathing apparatus and full protective clothing with a full face piece operated in the positive pressure demand mode.

**Fire-Fighting Equipment:** Because fire may produce toxic thermal decomposition products, wear a self-contained breathing apparatus (SCBA) with a full face piece operated in pressure-demand or positive-pressure mode.

**Section 6 - Accidental Release Measures**

**Spill /Leak Procedures:** Remove all sources of ignition. Avoid breathing vapors. Use self-contained breathing apparatus in enclosed area. Ventilate area. Contain and remove with inert absorbent materials and non-sparking tools.

**Large Spills:**

**Containment:** For large spills, dike far ahead of liquid spill for later disposal. Do not release into sewers or waterways.

**Cleanup:** Clean-up spill as soon as possible. Collect any excess material with absorbent pads, sand or other inert non-combustible absorbent materials. Place into appropriate waste containers for later disposal. Comply with all laws and regulations.

**Regulatory Requirements:** Follow applicable OSHA regulations (29 CFR 1910.120).

**Section 7 - Handling and Storage**

**Handling Precautions:** Use away from all sources of heat, flame, or sparks. Do not smoke while using. Handling equipment must be grounded to prevent sparking. Handle with non-sparking tools. Wash with soap and water before eating or drinking. Launder contaminated clothing. KEEP OUT OF REACH OF CHILDREN.

**Storage Requirements:** Keep containers cool, dry, and store away from all sources of heat, flame, and sparks. Keep containers tightly closed and store with adequate ventilation. Do not pressurize, cut, weld, or grind the containers or empty containers which may contain residual product and solvent vapors that may ignite explosively.

**Section 8 - Exposure Controls / Personal Protection**

**Engineering Controls:** Do not use in enclosed areas without proper explosion-proof ventilation. General and local exhaust ventilation must be sufficient to control vapor concentrations and keep the PEL below 100 ppm.

**Ventilation:** Provide general or local exhaust ventilation systems to maintain airborne concentrations below OSHA PELs. Local exhaust ventilation is preferred because it prevents contaminant dispersion into the work area by controlling it at its source.

**Administrative Controls:**

**Respiratory Protection:** A NIOSH approved respirator must be used if vapor concentration is 100 ppm or above.

**Protective Clothing/Equipment:** Permeation resistant gloves (that meet ANSI/ISEA 105-2005) recommended. Glasses or goggles recommended. Industrial shoes to protect feet from adhesive contact. Long sleeves, long trousers to protect skin from adhesive contact. Protective skin creams or emollients useful.

**Safety Stations:** Make emergency eyewash stations, safety/quick-drench showers, and washing facilities available in work area.

**Contaminated Equipment:** Separate contaminated work clothes from street clothes. Launder before reuse. Remove this material from your shoes and clean personal protective equipment.

**Comments:** Never eat, drink, or smoke in work areas. Practice good personal hygiene after using this material, especially before eating, drinking, smoking, using the toilet, or applying cosmetics.

### Section 9 - Physical and Chemical Properties

**Physical State:** Liquid

**Appearance and Odor:** Thin green liquid with naphthenic odor.

**Odor Threshold:** Not available

**Vapor Pressure:** 36.7 @ 30 °C (86°F)

**Vapor Density (Air=1):** 3.1-3.2

**Specific Gravity (H<sub>2</sub>O=1, at 20°C/68°F):** 1.177

**PH:** N/A

**Water Solubility:** Insoluble

**Boiling Point (°C):** 110-115 (230-239°F)

**Freezing/Melting Point (°C):** -48 (-54.4°F)

**% Volatile:** 85-90

**Evaporation Rate(Ethyl Ether):** 4.5

**VOC:** 250 gpl max

**Flash Point:** 40°F (4.4°C)

**Flash Point Method:** CC

**Autoignition Temperature:** 433.4°F (223°C)

**LEL:** 1.27% v/v

**UEL:** 7.10% v/v

### Section 10 - Stability and Reactivity

**Stability:** Stable.

**Possibility of hazardous reactions:** Will not occur.

**Chemical Incompatibilities:** Strong oxidizing agents, acids, bases.

**Conditions to Avoid:** Heat, sparks, and flames; ignition sources.

**Hazardous Decomposition Products:** Toxic gases or vapors such as carbon monoxide, carbon dioxide, or oxides of nitrogen may be released in a fire.

