

SAFETY DATA SHEET

Issuing Date 31-May 2016

Revision Date 31-May 2016

Revision Number 1

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING

Product identifier

Product SDS Name Plastic Bonder - Syringe – Part A

J-B Weld FG SKU Part Numbers Covered

50133, 50139

J-B Weld Product Names Covered

J-B Plastic Bonder™ Syringe (Tan & Black)

J-B Weld Product Type

Polyurethane

Recommended use of the chemical and restrictions on use

Recommended Use Plastic Bonding & General Purpose Adhesive

Uses advised against No information available

Details of the supplier of the safety data sheet

Supplier Name J-B WELD COMPANY,LLC
Supplier Address 1130 COMO ST
SULPHUR SPRINGS, TX 75482
USA

Emergency Telephone Numbers Transportation Emergencies: Chemtrec (24 hour transportation emergency response info): 800-424-9300 or 703-527-3887

Poison/Medical Emergencies: Poison Control Centers (24 hour emergency poison / medical response info): 800-222-1222

Supplier Email info@jbweld.com

Supplier Phone Number 903-885-7696



2. HAZARDS IDENTIFICATION

GHS Classification

Skin irritation	Category 2
Eye irritation	Category 2A
Respiratory sensitization	Category 1
Skin sensitization	Category 1
Specific target organ systemic toxicity – single exposure	Category 3 (Respiratory system)
Specific target organ systemic toxicity – repeated exposure (Inhalation)	Category 2 (Respiratory system, Respiratory Tract)

GHS Label element

Hazard pictograms



Signal Word

Danger

Hazard Statements

Causes skin irritation.
May cause an allergic skin reaction
Causes serious eye irritation
May cause allergy or asthma symptoms or breathing difficulties if inhaled
May cause respiratory irritation.
May cause damage to organs (Respiratory system, Respiratory Tract) through prolonged or repeated exposure if inhaled.

Precautionary Statements

Prevention
Do not breathe dust/fume/gas/mist/vapors/spray.
Wash skin thoroughly after handling.
Use only outdoors or in a well-ventilated area.
Contaminated work clothing must not be allowed out of the workplace.
Wear eye protection/face protection.
Wear protective gloves.
In case of inadequate ventilation wear respiratory protection.

Response:

IF ON SKIN: Wash with plenty of soap and water.

IF INHALED: Remove person to fresh air and keep comfortable for breathing. Call a POISON CENTER or doctor/physician if you feel unwell.

IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

If skin irritation or rash occurs: Get medical advice/attention.

If eye irritation persists: Get medical advice/attention.

If experiencing respiratory symptoms: Call a POISON CENTER or doctor/physician.

Take off contaminated clothing and wash before reuse.

Storage:

Store in a well-ventilated place. Keep container tightly closed.

Store locked up.

Disposal:

Dispose of contents/container to an approved waste disposal plant.

None known.

Other hazards

3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance/Mixture : Mixture

Hazardous components

Chemical name	CAS-No.	Classification	Concentration (%)
POLYMER	254504001-5759	Acute Tox. 4; H332 Skin Irrit. 2; H315 Resp. Sens. 1A; H334 Skin Sens. 1A; H317 STOT SE 3; H335 STOT RE 2; H373	>=10.00-<15.00
SCAVENGER	254504001-5709	This material is not considered hazardous under the OSHA Hazard Communication Standard (HazCom 2012)	>=10.00-<15.00
URETHANE PREPOLYMER	800989-5572P	Resp. Sens. 1; H334 Skin Sens. 1; H317	>=5.00=<10.00

The identity of one or more component(s) is being withheld under business confidentiality.

4,4'-DIPHENYLMETHANE DIISOCYANATE	101-68-8	Acute Tox. 4; H332 Skin Irrit. 2; H315 Eye Irrit. 2A; H319	35.51
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		Resp. Sens. 1; H334 Skin Sens. 1; H317 STOT SE 3; H335 STOT RE 2; H373	
TALC	14807-96-6	This material is not considered hazardous under the OSHA Hazard Communication Standard (HazCom 2012)	35.51
PROPYLENE CARBONATE	108-32-7	Eye Irrit. 2A; H319	1.49

4. FIRST AID MEASURES

General advice

Move out of dangerous area. Call a POISON CENTER or doctor/physician if exposed or you feel unwell. Show this safety data sheet to the doctor in attendance. Do not leave the victim unattended.

