

Technical Services: Tel: (800) 381-9312 / Fax: (800) 791-5500

BlazeMaster® TFP-401 One Step Solvent Cement MSDS (Material Safety Data Sheet)

MSDS No: TYC010E6 Issue Date: 11 May 2006

SECTION 1 PRODUCT AND COMPANY IDENTIFICATION

Trade Name: BLAZEMASTER CPVC CEMENT TFP-401

Cement for CPVC Pipe Product Use:

CPVC Resin in Solvent Solution Formula:

CPVC Plastic Pipe Cement Synonyms:

Firm Name & TYCO c/o OATEY CO. 4700 West 160th Street P.O. Box 35906 Mailing Address: Cleveland, Ohio 44135, U.S.A. http://www.oatey.com Oatey Phone Number: (216) 267-7100 or (800) 321-9532

Emergency Phone For Emergency First Aid call 1-877-740-5015. For

chemical transportation emergencies ONLY, call Chemtrec at

1-800-424-9300. Outside the U.S. 1-703-527-3887.

Prepared By: Corporate Director - Safety and Environmental Compliance

Preparation Date: May 11, 2006

Numbers:

SECTION 2	COMPOSITION/INFORMATION	ON	INGREDIENTS

%wt/wt:	CAS NUMBER:	ACGIH TLV TWA:	OSHA PEL TWA	: OTHER:
5 - 15%	67-64-1	500 ppm	1000 ppm	
		750 ppm STEL		
40 - 55%	109-99-9	50 ppm(skin)	200 ppm	25 ppm (Mfg)
		100 ppm STEL		
5 - 15%	78-93-3	200 ppm	200 ppm	None
		300 ppm STEL		
5 - 15%	108-94-1	20 ppm(skin)	50 ppm	None
		50 ppm STEL		
15 - 30%	68648-82-8	10 mg/m3	None	None
		3.	Established	
.ca 1 - 5%	112945-52-5	10 mg/m3	None	None
		2	Established	
	5 - 15% 40 - 55% 5 - 15% 5 - 15%	5 - 15% 67-64-1 40 - 55% 109-99-9 5 - 15% 78-93-3 5 - 15% 108-94-1 15 - 30% 68648-82-8	5 - 15% 67-64-1 500 ppm 40 - 55% 109-99-9 50 ppm(skin) 5 - 15% 78-93-3 200 ppm 5 - 15% 108-94-1 20 ppm(skin) 5 - 15% 108-94-1 20 ppm(skin) 50 ppm STEL 50 ppm STEL 15 - 30% 68648-82-8 10 mg/m3	5 - 15% 67-64-1 500 ppm 1000 ppm 40 - 55% 109-99-9 50 ppm(skin) 200 ppm 5 - 15% 78-93-3 200 ppm 200 ppm 5 - 15% 108-94-1 20 ppm(skin) 50 ppm 5 - 30% 68648-82-8 10 mg/m3 None 68648-82-5 10 mg/m3 None 112945-52-5 10 mg/m3 None

OSHA Hazard Classification: Flammable, irritant, organ effects

HAZARDS IDENTIFICATION SECTION 3

Emergency Overview:

Red liquid with an ether-like odor. Extremely flammable liquid and vapor. Vapors may cause flash fire. May cause eye and skin irritation. Inhalation of vapors or mist may cause respiratory irritation and central nervous system effects. Swallowing may cause irritation, nausea, vomiting, diarrhea and kidney or liver disorders. Aspiration hazard. May be fatal if swallowed. Symptoms may be delayed.

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SECTION 4 FIRST AID MEASURES

CALL 1-877-740-5015

Remove contaminated clothing immediately. Wash all exposed areas with Skin:

soap and water. Get medical attention if irritation develops. Remove

dried cement with Oatey Plumber's Hand Cleaner or baby oil.

If material gets into eyes or if fumes cause irritation, immediately flush eyes with plenty of water until chemical is removed. If irritation persists, get medical attention immediately. Eyes:

Inhalation: If symptoms of exposure develop, remove to fresh air. If breathing

becomes difficult, administer oxygen. Administer artificial respiration if breathing has stopped. Seek immediate medical attention.

DO NOT INDUCE VOMITING. Rinse mouth with water. Never give anything Ingestion:

by mouth to a person who is unconscious or drowsy. Get immediate medical attention by calling a Poison Control Center, or hospital emergency room. If medical advice cannot be obtained, then take the person and product to the nearest medical emergency treatment center or hospital.

FIRE FIGHTING MEASURES

Flashpoint / Method: 0 - 5 Degrees F. (-18 - -15 Degrees C) / PMCC

Flammability: LEL = 1.8 % Volume, UEL = 11.8 % Volume

Use dry chemical, CO2, or foam to extinguish fire. Cool fire exposed container with water. Water may be ineffective as an Extinguishing Media:

extinguishing agent.