### Section 11 - Toxicological Information

**Eye Effects:** Irritating

**Skin Effects:** Irritating

#### Toxicity Data:

**Acute Inhalation Effects:** Product toxicity has not been determined.

Following are the component data:

TC<sub>50</sub>:

Toluene: Rat > 26,700 ppm 1 hr; Mouse 400 ppm 24 hr

**Acute Oral Effects:** Product toxicity has not been determined.

Following are component data:

LD<sub>50</sub>:

Toluene: Rat 5000 mg/kg

**Chronic Effects:** May cause skin sensitization in some people.

**Carcinogenicity:** Not listed in IARC or NTP.

**Mutagenicity:** Some evidence in animal exposure to Toluene

**Teratogenicity:** Some evidence in animal exposure to Toluene

### Section 12 - Ecological Information

**Ecotoxicity:** Not known

**Environmental Fate:** Not known

**Environmental Degradation:** Not known

**Soil Absorption/Mobility:** Not known

### Section 13 - Disposal Considerations

**Disposal:** Dispose of in accordance with all local, state, and federal regulations.

**Section 14 - Transport Information****DOT Transportation Data (49 CFR 172.101):**

<b>Shipping Name:</b> Adhesives, 3, UN1133, II	<b>Packaging Authorizations</b>	<b>Quantity Limitations</b>
<b>Shipping Symbols:</b> Flammable	a) Exceptions: 173.150	a) Passenger, Aircraft, or Railcar: 5L
<b>Hazard Class:</b> 3	b) Non-bulk Packaging: 173.173	b) Cargo Aircraft Only: 60L
<b>ID No.:</b> UN1133	c) Bulk Packaging: 173.242	
<b>Packing Group:</b> II		<b>Vessel Stowage Requirements</b>
<b>Label:</b> red Flammable Liquid label required		a) Vessel Stowage: B
<b>Special Provisions (172.102):</b> 149, B52, IB2, T4, TP1, TP8		b) Other: ---

**Section 15 - Regulatory Information****EPA Regulations:**

RCRA Hazardous Waste Number (40 CFR 261.33): Not listed

RCRA Hazardous Waste Classification (40 CFR 261): Not classified

**TSCA (Toxic Substances Control Act) Status:**

TSCA (United States) – The intentional ingredients of this product are listed.

**CERCLA Hazardous Substance RQ – 40 CFR 302.4 (a)**

Component	RQ (lbs)
Toluene	1000

**CERCLA RQ – 40 CFR 302.4 (b)**

Materials with a "listed" RQ may be reportable as an "unlisted hazardous substance". See 40 CFR 302.5 (b).

**SARA 311/312 Codes:**

Immediate (X)    Delayed (X)    Fire (X)    Reactive ( )    Sudden Release of Pressure ( )

**SARA 313 Components (40 CFR 372.65):**

Section 313 Component(s)	CAS Number	%
Toluene	108-88-3	60 – 100

SARA EHS (Extremely Hazardous Substance) (40 CFR 355): Not listed, Threshold Planning Quantity (TPQ)

**OSHA Regulations:**

Air Contaminant (29 CFR 1910.1000, Table Z-1, Z-1-A): Not listed

OSHA Specifically Regulated Substance (29 CFR 1910): None listed

EPA Accidental Release Prevention (40 CFR 68): None listed

**State Regulations:****California Proposition 65:**

The following statement is made in order to comply with the California Safe Drinking Water and Toxic Enforcement Act of 1986: This product contains the following substance(s) known to the State of California to cause reproductive harm:

Toluene

**Delaware Air Quality Management List:**

Chemical Name	DRQ:	State?
Toluene	1000	Must be reported to the DRQ

**Massachusetts Hazardous Substances List:**

Chemical Name	CAS #	Codes
Toluene	108-88-3	2, 4, 5, 6, F7, F8

**Michigan Critical Materials Registry:**

Chemical Name	CAS #	Report	Class
Toluene	108-88-3	--	--

**Minnesota Hazardous Substance:**

Chemical Name	Codes	Hazards	Carcinogen?
Toluene	ANO	skin	No

**New Jersey RTK Label Information:**

Chemical Name	CAS #	Substance #	DOT #	TPQ	EHS
Toluene	108-88-3	1866	1294	--	

**New York List of Hazardous Substances:**

Chemical Name	RQ - Air	RQ - Land	Note
Toluene	1000	1	none

**Pennsylvania RTK Label Information**

Chemical Name	CAS #	Code
Benzene, Methyl	108-88-3	E

**Washington Air Contaminant:**

TWA (ppm):	100 (Toluene)
TWA (mg):	375 (Toluene)
STEL (ppm):	150 (Toluene)
STEL (mg):	560 (Toluene)
Ceiling (ppm):	None listed
Ceiling (mg):	None listed
Skin:	None listed

**Section 16 - Other Information****Prepared By:** Research & Development**Revision Notes:** New

**Disclaimer:** The information contained in this document is based upon data that was supplied to Versico by other companies and organizations. No warranty of merchantability or fitness for a particular purpose is expressed or implied regarding the accuracy or completeness of the data and/or information in this material safety data sheet.