

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

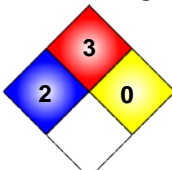
GHS Product Code: M150-1-0A1
 Product Name: McTHANE 150 ALUMINUM
 SINGLE COMPONENT MATERIAL, COLOR: ALUMINUM
 Recommended use: INDUSTRIAL PROTECTIVE COATING/LINING
 Restrictions on use: INTENDED FOR PROFESSIONAL USE ONLY
 Manufacturer: CORCHEM MANUFACTURING, INC.
 1227 SOUTH MURPHY STREET
 ODESSA, TEXAS, USA 79766-8811
 Address:
 Emergency phone: INFOTRAC +1-352-323-3500 (U.S. Toll Free: 800-535-5053)
 Contract No.: 74435
 Revision: 2-06082016

SECTION 2: HAZARDS IDENTIFICATION

GHS Classification


- Category 1 Aspiration Hazard
 Respiratory sensation
 Specific target organ toxicity – repeated exposure
 Respiratory tract
- Category 2 Skin irritation
 Carcinogenicity
 Specific target organ toxicity – repeated exposure
 STOT-RE: Oral
 Acute aquatic toxicity
 Chronic aquatic toxicity
- Category 2A Eye irritation
- Category 3 Flammable liquids
 Specific target organ toxicity – single exposure
 STOT-SE: Respiratory system
- Category 4 Acute toxicity – Dermal
 Acute toxicity – Inhalation

NFPA Rating



HMIS

2*	Health
3	Flammability
0	Physical Hazard
J	Personal Protection



GHS Label elements, including precautionary statements

Hazard Pictograms



Signal word: **Danger**

GHS Hazard statement(s)

- H226: Flammable liquid and vapor.
- H304: May be fatal if swallowed and enters airways.
- H312 + H332: Harmful in contact with skin or if inhaled.
- H315 + H318: Causes skin irritation and serious eye irritation.
- H334: May cause allergy or asthma symptoms or breathing difficulties if inhaled.

PERSONAL PROTECTION INDEX			
A		G	
B		H	
C		I	
D		J	
E		K	
F		X	Consult your supervisor or S.O.P. for "SPECIAL" handling directions
A		n	
o		p	
q		r	
s		Additional Information	
t		u	
w		y	
z			



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- H335: May cause respiratory irritation.
 H351: Suspected of causing cancer.
 H372: Causes damage to organs through prolonged or repeated exposure.
 H411: Toxic to aquatic life with long lasting effects.

GHS Precautionary statement(s)

- P102: Keep out of reach of children.
 P103: Read label before use.
 P202: Do not handle until all safety precautions have been read and understood.
 P210: Keep away from heat / sparks / open flames / hot surfaces – No smoking.
 P220: Keep / Store away from clothing / potential ignition sources / combustible materials.
 P233: Keep container tightly closed.
 P234: Keep only in original container.
 P260: Do not breathe dust / fumes / gas / mist / vapors / spray.
 P264: Wash skin thoroughly after handling.
 P270: Do not eat, drink or smoke when using this product.
 P271: Use only outdoors or in a well-ventilated area.
 P273: Avoid release to the environment.
 P280: Wear protective gloves/protective clothing/eye protection/face protection.
 P301+310: IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician.
 P303 + P361 + P353: IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.
 P304 + 340 + P312: IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.
 P305 + P351 + P338: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 P308 + P313: If exposed or concerned: Get medical advice/attention.
 P331: Do NOT induce vomiting.
 P332 + P313: If skin irritation occurs: Get medical advice/attention.
 P337 + P313: If eye irritation occurs: Get medical attention.
 P362: Take off contaminated clothing and wash before reuse.
 P370 + P378: In case of fire: Use dry sand, dry chemical, or alcohol-resistant foam to extinguish.
 P391: Collect spillage.
 P401: Store protected at temperatures between 40°F (4°C) and 100°F (38°C).
 P501: Dispose of contents/container to comply with the requirements of environmental protection and waste disposal legislation and any regional, local authority requirements.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

<u>Ingredient(s)</u>	<u>CAS No.</u>	<u>% (by Weight)</u>
Ethylbenzene	100-41-4	<5
Methylene bisphenyl isocyanate (MDI)	101-68-8	<10
Xylenes	1330-20-7	>20
Aluminum	7429-90-5	<10
Stoddard solvent	8052-41-3	<5
Polymeric diphenylmethane diisocyanate	9016-87-9	<5
Aromatic naphtha, type I	64742-95-6	<5
Polyisocyanate Prepolymer based on MDI	Trade Secret	>30
CBI Additives [NOT REGULATED BY GHS, DOT, IMDG, OR IATA]	MIXTURE	>10

SECTION 4: FIRST AID MEASURES

Ingestion

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

Skin

Remove contaminated clothing. Flush exposed area with large amounts of water. If skin is damaged, initiate and maintain continuous irrigation until patient receives medical care. If medical care is not promptly available, continue to irrigate for one hour. Cover wound with sterile dressing, seek immediate medical attention. If skin is not damaged and symptoms persist, avoid further exposure, **seek immediate medical attention**. Launder clothing before reuse.

