#### www.eezimmermanco.com

# MATERIAL SAFETY DATA SHEET

E-Z LACQUER THINNER

#### EMERGENCY CONTACT: FOR CHEMICAL EMERGENCY - SPILL, LEAK, FIRE, EXPOSURE, OR ACCIDENT, CALL CHEMTREC AT 1-(800)-424-9300, DAY OR NIGHT.

INDEX	HMIS			NFPA	
4 - Severe	Health	*2	Health	Not Determined	
3 - Serious	Flammability	3	Flammability	Not Determined	
2 - Moderate	Physical Hazard	1	Reactivity	Not Determined	
1 - Slight					
0 - Insignificant	<ul> <li>* denotes chronic hazard</li> </ul>				
2. COMPOSITION/INFO	ORMATION ON INGRED	ENTS			
IENT(S)		CAS N	umber	<u>% (by volume)</u>	

TOLUENE	108-88-3	43.0
ACETONE	67-64-1	23.0- 27.0
ALIPHATIC PETROLEUM DISTILLATES	64742-89-8	18.0- 22.0
METHYL ALCOHOL	67-56-1	11.0
ISOBUTYL ISOBUTYRATE	97-85-8	1.0- 3.0

#### Section 3. HAZARDS IDENTIFICATION

#### POTENTIAL HEALTH EFFECTS:

EYE:

Section 2

INGRED

Can cause eye irritation. Symptoms include stinging, tearing, redness and swelling of eyes.

SKIN:

May cause mild skin irritation. Prolonged or repeated contact may dry the skin. Symptoms may include redness, burning, drying and cracking of skin, and skin burns. Passage of this material into the body through the skin is possible, and may add to toxic effects from breathing or swallowing.

### SWALLOWING:

Swallowing this material may be harmful. This material can get into the lungs during swallowing or vomiting. This results in lung inflammation and other lung injury.

#### INHALATION:

Breathing of vapor or mist is possible. Breathing small amounts of this material during normal handling is not likely to cause harmful effects. Breathing large amounts may be harmful. Symptoms usually occur at air concentrations higher than the recommended exposure limits. (See Section 8).

#### SYMPTOMS OF EXPOSURE:

Signs and symptoms of exposure to this material through breathing, swallowing, and /or passage of the material through the skin may include: metallic taste, mouth and throat irritation (soreness, dry or scratchy feeling, cough), stomach or intestinal upset (nausea, vomiting, diarrhea), irritation (nose, throat, airways), cough, central nervous system excitation (giddiness, liveliness, light-headed feeling) followed by central nervous system depression (dizziness, drowsiness, weakness, fatigue, nausea, headache, unconsciousness) and other central nervous system effects, temporary changes in mood and behavior, leg cramps, muscle weakness, pain in the abdomen and lower back, blurred vision, shortness of breath, loss of coordination, confusion, irregular heartbeat, cyanosis(causes blue coloring of the skin and nails from lack of oxygen), high blood sugar, visual impairment (including blindness), coma, and death.

# TARGET ORGAN EFFECTS:

This material (or a component) shortens the time of onset or worsens the liver and kidney damage induced by other chemicals. Exposure to lethal concentrations of methanol has been shown to cause damage to organs including liver, kidneys, pancreas, heart, lungs and brain. Although this rarely occurs, survivors of severe intoxication may suffer from permanent neurological damage. Prolonged intentional toluene abuse may lead to damage to many organ systems having effects on: central and peripheral nervous systems, vision, hearing, liver, kidneys, heart and blood. Such abuse has been associated with brain damage characterized by disturbances in gait, personality changes and loss of memory. Comparable central nervous system effects have not been shown to result from occupational exposure to toluene. Prolonged intentional toluene abuse may lead to hearing loss progressing to deafness. In addition, while noise is known to cause hearing loss in humans, it has been suggested that workers exposed to organic solvents, including toluene, along with noise may suffer greater hearing loss than would be expected from exposure to noise alone. Overexposure to this material (or its components) has been suggested as a cause of the following effects in laboratory animals: mild, reversible liver effects, mild, reversible kidney effects, cardiac sensitization, liver abnormalities, respiratory tract damage (nose, throat, and airways), effects on hearing, central nervous system damage. Overexposure to this material (or its components) has been suggested as a cause of the following effects in humans: cardiac sensitization, visual impairment. kidney damage.

#### DEVELOPMENTAL INFORMATION:

Toluene may be harmful to the human fetus based on positive test results with laboratory animals. Case studies show that prolonged intentional abuse of toluene during pregnancy can cause birth defects in humans. Methanol has caused birth defects in laboratory animals, but only when inhaled at extremely high vapor concentrations. The relevance of this finding to humans is uncertain.