If inhaled

Move to fresh air. Call a physician or poison control center immediately. Keep patient warm and at rest. If unconscious place in recovery position and seek medical advice.

In case of skin contact

Remove contaminated clothing. If irritation develops, get medical attention. If on skin, rinse well with water. Wash contaminated clothing before re-use.

In case of eye contact

Immediately flush eye(s) with plenty of water. Remove contact lenses. Protect unharmed eye.

If swallowed

Obtain medical attention. Do not give milk or alcoholic beverages. Never give anything by mouth to an unconscious person. If symptoms persist, call a physician.

Most important symptoms and effects, both acute and delayed

Pulmonary edema may be delayed. Signs and symptoms of exposure to this material through breathing, swallowing, and/or passage of the material through the skin may include: stomach or intestinal upset (nausea, vomiting, diarrhea); irritation (nose, throat, airways); cough; headache; chest pain, lung edema (fluid buildup in the lung tissue). Difficulty in breathing. Causes skin irritation. May cause an allergic skin reaction. Causes serious eye irritation. May cause allergy or asthma symptoms or breathing

difficulties if inhaled. May cause respiratory irritation. May cause damage to organs through prolonged or repeated exposure if inhaled.

Notes to physician

No hazards which require special first aid measures.

5. FIREFIGHTING MEASURES

Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Water spray. Foam. Carbon dioxide (CO₂), Dry chemical.

Unsuitable extinguishing media

High volume water jet

Specific hazards during firefighting

Do not allow run-off from fire fighting to enter drains or water courses.

Hazardous combustion products

Carbon dioxide and carbon monoxide, Hydrogen cyanide (hydrocyanic acid), Isocyanates, nitrogen oxides (NO_x), Bromine, Hydrocarbons

Specific extinguishing methods

Product is compatible with standard fire-fighting agents.

Further information

Standard procedure for chemical fires.

Special protective equipment for firefighters

In the event of fire, wear self-contained breathing apparatus.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Use personal protective equipment. Ensure adequate ventilation. Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed.

Environmental precautions

Prevent product from entering drains. Prevent further leakage or spillage if safe to do so. If the product contaminates rivers and lakes or drains inform respective authorities.

Methods and materials for containment and cleaning up

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Keep in suitable, closed containers for disposal.

Other information

Comply with all applicable federal, state, and local regulations.

7. HANDLING AND STORAGE

Advice on safe handling

Avoid formation of aerosol. Provide sufficient air exchange and/or exhaust in work rooms. Do not breathe vapours/dust. Do not smoke. Persons susceptible to skin sensitization problems or asthma, allergies, chronic or recurrent respiratory disease should not be employed in any process in which this mixture is being used. Container hazardous when empty. Avoid exposure – obtain special instructions before use. Avoid contact with skin and eyes. Smoking, eating and drinking should be prohibited in the application area. For personal protection see section 8. Dispose of rinse water in accordance with local and national regulations.

Conditions for safe storage

Keep container tightly closed in a dry and well-ventilated place. Observe label precautions. Electrical installations/working materials must comply with the technological safety standards.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Components with workplace control parameters

Components	CAS-No.	Value type (Form of exposure)	Control parameters / Permissible concentration	Basis
SCAVENGER	254504001-5709	TWA	1MG/M3	ACGIH
4,4'-DIPHENYLMETHANE DIISOCYANATE	101-68-8	TWA	0.005 ppm	ACGIH
		REL	0.005 ppm 0.05 mg/m3	NIOSH/GUIDE
		Ceil_Time	0.020 ppm 0.2 mg/m3	NIOSH/GUIDE

		Ceiling	0.02 ppm 0.2 mg/m3	OSHA_TRANS
TALC	14807-96-6	TWA	2 mg/m3 Respirable fraction.	ACGIH
		REL	2 mg/m3	NIOSH/GUIDE
		TWA	0.1 mg/m3 Respirable.	Z3
		TWA	0.3 mg/m3 Total dust.	Z3

Engineering measures

Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below exposure guidelines (if applicable) or below levels that cause known, suspected or apparent adverse effects.