Inhalation

If symptoms develop, move individual away from exposure and into fresh air. If symptoms persist, seek medical attention. If not breathing, if breathing is irregular, or if respiratory arrest occurs, artificial respiration or oxygen should be administered by trained personnel only. It may be dangerous to provide mouth-to-mouth resuscitation. Keep person warm and quiet; **seek immediate medical attention**. If unconscious, place in recovery position and get medical attention immediately. Maintain open airway. Loosen tight clothing such as a collar, tie, belt, or waistband. Get medical attention if adverse health effects persist or are severe.

Eyes

If symptoms develop, immediately move individual away from exposure and into fresh air. Flush eyes gently with water for at least 30 minutes while holding eyelids open; **seek immediate medical attention**.

Protection of first aid personnel

No action shall be taken involving any personal risk without suitable training. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, wear gloves.

Notes to Physicians or First Aid providers

No specific treatment. Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested.

SECTION 5: FIRE-FIGHTING MEASURES

Suitable extinguishing media

Alcohol-resistant foam, water-fog, carbon dioxide, dry chemicals, dry sand, Limestone powder.

Unsuitable extinguishing media

High volume water jet.

Specific hazards and by-products from combustion

Burning produces noxious and toxic fumes. **Downwind personnel must be evacuated**. Decomposition products may be toxic and include the following materials: carbon dioxide, carbon monoxide, and various hydrocarbons. Fumes and vapors from the thermal and chemical decompositions vary widely in combustion and toxicity.

Special protective equipment and precautions for fire-fighters

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

THIS MATERIAL IS TOXIC TO AQUATIC LIFE WITH LONG LASTING EFFECTS, CONTAMINATED FIRE EXTINGUISHING MEDIA MUST NOT BE DISCHARGED INTO WATERWAYS, SEWERS, DRAINS, OR THE ENVIRONMENT. FIRE RESIDUES AND CONTAMINATED FIRE EXTINGUISHING MEDIA MUST BE DISPOSED OF IN ACCORDANCE WITH LOCAL REGULATIONS.

Flash point

Estimated: >200°F (93°C)

Explosive limit

Not Established

Autoignition temperature

Not Established

Fire and explosion hazards

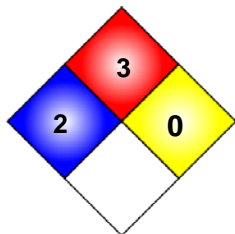
HIGHLY FLAMMABLE: Will be easily ignited by heat, sparks or flames. Vapors may form explosive mixtures with air. Vapors may travel to source of ignition and flash back. Most vapors are heavier than air. They will spread along ground and collect in low or confined areas (sewers, basements, tanks). Vapor explosion hazard indoors, outdoors or in sewers. Runoff to sewer may create fire or explosion hazard. Containers may explode when heated. Many liquids are lighter than water.

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 container, (even empty), because product (even just residue) can ignite explosively.

Water may be ineffective for extinguishment unless used under favorable conditions by experienced fire fighters. Use water spray to cool fire exposed containers and structures until fire is out if it can be with minimal risk. Avoid spreading burning material with water used for cooling purposes. Cool storage with water, if exposed to fire.

NFPA Rating

Health:	2
Flammability:	3
Reactivity:	0
Special:	



SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions

No action shall be taken involving personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Avoid breathing vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Wear appropriate personal protective equipment (see section 8).

Environmental Precautions

Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains, and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil, or air).

COLLECT CONTAMINATED SEPARATELY. RESIDUES AND CONTAMINATED MATERIAL MUST BE DISPOSED OF IN ACCORDANCE WITH LOCAL REGULATIONS.

Small Spill

Stop leak if without risk. Dilute with water and mop up if water soluble or absorb liquid with a dry, inert, non-combustible, absorbent material such as: sand, diatomaceous earth, vermiculite, or other absorbent material. Persons not wearing proper personal protective equipment should be excluded from area of spill.