#### CANCER INFORMATION:

Based on the available information, this material cannot be classified with regard to carcinogenicity. This material is not listed as a carcinogen by the International Agency for Research on Cancer, the National Toxicology Program, or the Occupational Safety and Health Administration.

# OTHER HEALTH EFFECTS:

- No Data
- PRIMARY ROUTE(S) OF ENTRY:

Inhalation, skin absorption, skin contact, eye contact, ingestion.

#### Section 4. FIRST AID MEASURES

#### EYES:

If symptoms develop, immediately move individual away from exposure and into fresh air. Flush eyes gently with water for at least 15 minutes while holding eyelids apart. Seek immediate medical attention. If symptoms persist or there is any visual difficulty, seek medical attention.

#### SKIN:

Remove contaminated clothing. Wash exposed area with soap and water. If symptoms persist, seek medical attention. Launder clothing before reuse.

#### SWALLOWING:

Seek medical attention. If individual is drowsy or unconscious, do not give anything by mouth; place individual on the left side with the head down. Contact a physician, medical facility, or poison control center for advice about whether to induce vomiting. If possible, do not leave individual unattended.

#### INHALATION:

If symptoms develop, immediately move individual away from exposure and into fresh air. If symptoms persist, seek immediate medical attention. keep person warm and quiet. If person is not breathing, begin artificial respiration. If breathing is difficult, administer oxygen. Keep person warm and quiet; seek immediate medical attention.

# NOTE TO PHYSICIANS:

Inhalation of high concentrations of this material, as could occur in enclosed spaces or during deliberate abuse, may be associated with cardiac arrhythmias. Sympathomimetic drugs may initiate cardiac arrhythmias in persons exposed to this material. This product contains methanol which can cause intoxication and central nervous system depression. Methanol is metabolized to formic acid and formaldehyde. These metabolites can cause metabolic acidosis, visual disturbances and blindness. Since metabolism is required for these toxic symptoms, their onset may be delayed from 6 to 30 hours following ingestion. Ethanol competes for the same metabolic pathway and has been used to prevent methanol metabolism. Ethanol administration is indicated in symptomatic patients or at blood methanol concentrations above 20 ug/dl. Methanol is effectively removed by hemodialysis. Fomepizole (4-methylpyrazole) is an effective antagonist of alcohol dehydrogenase, and as such, may be used as an antidote in the treatment of ethylene glycol, diethylene glycol and methanol poisoning. This material is an aspiration hazard. Potential danger from aspiration must be weighed against possible oral toxicity (See Section 3 - Swallowing) when deciding whether to induce vomiting. This material (or a component) has produced hyperglycemia and ketosis following substantial ingestion. Pre-existing disorders of the following organs (or organ systems) may be aggravated by exposure to this material: respiratory tract, skin, lung (for example, asthma-like conditions), liver, kidney, central nervous system, pancreas, heart. auditory system. Exposure to this material may aggravate any preexisting condition sensitive to a decrease in available oxygen, such as chronic lung disease, coronary artery disease or anemias. Individuals with preexisting heart disorders may be more susceptible to arrhythmias (irregular heartbeats) if exposed to high concentrations of this material.

#### Section 5. FIRE FIGHTING MEASURES

### FLASH POINT:

<-1.0 F (-18.3 C) TCC

#### EXPLOSIVE LIMIT:

(for component) Lower 1.2%

# AUTOIGNITION TEMPERATURE:

No Data

# HAZARDOUS PRODUCTS OF COMBUSTION:

May form: carbon dioxide and carbon monoxide, various hydrocarbons.

#### FIRE AND EXPLOSION HAZARDS:

Material is volatile and readily gives off vapors which may travel along the ground or be moved by ventilation and ignited by pilot lights, flames, sparks, heaters, smoking, electric motors, static discharge, or other ignition sources at locations near the material handling point. Never use welding or cutting torch on or near drum (even empty) because product (even just residue) can ignite explosively. May form explosive peroxides.

#### EXTINGUISHING MEDIA:

Regular foam (such as AFFF), water fog, carbon dioxide, dry chemical.

#### FIRE FIGHTING INSTRUCTIONS:

Wear full firefighting turn-out gear (full Bunker gear), and respiratory protection (SCBA).

#### Section 6. ACCIDENTAL RELEASE MEASURES

#### SMALL SPILL:

Eliminate all sources of ignition such as flares, flames (including pilot lights), and electrical sparks. Absorb liquid on vermiculite, floor absorbent or other absorbent material. Persons not wearing proper personal protective equipment should be excluded from area of spill.