Special Fire Firefighters should wear positive pressure self-contained breathing apparatus and full protective clothing for fires in Fighting

Procedure: areas where chemicals are used or stored

Extremely flammable liquid. Keep away from heat and all Unusual Fire and Explosion sources of ignition including sparks, flames, lighted Hazards: cigarettes and pilot lights. Containers may rupture or

explode in the heat of a fire. Vapors are heavier than air and may travel to a remote ignition source and flash back. This product contains tetrahydrofuran that may form explosive organic peroxide when exposed to air or light or with age. Combustion will produce toxic and irritating vapors including

carbon monoxide, carbon dioxide and hydrogen chloride.

Decomposition

Products:

Hazardous

ACCIDENTAL RELEASE MEASURES SECTION 6

Spill or

Remove all sources of ignition and ventilate area. Stop leak if it can be done without risk. Personnel cleaning up the spill should wear appropriate personal protective equipment, including respirators if vapor concentrations are high. Soak up spill with an inert Procedures: absorbent such as sand, earth or other non-combusting material. Put absorbent material in covered, labeled metal containers. Prevent

liquid from entering watercourses, sewers and natural waterways. Report releases to authorities as required. See Section 13 for

disposal information.

SECTION 7 HANDLING AND STORAGE

Handling: Avoid contact with eyes, skin and clothing. Avoid breathing vapors

or mists. Use with adequate ventilation (equivalent to outdoors). Wash thoroughly after handling. Do not eat, drink or smoke in the work area. Keep product away from heat, sparks, flames and all other

sources of ignition. No smoking in storage or use areas. Keep

containers closed when not in use.

Store in a cool, dry, well-ventilated area away from incompatible Storage:

materials. Keep containers closed when not in use.

"Empty" containers retain product residue and can be hazardous. Other:

Follow all MSDS precautions in handling empty containers. Do not cut or weld on or near empty or full containers.

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EXPOSURE CONTROLS/PERSONAL PROTECTION SECTION 8

Ventilation: Open doors & windows. Provide ventilation capable of maintaining emissions at the point of use below recommended exposure limits. If used in enclosed area, use exhaust fans. Exhaust fans should be

explosion-proof or set up in a way that flammable concentrations of solvent vapors are not exposed to electrical fixtures or hot

surfaces.

For operations where the exposure limit may be exceeded, a NIOSH Respiratory Protection: approved organic vapor respirator or supplied air respirator is

recommended. Equipment selection depends on contaminant type and concentration, select in accordance with 29 CFR 1910.134 and good industrial hygiene practice. For firefighting, use self-contained

breathing apparatus.

Skin Rubber gloves are suitable for normal use of the product. For long Protection: exposures chemical resistant gloves may be required such as 4H(tm)

or Silver Shield(tm) to avoid prolonged skin contact. Safety glasses with side shields or safety goggles.

Protection:

Other: Eye wash and safety shower should be available.

SECTION 9 PHYSICAL AND CHEMICAL PROPERTIES

Boiling Point: 151 Degrees F / 66 Degrees C

Melting Point: Not applicable

Vapor Pressure: 145 mmHg @ 20 Degrees C

(Air = 1) 2.5Vapor Density: 70 - 80% Volatile Components: Solubility In Water: Negligible

Not applicable

 $0.98 \pm /- 0.02$ @ 20 Degrees C (BUAC = 1) = 5.5 - 8.0 Specific Gravity: Evaporation Rate:

Appearance: Red Liquid Ether-Like Odor: Will Dissolve In: Tetrahydrofuran

Material Is: Liquid

STABILITY AND REACTIVITY SECTION 10

Stability: Stable.

Conditions To Avoid: Avoid heat, sparks, flames and other sources of ignition. Combustion will produce toxic and irritating vapors Hazardous Decomposition including carbon monoxide, carbon dioxide and hydrogen Products: chloride.

Incompatibility/

Oxidizing agents, alkalis, amines, ammonia, acids, chlorine Materials To Avoid: compounds, chlorinated inorganics (potassium, calcium and sodium hypochlorite) and hydrogen peroxides. May attack

plastic, resins and rubber.

Hazardous

Polymerization: Will not occur.

SECTION 11 TOXICOLOGICAL INFORMATION

Vapors or mists may cause mucous membrane and respiratory Inhalation: irritation, coughing, headache, dizziness, dullness, nausea,

shortness of breath and vomiting. High concentrations may cause central nervous system depression, narcosis and unconsciousness.

May cause kidney, liver and lung damage.
May cause irritation with redness, itching and pain. Methyl Skin:

ethyl ketone and cyclohexanone may be absorbed through the skin

causing effects similar to those listed under inhalation.

Vapors may cause irritation. Direct contact may cause irritation Eye:

with redness, stinging and tearing of the eyes. May cause eye

damage.

Swallowing may cause abdominal pain, nausea, vomiting and Ingestion:

diarrhea. Aspiration during swallowing or vomiting can cause chemical pneumonia and lung damage. May cause kidney and liver

damage.