COLLECT CONTAMINATED CLEAN-UP MATERIALS SEPARATELY. RESIDUES AND CONTAMINATED CLEAN-UP MATERIALS MUST BE DISPOSED OF IN ACCORDANCE WITH LOCAL REGULATIONS.

Large Spill

Stop leak if without risk. Move containers from spill area. Prevent run-off to sewers, water courses basements, or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with a dry, inert, non-combustible, absorbent material such as: sand, diatomaceous earth, vermiculite, or other absorbent material and place in container for disposal according to local regulations (see section 13). Dispose via a licensed waste disposal contractor. **Contaminated absorbent material may pose the same hazard as the spilled product.** If run-off occurs, notify proper authorities as required, that a spill has occurred. Note: see section 1 for emergency contact information and section 13 for waste disposal.

COLLECT CONTAMINATED CLEAN-UP MATERIALS SEPARATELY. RESIDUES AND CONTAMINATED CLEAN-UP MATERIALS MUST BE DISPOSED OF IN ACCORDANCE WITH LOCAL REGULATIONS.

SECTION 7: HANDLING AND STORAGE

Handling

Wear appropriate personal protective equipment (see section 8). Eating, drinking, and smoking should be prohibited in areas where this material is handled, stored, and processed. Workers should wash hands and face prior to eating, drinking, and smoking. Persons with a history of skin sensitization problems should not be employed in any process in which this product is used. Do not get in eyes or on skin or clothing. Do not breathe vapor or mist. Do not ingest. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Keep in original container, kept tightly closed when not in use. Empty containers retain product residue and can be hazardous. Do not reuse container. **KEEP AWAY FROM HEAT, SPARKS, FLAME, AND OTHER IGNITION SOURCES.**

OPENED, PARTIAL, AND EMPTY CONTAINERS RETAIN PRODUCT RESIDUE AND CAN BE HAZARDOUS. SINCE EMPTIED CONTAINERS RETAIN PRODUCT RESIDUES (VAPOR, LIQUID, AND/OR SOLID), ALL HAZARD PRECAUTIONS GIVEN IN THIS SAFETY DATA SHEET (SDS) MUST BE OBSERVED.

Storage

Store in accordance with local regulations. Store in a dry, cool, climate controlled area between 40° F (8°C) and 100°F (38°C), away from incompatible materials (see section 10), food and drink. Keep container tightly closed and sealed until ready to use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination.

OPENED, PARTIAL, AND EMPTY CONTAINERS RETAIN PRODUCT RESIDUE AND CAN BE HAZARDOUS. SINCE EMPTIED CONTAINERS RETAIN PRODUCT RESIDUES (VAPOR, LIQUID, AND/OR SOLID), ALL HAZARD PRECAUTIONS GIVEN IN THIS SAFETY DATA SHEET (SDS) MUST BE OBSERVED.

Other Precautions

Consult local, state and federal hazardous waste regulators before disposing of waste materials.

Can cause skin irritation, eye irritation, and allergic skin reaction. Avoid contact with eyes, skin, and clothing. Wash thoroughly after using. **DO NOT TAKE INTERNALLY! HARMFUL IF SWALLOWED! FOR PROFESSIONAL USE ONLY.** Use protective skin cream such as FEND2 (MSA) where skin contact is likely. Prevent prolonged or repeated breathing of vapor, or spray mists. Liquid penetrated shoes and leather, causing delayed irritation or skin reactions. **KEEP OUT OF REACH OF CHILDREN. DO NOT HANDLE UNTIL THE MANUFACTURER'S INSTRUCTIONS AND SAFETY PRECAUTIONS HAVE BEEN READ AND UNDERSTOOD!** Contact manufacturer if further information is required.

EMPTY CONTAINERS RETAIN PRODUCT RESIDUE AND CAN BE HAZARDOUS. SINCE EMPTIED CONTAINERS RETAIN PRODUCT RESIDUES (VAPOR, LIQUID, AND/OR SOLID), ALL HAZARD PRECAUTIONS GIVEN IN THE SAFETY DATA SHEET (SDS) MUST BE OBSERVED.

SECTION 8: EXPOSURE CONTROLS / PERSONAL PROTECTION

Exposure limit(s)

Note: The table includes occupational exposure limits (OELs) for substances listed in the OSHA Z-1 – Z-3 tables as well as OEL's listed by NIOSH and ACGIH. These organizations periodically make revisions to their OELs and so they should be consulted directly for their most current values and substances, as well as special notations such as for skin absorption. The TLVs[®] and BEIs[®] are copyrighted by ACGIH[®] and are not publicly available. However, they can be purchased in their entirety from the ACGIH[®]. Permission must be requested from ACGIH[®] to reproduce the TLVs[®] and BEIs[®], CORCHEM[®] is a registered member of ACGIH[®].