#### LARGE SPILL:

Eliminate all ignition sources (flares, flames including pilot lights, electrical sparks). Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed. Stop spill at source. Prevent from entering drains, sewers, streams or other bodies of water. Prevent from spreading. If runoff occurs, notify authorities as required. Pump or vacuum transfer spilled product to clean containers for recovery. Absorb unrecoverable product. Transfer contaminated absorbent, soil and other materials to containers for disposal. Prevent run-off to sewers, streams or other bodies of water. If run-off occurs, notify proper authorities as required, that a spill has occurred.

# Section 7. HANDLING AND STORAGE

#### HANDLING:

Containers of this material may be hazardous when emptied. Since emptied containers retain product residues (vapor, liquid, and/or solid), all hazard precautions given in the data sheet must be observed. Static ignition hazard can result from handling and use. Electrically bond and ground all containers, personnel and equipment before transfer or use of material. Special precautions may be necessary to dissipate static electricity for non-conductive containers. Use proper bonding and grounding during product transfer as described in National Fire Protection Association document NFPA 77. Precautions during use: avoid prolonged or frequently repeated skin contact with this material. Skin contact can be minimized by wearing impervious protective gloves. As with all products of this nature, good personal hygiene is essential. Hands and other exposed areas should be washed thoroughly with soap and water after contact, especially before eating and/or smoking. Regular laundering of contaminated clothing is essential to reduce indirect skin contact with this material. Hydrocarbon solvents are basically non-conductors of electricity and can become electrostatically charged during mixing filtering or numping at high flow rates. If this charge reactes a sufficiently high level sparks can form that material.

mixing, filtering or pumping at high flow rates. If this charge reaches a sufficiently high level, sparks can form that may ignite the vapors of flammable liquids. WARNING. Sudden release of hot organic chemical vapors or mists from process equipment operating at elevated temperature and pressure, or sudden ingress of air into vacuum equipment, may result in ignitions without the presence of obvious ignition sources. Published "autoignition" or "ignition" temperature values cannot be treated as safe operating temperatures in chemical processes without analysis of the actual process conditions. Any use of this product in elevated temperature processes should be thoroughly evaluated to establish and maintain safe operating conditions.

#### STORAGE:

Do not store near extreme heat, open flame, or sources of ignition.

# Section 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### EYE PROTECTION:

Chemical splash goggles in compliance with OSHA regulations are advised; however, OSHA regulations also permit other type safety glasses. Consult your safety representative.

#### SKIN PROTECTION:

Wear resistant gloves (consult your safety equipment supplier). To prevent repeated or prolonged skin contact, wear impervious clothing and boots.

#### **RESPIRATORY PROTECTIONS:**

If workplace exposure limit(s) of product or any component is exceeded (see exposure guidelines), a NIOSH/MSHA approved air supplied respirator is advised in absence of proper environmental control. OSHA regulations also permit other NIOSH/MSHA respirators (negative pressure type) under specified conditions (see your industrial hygienist). Engineering or administrative controls should be implemented to reduce exposure.

#### ENGINEERING CONTROLS:

Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below TLV(s).

# EXPOSURE GUIDELINES:

### <u>COMPONENT</u>

TOLUENE (108-88-03) OSHA PEL 200.000 ppm - TWA OSHA PEL 300.000 ppm - Ceiling OSHA VPEL 100.000 ppm - TWA OSHA VPEL 150.000 ppm - STEL ACGIH TLV 50.000 ppm - TWA (Skin) ACGIH TLV 150.000 ppm - STEL (Skin)

ACETONE (67-64-1) OSHA PEL 1000.000 ppm - TWA OSHA VPEL 750.000 ppm - TWA OSHA VPEL 1000.000 ppm - STEL ACGIH TLV 500.000 ppm - TWA ACGIH TLV 750.000 ppm - STEL

ALIPHATIC PETROLEUM DISTILLATES (64742-89-8) OSHA VPEL 300.000 ppm - TWA OSHA VPEL 400.000 ppm - STEL ACGIH TLV 300.000 ppm - TWA

METHYL ALCOHOL (67-56-1) OSHA PEL 200.000 ppm - TWA OSHA VPEL 200.000 ppm - TWA (Skin) OSHA VPEL 250.000 ppm - STEL (Skin) ACGIH TLV 200.000 ppm - TWA (Skin) ACGIH TLV 250.000 ppm - STEL (Skin)

ISOBUTYL ISOBUTYRATE (97-85-8) No exposure limits established

#### Section 9. PHYSICAL AND CHEMICAL PROPERTIES

BOILING POINT: (for component) 133.0 F (56.1 C) @ 760 mmHg VAPOR PRESSURE: (for component) 185.000 mmHg @ 68.00 F SPECIFIC VAPOR DENSITY: > 1.000 @ AIR=1 SPECIFIC GRAVITY: .812 @ 77.00 F LIQUID DENSITY: 6.760 lbs/gal @ 77.00 F .812 kg/l @ 25.00 C PERCENT VOLATILES: 100.00 %

EVAPORATION RATE: Slower than Ethyl Ether

APPEARANCE: Clear and particle free

STATE: Liquid

PHYSICAL FORM: Homogeneous solution

COLOR: No data

ODOR: Hydrocarbon

pH: Not applicable

# Section 10. STABILITY AND REACTIVITY

HAZARDOUS POLYMERIZATION:

Product will not undergo hazardous polymerization.