Chronic Prolonged or repeated overexposure cause dermatitis and damage

to the kidney, liver, lungs and central nervous system. Toxicity:

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Toxicity Data: Cyclohexanone:

Oral rat LD50: 1,620 mg/kg Inhalation rat LC50: 8,000 ppm/4 hours

Skin rabbit LD50: 1 mL/kg

Tetrahydrofuran: Oral rat LD50: 1,650 mg/kg

Inhalation rat LC50: 21,000 ppm/3 hours

Methyl Ethyl Ketone:

Oral rat LD50: 2,737 mg/kg Inhalation rat LC50: 23,500 mg/m3/8 hours

Skin rabbit LD50: 6,480 mg/kg

Sensitization: Carcinogenicity:

None of the components are known to cause sensitization. None of the components are listed as a carcinogen or suspect carcinogen by NTP, IARC or OSHA. The National Toxicology Program has reported that exposure of mice and rats to tetrahydrofuran (THF) vapor levels up to 1800 ppm 6 hr/day, 5 days/week for their lifetime caused an increased incidence of kidney tumors in male rats and liver tumors in female mice. The significance of these findings for human health is unclear at this time, and may be related to "species specific" effects. Elevated incidences of tumors in humans have not been reported for THF. ACGIH has classified cyclohexanone (CYH) and tetrahydrofuran as "A3," Confirmed Animal Carcinogens with Unknown Relevance to Humans. Cyclohexanone has been positive in bacterial and mammalian

Mutagenicity: assays. Methyl ethyl ketone and tetrahydrofuran are

generally thought not to be mutagenic.

Reproductive Toxicity:

Methyl ethyl ketone and cyclohexanone have been shown to cause embryofetal toxicity and birth defects in laboratory animals. Tetrahydrofuran has been found to cause adverse developmental effects only when exposure levels cause other toxic effects to the

mother.

Medical Conditions Aggravated By Exposure:

Persons with pre-existing skin, lung, kidney or liver disorders

may be at increased risk from exposure to this product.

SECTION 12 ECOLOGICAL INFORMATION

This product is not expected to be toxic to aquatic organisms. Cyclohexanone: 96 hour LC50 values for fish is over 100 mg/l. Tetrahydrofuran: 96 hour LC50 fathead minnow: 2160 mg/L.

Methyl Ethyl Ketone: 96 hour LC50 for fish is greater than 100 mg/L.

VOC This product emits VOC's (volatile organic compounds) in its use. Make sure that use of this product complies with local VOC emission Information:

regulations, where they exist.

490 g/l per SCAQMD Test Method 316A. VOC Level:

SECTION 13 DISPOSAL CONSIDERATIONS

Waste Disposal: Dispose in accordance with current local, state and federal

regulations.

U057, U159, U213 RCRA Hazardous Waste Number:

EPA Hazardous Waste ID Number: D001, D035, F003, F005

EPA Hazard Waste Class: Ignitable Waste. Toxic Waste (Methyl Ethyl Ketone content)

TRANSPORT INFORMATION SECTION 14

DOT Less than 1 Liter (0.3 gal) Greater than 1 Liter (0.3 gal)

Proper Shipping Name: Consumer Commodity Adhesives 3, PGII UN1133 Hazard Class/Packing Group: ORM-D UN/NA Number: None

Hazard Labels: None Flammable Liquid

Proper Shipping Name: Adhesives Adhesives Hazard Class/Packing Group: 3, II 3, II UN Number: UN1133 UN1133

Label: None (Limited Quantities Class 3 (Flammable

are excepted Liquid)

from labeling)

2004 North American Emergency Response Guidebook Number: 127 or 128

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SECTION 15 REGULATORY INFORMATION

Acute Health, Chronic Health, Flammable Hazard Category for Section

311/312:

Section 302 Extremely

Hazardous Substances (TPQ):

Section 313 Toxic Chemicals:

This product does not contain chemicals regulated

under SARA Section 302.

This product contains the following chemicals subject to SARA Title III Section 313 Reporting

requirements:

Chemical CAS # % by wt. Methyl Ethyl Ketone 78-93-3

CERCLA 103 Reportable

Quantity:

Spills of this product over the RQ (reportable quantity) must be reported to the National Response Center. The RQ for the product, based on the RQ for Tetrahydrofuran (45% maximum) of 1,000 lbs, is 2,222 lbs. Many states have more stringent release

reporting requirements. Report spills required under

federal, state and local regulations.

California Proposition 65:

This product contains trace amounts of chemicals known to the State of to cause cancer. Under normal Use conditions, exposure to these chemicals at levels above the State of California "No Significant Risk Level" (NSRL) are unlikely. Oatey strongly encourages the use of proper personal protective equipment (PPE) and ventilation guidelines noted in Section 8 to minimize exposure to these chemicals.

All of the components of this product are listed on

the TSCA inventory.

Canadian WHIMS Classification:

Class B, Division 2; Class D, Division 2, Subdivision B; Class D, Division 2, Subdivision A. This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR.

SECTION 16 OTHER INFORMATION

NFPA and HMIS:

TSCA Inventory:

NFPA Hazard Signal: Health: 2 Flammability: 3 Reactivity: 1 HMIS Hazard Signal: Health: 2* Flammability: 3 Reactivity: 1 Special: None

Disclaimer:

The information herein has been compiled from sources believed to be reliable, upto-date, and is accurate to the best of our knowledge. However, Oatey cannot give any quarantees regarding information from other sources, and expressly does not make warranties, nor assumes any liability for its use.

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