Authorities:

ACGIH The American Conference of Governmental Industrial Hygienists

NIOSH United States Department of Health and Human Services, Centers for Disease Control and Prevention, National Institute for Occupational Safety and Health

OSHA United States Department of Labor, Occupational safety and Health Administration

BEI[®] Biological Exposure Indices: the BEI[®] is a guideline for the control of potential health hazards to the worker by knowledgeable occupational health professionals and should not be used for any other purpose.

IDLH Immediately Dangerous to Life and Health: is defined by (NIOSH) as exposure to airborne contaminants that is "likely to cause death or immediate or delayed permanent adverse health effects or prevent escape from such an environment."

The OSHA regulation (1910.134(b)) defines the term as "an atmosphere that poses an immediate threat to life, would cause irreversible adverse health effects, or would impair an individual's ability to escape from a dangerous atmosphere."

IDLH values are often used to guide the selection of breathing apparatus that are made available to workers or firefighters in specific situations.

mg/m³ Approximate milligrams of substance per cubic meter of air.

PEL Permissible Exposure Limit: usually given as a time-weighted average (TWA). A TWA is the average exposure over a specified period of time, usually a nominal eight hours.

ppm Parts of vapor or gas per million parts of contaminated air by volume at 25 degrees C and 760 torr.

REL Recommended Exposure Limit: is an occupational exposure limit that has been recommended by NIOSH to OSHA for adoption as a permissible exposure limit. The REL is a level that NIOSH believes would be protective of worker safety and health over a working lifetime if used in combination with engineering and work practice controls, exposure and medical monitoring, posting and labeling of hazards, worker training and personal protective equipment. Although not legally enforceable limits, NIOSH RELs are considered by OSHA during the promulgation of legally enforceable PELs.

TLV[®] Threshold Limit Value: TLVs[®] refer to airborne concentrations of chemical substances and represent conditions under which it is believed that *nearly all* workers may be repeatedly exposed, day-after-day, over a working lifetime, without adverse health effects.

TLV-C Threshold Limit Value-Ceiling: The concentration that should not be exceeded during any part of the working exposure.

TLV-STEL Threshold Limit Value-Short Term Exposure Limit: a 15 minute TWA exposure that should not be exceeded at any time during a work day, even if the 8-hour TWA is within the TLV-TWA.

TLV-TWA Threshold Limit Value-Time Weighted Average: the Time Weighted Average concentration for a conventional 8-hour workday and a 40-hour workweek to which it is believed that nearly all workers may be repeatedly exposed, day-after-day for a working lifetime without adverse effects.

TWA Time Weighted Average: is the employee's average airborne exposure in any 8-hour work shift of a 40-hour work week which shall not be exceeded.

<u>Component(s)</u>	<u>Exposure Level</u>	<u>Authority</u>	<u>Adopted Value(s)</u>		<u>Note</u>
Ethylbenzene	IDLH	NIOSH	800 ppm	3,474 mg/m ³	
Ethylbenzene	TLV-TWA	ACGIH	200 ppm	868 mg/m ³	
Ethylbenzene	PEL	OSHA	100 ppm	434 mg/m ³	
Methylene bisphenyl isocyanate	IDLH	NIOSH	7.33 ppm	75 mg/m ³	
Methylene bisphenyl isocyanate	PEL	OSHA	0.02 ppm	0.2 mg/m ³	
Methylene bisphenyl isocyanate	TLV-TWA	ACGIH	0.005 ppm	0.051 mg/m ³	
Xylenes	IDLH	NIOSH	900 ppm	3,098 mg/m ³	
Xylenes	TLV-STEL	ACGIH	150 ppm	651 mg/m ³	
Xylenes	PEL	OSHA	100 ppm	434 mg/m ³	
Xylenes	TLV-TWA	ACGIH	100 ppm	434 mg/m ³	
Aluminum	IDLH	NIOSH	–	–	Not determined
Aluminum	PEL	OSHA	13.59 ppm	15 mg/m ³	
Aluminum	REL	NIOSH	9.06 ppm	10 mg/m ³	
Aluminum	TLV-TWA	ACGIH	0.91 ppm	1 mg/m ³	
Stoddard solvent	IDLH	NIOSH	3,493 ppm	20,000 mg/m ³	
Stoddard solvent	TLV-TWA	ACGIH	100 ppm	573 mg/m ³	
Stoddard solvent	PEL	OSHA	87 ppm	500 mg/m ³	
Stoddard solvent	REL	NIOSH	61 ppm	350 mg/m ³	
Polymeric diphenylmethane	IDLH	NIOSH	–	–	Not determined