HAZARDOUS DECOMPOSITION:

May form: Carbon dioxide and carbon monoxide, various hydrocarbons.

CHEMICAL STABILITY:

Can form potentially explosive peroxides upon long standing in air.

INCOMPATIBILITY:

Avoid contact with: calcium hypochlorite, sodium, strong acids, strong oxidizing agents, zinc.

Section 11. TOXICOLOGICAL INFORMATION

No Data

Section 12. ECOLOGICAL INFORMATION

No Data

Section 13. DISPOSAL CONSIDERATION

# WASTE MANAGEMENT INFORMATION:

Dispose of in accordance with all applicable local, state and federal regulations.

Do not discharge effluent containing this product into lakes, streams, ponds or estruaries, oceans or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit, and the permitting authority has been notified in writing prior to discharge. Do not discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority.

Section 14. TRANSPORT INFORMATION

DOT INFORMATION - 49 CFR 172.101	
DOT DESCRIPTION & [CONTAINER MODE]:	
PAINT RELATED MATERIAL, 3, UN1263, II	[55 al Drum/5 Gal Pail/Gallon]
CONSUMER COMMODITY, ORM-D	[Quart/Pint]
NOS COMPONENT:	
None	
RQ (Reportable Quantity) - 49 CFR 172.101	
Product Quantity (lbs)	<u>Component</u>
1646	TOLUENE
20515	ACETONE
34374	METHANOL
OTHER TRANSPORTATION INFORMATION	
The DOT Transport Information may vary with the contain	ainer and mode of shipment.

#### Section 15. REGULATORY INFORMATION

US FEDERAL REGULATIONS:

TSCA (Toxic Substances Control Act) Status

TSCA (UNITED STATES) The intentional ingredients of this product are listed.

CERCLA RQ - 40 CFR 302.4(a)						
<u>Component</u>	<u>RQ (lbs)</u>					
TOLUENE	1000					
ACETONE	5000					
METHYL ALCOHOL	5000					
CERCLA RQ - 40 CFR 302.4(b)						
Materials without a "listed" RQ may be	e reportable as an "unlisted hazardous	substance".				
See 40 CFR 302.5 (b).						
SARA 302 Components - 40 CFR 355 Appendix A						
None						
Section 311/312 Hazard Class - 40 CFR 370.2						
Immediate (X) Delayed (X)	<li>K) Fire (X) Reacti</li>	ive()				
Sudden Release of Pressure ()						
SARA 313 Components - 40 CFR 372.65						
Section 313 Component(s)	CAS Number <u>%</u>					
TOLUENE	108-88-3 57.02					
METHANOL	67-56-1 15.00					
OSHA PROCESS SAFETY MANAGEMENT 29 CFR 1	1910					
None listed						
EPA ACCIDENTAL RELEASE PREVENTION 40 CFR	8 68					
None listed						
INTERNATIONAL REGULATIONS:						
INVENTORY STATUS:						
Not Determined						
STATE AND LOCAL REGULATIONS:						
CALIFORNIA PROPOSITION 65:						
The following statement is made in or	der to comply with the California Safe	Drinking Water				
and Toxic Enforcement Act of 1986:	This product contains the following sub	ostance(s) known				
to the state of California to cause can	icer.					
BENZENE						
The following states and is used to be		Duin Lin o Matan				
and Toxic Enforcement Act of 1996	The following statement is made in order to comply with the California Safe Drinking Water					
dilu TOXIC ETITOLETTETT ACT OF 1960.	reductive herm	Stance(S) Known				
DEINZEINE						
NEW IERSEY RTK LABEL INFORMATION						
TOLUENE	108-88-3					
ACETONE	67-64-1					
NAPHTHA, SOLVENT	64742-89-8					
METHYL ALCOHOL	67-56-1					
ISOBUTYL ISOBUTYRATE	97-85-8					
PENNSYLVANIA RTK LABEL INFORMATION:						
BENZENE, METHYL-	108-88-3					
2-PROPANONE	67-64-1					
ALIPHATIC PETROLEUM DISTILLATES	> 64/42-89-8					
METHANOL	67-56-1					

E.E. Zimmerman Company/Elroy Turpentine Company believes that the statements, technical information, and recommendations contained herein are reliable, but they are given without warranty or guarantee of any kind, express or implied, and we assume no responsibility for any loss, damage, or expense, direct or consequential, arising out of their use.