diisocyanate					
Polymeric diphenylmethane diisocyanate	TLV-TWA	ACGIH	–	–	Not established
Polymeric diphenylmethane diisocyanate	PEL	OSHA	–	–	Not established
Polymeric diphenylmethane diisocyanate	REL	NIOSH	–	–	Not established
Aromatic naphtha, type I	IDLH	NIOSH	–	–	Not determined
Aromatic naphtha, type I	TLV-TWA	ACGIH	25 ppm	100 mg/m ³	
Aromatic naphtha, type I	PEL	OSHA	494 ppm	2,000 mgm ³	
Aromatic naphtha, type I	REL	NIOSH	86 ppm	350 mg/m ³	

Exposure guidelines

Consult local authorities for acceptable exposure limits.

Personal Protective Equipment (PPE)

Respiratory protection

When utilizing this material wear a NIOSH approved cartridge respirator or gas mask suitable to keep airborne mists and vapor concentration below the time-weighted threshold limit values. **WHEN USING IN POORLY VENTILATED OR CONFINED SPACES, USE A FRESH-AIR SUPPLYING RESPIRATOR OR A SELF-CONTAINED BREATHING APPARATUS.**

Skin protection

To prevent repeated or prolonged skin contact, wear appropriate safety garments such as impervious gloves, head/neck covers, aprons, jackets, pants, coveralls, and boots. Drench affected area with water for at least 15 minutes. Wash hands at the end of each work shift and before eating, drinking, using tobacco products, or restroom.

Eye protection

Chemical splash goggles and face shield in compliance with OSHA regulations are advised for eye protection.

Engineering controls

Use explosion-proof suction type exhaust fans and blowers with sufficient CFM capacity to keep solvent vapors below 20% of the explosive limit. Provide sufficient mechanical ventilation to maintain exposure below TLV(s).

Provide readily accessible eye wash stations and safety showers.

Other protective clothing or equipment

Use protective barrier creams on exposed skin areas. Discard contaminated leather articles. Remove contaminated clothing, do not allow contaminated clothing out of the workplace.

Work hygienic practices

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, and before eating, drinking, using tobacco products or restrooms. Regular laundering of contaminated clothing is essential to reduce indirect skin contact with this material.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Appearance (physical state, color, etc.):	Viscous aluminum liquid
Odor:	solvent like
Odor Threshold:	Not available.
pH:	Not available.
Melting Point / Freezing Point:	Not available.
Initial Boiling Point and Range:	Not available.
Flash Point:	Estimated: >200°F (93°C)
Evaporation Rate:	Not available.
Flammability (solid, gas):	Not applicable.
Upper/Lower flammability or explosive limits:	Not available.
Vapor Pressure:	Not available.
Vapor Density (air = 1):	Not available.
Relative Density (water = 1):	Not available.

Solubility (in water):	Insoluble
Partition coefficient: <i>n</i>- octanol/water:	Not available.
Auto-ignition temperature:	Not available.
Decomposition Temperature:	Not available.
Volatile Organic Compounds (VOC):	2.65
Percent solids by weight:	71.51
Percent solids by volume:	62.70
Specific Gravity:	1.11 @ 77° F (25° C)
Weight per gallon:	9.29

SECTION 10: STABILITY AND REACTIVITY

Reactivity:

No specific test data related to reactivity available for this product or its ingredients.

Chemical Stability:

Stable under recommended conditions.

Possibility of hazardous reactions:

Vapors may form explosive mixtures with air.

Conditions to avoid:

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.

Incompatible materials:

Water, amines, accelerators, promoters, other reactive chemicals. Incompatible with bases, reducing agents, oxidizing agents, nitrous acid and other nitrosating agents, organic acids (i.e. acetic acid, citric acid etc.), mineral acids, sodium hypochlorite, reactive metals, (i.e. sodium, calcium, zinc etc.), metal oxides, heavy metal salts.

Hazardous Polymerization:

Under normal conditions of storage and use, hazardous polymerization will not occur. Contact with moisture, other materials that react with isocyanates, or temperatures above 350°F (177°C), may cause polymerization.

Hazardous Decomposition or By-Products:

By fire or high heat: Carbon dioxide (CO₂), carbon monoxide (CO), oxides of nitrogen (NO_x), dense black smoke. Isocyanate, Isocyanic acid. Other potentially toxic vapors or fumes.

SECTION 11: TOXICOLOGICAL INFORMATION

Toxicological Information

Likely routes of exposure and potential health effects

Ingestion: Harmful or fatal if swallowed.

Skin: Irritating to the skin.

Eyes: Irritating to the eyes.

Inhalation: Harmful if inhaled.

Acute Toxicity Data

Product/ingredient name	Method	Species	Dose	Exposure	Result
Ethylbenzene	LC ₅₀ Inhalation	Rat	750 mg/kg	–	–
Ethylbenzene	LD ₅₀ Oral	Rat	4,769 mg/kg	4 h	
Ethylbenzene	LD ₅₀ Dermal	Rabbit	15,433 mg/kg	–	Irritation
Methylene bisphenyl isocyanate	LC ₅₀ Inhalation	Rat	490 mg/m ³	4 h	
Methylene bisphenyl isocyanate	LD ₅₀ Oral	Rat	7,616 mg/kg		
Methylene bisphenyl isocyanate	LD ₅₀ Dermal	Rabbit	9,400 mg/kg	4 h	
Xylenes	LC ₅₀ Inhalation	Rat	5,000 mg/kg	4 hr	–
Xylenes	LD ₅₀ Oral	Rat	3,523 mg/kg	4 hr	–

Xylenes	LD ₅₀ Dermal	Rabbit	1,100 mg/kg	4 hr	Irritation
Aluminum	LC ₅₀ Inhalation	Rat	>2,000 mg/kg	–	–
Aluminum	LD ₅₀ Oral	Rat	888 mg/m ³	4 h	
Aluminum	LD ₅₀ Dermal	Rabbit	No data available	–	–
Stoddard solvent	LC ₅₀ Inhalation	Rat	>8,200 mg/m ³	8 h	
Stoddard solvent	LD ₅₀ Oral	Rat	>5,000 mg/kg	8 h	
Stoddard solvent	LD ₅₀ Dermal	Rabbit	>2,000 mg/kg	8 h	
Polymeric diphenylmethane diisocyanate	LC ₅₀ Inhalation	Rat	490 mg/m ³	4 h	
Polymeric diphenylmethane diisocyanate	LD ₅₀ Oral	Rat	2,000 mg/kg	4 h	
Polymeric diphenylmethane diisocyanate	LD ₅₀ Dermal	Rabbit	10,000 mg/kg	4 h	irritation
Aromatic naphtha, type I	LC ₅₀ Inhalation	Rat	>6,000 mg/m ³	4 h	
Aromatic naphtha, type I	LD ₅₀ Oral	Rat	14,000 mg/kg	4 h	
Aromatic naphtha, type I	LD ₅₀ Dermal	Rabbit	2,000 mg/kg	4 h	

Potential chronic health effects

Chronic effects:	Once sensitized, a severe allergic reaction may occur when subsequently exposed.
Target organs:	Respiratory System, Central Nervous System.
Carcinogenicity:	No known significant effects or critical hazards on the product itself.
Mutagenicity:	No known significant effects or critical hazards on the product itself.
Teratogenicity:	No known significant effects or critical hazards on the product itself.
Fertility effects:	No known significant effects or critical hazards on the product itself.
Developmental effects	No known significant effects or critical hazards on the product itself.

Medical conditions aggravated by over- exposure: Pre-existing skin disorders may be aggravated by over-exposure to this product.

SECTION 12: ECOLOGICAL INFORMATION

Ecological Information

Environmental effects

No data on the product itself. May be harmful to the environment if released in large quantities.

Aquatic ecotoxicity

No data on specific product.

Ecotoxicity

Aquatic

Toxicity to Fish

Product/ingredient name	Test	Species	Dose	Exposure
Ethylbenzene	LC ₅₀	Oncorhynchus mykiss (rainbow trout)	10,733 mg/l	96 h
Methylene bisphenyl isocyanate	LC ₅₀	Branchydanio rerio (zebra fish)	500 mg/l	24 h
Xylenes	LC ₅₀	Oncorhynchus mykiss (rainbow trout)	2.6 mg/l	96 h
Aluminum	LC ₅₀	Oncorhynchus mykiss (rainbow trout)	0.12 mg/l	96 h
Stoddard solvent	LC ₅₀	No data available		
Polymeric diphenylmethane diisocyanate	LC ₅₀	Branchydanio rerio (zebra fish)	1,000 mg/l	96 h
Aromatic naphtha, type I	LC ₅₀	Oncorhynchus mykiss (rainbow trout)	9.2 mg/l	96 h

Toxicity to aquatic invertebrates

Product/ingredient name	Test	Species	Dose	Exposure
Ethylbenzene	EC ₅₀	Daphnia magna (water flea)	77,000 mg/l	24 h
Methylene bisphenyl isocyanate	EC ₅₀	Daphnia magna (water flea)	500 mg/l	24 h
Xylenes	EC ₅₀	Daphnia magna (water flea)	1.0 mg/l	24 h

Aluminum	EC ₅₀	No data available		
Stoddard solvent	EC ₅₀	No data available		
Polymeric diphenylmethane diisocyanate	EC ₅₀	Daphnia magna (water flea)	1,000 mg/l	24 h
Aromatic naphtha, type I	EC ₅₀	No data available		

Persistence and degradability

Product/ingredient name	Test	Concentration	Result
Ethylbenzene	Anaerobic 20-days	10%	Readily biodegradable
Methylene bisphenyl isocyanate	Aerobic 28-days	90%	Readily biodegradable
Xylenes	Anaerobic 20-days	72%	Readily biodegradable
Aluminum	No data available		
Stoddard solvent	No data available		
Polymeric diphenylmethane diisocyanate	Aerobic 28-days	90%	Readily biodegradable
Aromatic naphtha, type I	No data available		

Bioaccumulative potential

Product/ingredient name	Log K _{ow}	BCF	Potential
Ethylbenzene	3.15	15	Low
Methylene bisphenyl isocyanate	4.94	5.5	Low
Xylenes	3.12	2.14	Low
Aluminum	0.33	1.02	Negligible
Stoddard solvent	No data available		
Polymeric diphenylmethane diisocyanate	1.9	<1.00	Negligible
Aromatic naphtha, type I	No data available		

Mobility in soil

Product/ingredient name	
Ethylbenzene	Moderate mobility
Methylene bisphenyl isocyanate	Slight mobility
Xylenes	Moderate mobility
Aluminum	No data available
Stoddard solvent	No data available
Polymeric diphenylmethane diisocyanate	Slight mobility
Aromatic naphtha, type I	No data available

Other adverse affects

An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.

SECTION 13: DISPOSAL CONSIDERATIONS

Waste Disposal Method

EMPTY CONTAINERS RETAIN PRODUCT RESIDUE AND CAN BE HAZARDOUS. SINCE EMPTIED CONTAINERS RETAIN PRODUCT RESIDUES (VAPOR, LIQUID, AND/OR SOLID), ALL HAZARD PRECAUTIONS GIVEN IN THE SAFETY DATA SHEET (SDS) MUST BE OBSERVED Consult local, state and federal hazardous waste regulators before disposing of waste materials. The generation of waste should be avoided or minimized wherever possible. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Disposal of this product, solutions, and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains, and sewers. **DISPOSE IN ACCORDANCE WITH FEDERAL, STATE, AND LOCAL REGULATIONS ONLY.**

14. TRANSPORT INFORMATION

U.S. DEPARTMENT OF TRANSPORTATION

Proper Shipping Name Paint Related Material
 Hazard Class 3
 ID Number UN1263
 Packing Group III
 Emergency phone +1-352-323-3500 (US Toll Free: 800-535-5053)

NFPA Rating		HMIS	
2	3	2*	Health
	0	3	Flammability
		0	Physical Hazard
		J	Personal Protection

TRANSPORT CANADA

Proper Shipping Name Paint Related Material
 Hazard Class 3
 ID Number UN1263
 Packing Group III
 Emergency phone +1-352-323-3500 (US Toll Free: 800-535-5053)

IMO/IMDG

Proper Shipping Name Paint Related Material
 Hazard Class 3
 ID Number UN1263
 Packing Group III
 Emergency phone +1-352-323-3500 (US Toll Free: 800-535-5053)
 Stowage and segregation Category A
 EmS Fire / EmS Spill F-E / S-E

IATA/DGR

Proper Shipping Name Paint Related Material
 Hazard Class 3
 ID Number UN1263
 Packing Group III
 Emergency phone +1-352-323-3500 (US Toll Free: 800-535-5053)

Passenger and Cargo Aircraft	Quantity limitation:	6.6 US-Gal (25 L)
	Packaging instruction:	355
	Special Provisions:	A3, A72
Cargo Aircraft Only	Quantity limitation:	None
	Packaging instruction:	None
	Special Provisions:	None

MEXICAN REGULATION FOR THE LAND TRANSPORT OF HAZARDOUS MATERIALS AND WASTES

Nombre propio del transporte Paint Related Material
 Clase de peligro 3
 Número de identificación del UN1263
 Grupo de embalaje III
 teléfono de emergencia +1-352-323-3500 (US Toll Free: 800-535-5053)

Dangerous goods descriptions (if indicated above) may not reflect quantity, end-use or region-specific exceptions that can be applied. Consult shipping documents for descriptions that are specific to the shipment.

SECTION 15: REGULATORY INFORMATION

U.S. FEDERAL REGULATIONS**U.S. Department of Labor, Occupational Safety & Health Administration (OSHA)**

Hazard Communication Standard (HCS) Classification: See Section 2 above
Effective 26 March 2012, OSHA modified its Hazard Communication Standard (HCS), **29 CFR Parts 1910, 1915, and 1926**, to conform to the United Nations' Globally Harmonized System of Classification and Labeling of Chemicals (GHS)

Emergency Planning and Community Right-to-Know Act (EPCRA)**Sections: 302/304 Extremely Hazardous Substances (EHS):**

<u>Ingredient(s)</u>	<u>CAS No.</u>
Ethylbenzene	100-41-4
Methylene bisphenyl isocyanate	101-68-8
Xylenes	1330-20-7

311/312 Community Right-To-Know Hazard Categories

Category A:	Immediate (Acute) Health Hazard:	Yes
Category D:	Delayed (Chronic) Health Hazard:	Yes
Category F:	Fire Hazard:	Yes
Category R:	Reactive Hazard:	Yes
Category S:	Sudden Release of Pressure Hazard:	No

<u>Ingredient(s)</u>	<u>CAS No.</u>	<u>Category</u>
Ethylbenzene	108-88-3	A, D, F
Methylene bisphenyl isocyanate	101-68-8	A, D
Xylenes	1330-20-7	A, D, F
Aluminum	7429-90-5	F, R
Stoddard solvent	8052-41-3	A, F
Polymeric diphenylmethane diisocyanate	9016-87-9	A, D
Aromatic naphtha, type I	64742-95-6	F

Section: 313 Toxics Release Inventory (TRI) Reportable Ingredients:

<u>Ingredient(s)</u>	<u>CAS No.</u>
Ethylbenzene	108-88-3
Methylene bisphenyl isocyanate	101-68-8
Xylenes	1330-20-7
Aluminum	7429-90-5
Polymeric diphenylmethane diisocyanate	9016-87-9

State Regulations

USA, California State Safe Drinking & Toxic Enforcement Act (Proposition 65): This product may contain chemical(s) known to the State of California to cause cancer and/or birth defects or other reproductive harm.

<u>Ingredient(s)</u>	<u>CAS No.</u>
Ethylbenzene	100-41-4

USA, Louisiana Right-to-Know Hazardous Substance List (RTKHSL) Components:

<u>Ingredient(s)</u>	<u>CAS No.</u>
-	-

USA, Massachusetts Environmental Policy Act (MEPA), 301 CMR 41.00 components:

<u>Ingredient(s)</u>	<u>CAS No.</u>
-	-

USA, Michigan Critical Materials Register (CMR) Components:

<u>Ingredient(s)</u>	<u>CAS No.</u>
Xylenes	1330-20-7

USA, New Jersey Right to Know Hazardous Substance List (RTKHSL) Components:

<u>Ingredient(s)</u>	<u>CAS No.</u>
Ethylbenzene	108-88-3
Methylene bisphenyl isocyanate	101-68-8
Xylenes	1330-20-7
Aluminum	7429-90-5
Stoddard solvent	8052-41-3
Polymeric diphenylmethane diisocyanate	9016-87-9

USA, Pennsylvania Right-to-Know Hazardous Substance List (RTKHSL) Components:

<u>Ingredient(s)</u>	<u>CAS No.</u>
Ethylbenzene	108-88-3
Methylene bisphenyl isocyanate	101-68-8
Xylenes	1330-20-7
Aluminum	7429-90-5
Stoddard solvent	8052-41-3

Product specific health and safety data in other sections of this Safety Data Sheet (SDS) may also be applicable for state requirements. For details on your regulatory requirements you should contact the appropriate agency in your state.

SECTION 16: OTHER INFORMATION

Preparation Information

This Safety Data Sheet (SDS) has been prepared by CORCHEM® Corporation.

Revision: 2-06082016, Product Code: M150-1-0A1

DISCLAIMER: All information contained herein is based upon data obtained from CORCHEM's suppliers and/or recognized technical sources.

The data in this Safety Data Sheet (SDS) relates only to the specific material designated herein and does not relate to its use in combination with any other material or in any other process.

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