Personal protective equipment

Respiratory protection: In the case of vapour formation use a respirator with an approved filter. Diisocyanates have poor warning properties. An air-purifying respirator with an organic vapor cartridge and an N95 prefilter can be used safely and effectively to reduce exposure provided that appropriate cartridge change schedules are developed to ensure that cartridges are changed before breakthrough occurs. The employer is required to select the appropriate respirator for each situation and must consider potential exposure to chemicals in addition to diisocyanates. A NIOSH-approved air-purifying respirator with an appropriate cartridge and/or filter may be permissible until certain circumstances where airborne concentrations are expected to exceed exposure limits (if applicable) or if overexposure has otherwise been determined. Protection provided by air-purifying respirators is limited. Use a positive pressure, air-supplied respirator if there is any potential for uncontrolled release, exposure levels are not known or any other circumstances where an air-purifying respirator may not provide adequate protection.

Hand protection

Remarks

The suitability for a specific workplace should be discussed with the producers of the protective gloves.

Eye Protection

Wear chemical splash goggles when there is the potential for exposure of the eyes to liquid, vapor or mist.

Skin and body protection

Wear as appropriate: Impervious clothing. Safety Shoes, Choose body protection according to the amount and concentration of the dangerous substance at the work place. Wear resistant gloves (consult your safety equipment supplier).

Hygiene measures

Wash hands before breaks and at the end of workday. When using do not eat or drink. When using do not smoke.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance	:viscous
Physical state	:liquid
Color	:beige
Odour	:no data available
Odour threshold	:no data available
pH	:no data available
Boiling point/boiling range	:>392°F/>200°C
Flash point	:>212°F/>100°C
Evaporation rate	:<1
	n-Butyl Acetate
Flammability (solid, gas)	:no data available
Upper explosion limit	:no data available
Lower explosion limit	:no data available
Vapour pressure	:<0.01333 hPa (25°C)
Relative vapour density	:>1AIR=1
Relative density	:no data available
Density	:1.288 g/cm ³ (20°C)
Solubility(ies)	
Water solubility	:practically insoluble
Solubility in other solvents	:no data available
Partition coefficient: n-octano/water	:no data available
Thermal decomposition	:no data available
Viscosity	
Viscosity, dynamic	: ca. 20,000 mPa.s
Viscosity, kinematic	:no data available
Oxidizing properties	:no data available

10. STABILITY AND REACTIVITY

Reactivity

No decomposition if stored and applied as directed.

Chemical Stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

Product will not undergo hazardous polymerization.

Conditions to avoid

Freezing temperatures. Exposure to moisture.

Incompatible materials

Acids, Alcohols, aluminum, Amines, Ammonia, Bases, Copper alloys, fluorides, Iron, Oxidizing agents, strong alkalis, strong reducing agents, water, Zinc, Humid air

Hazardous decomposition products

Carbon dioxide and carbon monoxide, hydrocarbons, hydrogen cyanide (hydrocyanic acid), Isocyanates, Nitrogen oxides (NOx)

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure:

Inhalation
Skin Contact
Eye Contact
Ingestion

Acute toxicity

Not classified based on available information

Components:

POLYMER:

Acute oral toxicity:

LD50 (Rat): >5,000 mg/kg
Method: OECD Test Guideline 425
GLP: yes

Acute inhalation toxicity:

Assessment: The component/mixture is classified as acute inhalation toxicity, category 4.

Acute dermal toxicity

(Rabbit):>9,400 mg/kg
Remarks: Information given is based on data obtained from similar substances



Components:**4,4'-DIPHENYLMETHANE DIISOCYANATE:**

Acute oral toxicity LD 50 (Rat): 9,200 mg/kg

Acute inhalation toxicity LD 50 (Rat): 0.369 mg/l

Exposure time: 4 h

LC 50 (Rat): >2.24 mg/l

Exposure time: 1 h

Test atmosphere: dust/mist

Method: OECD Test Guideline 403

Assessment: The component/mixture is classified as acute inhalation toxicity, category 4.

Acute dermal toxicity LD 50 (rabbit): >7,900 mg/kg

PROPYLENE CARBONATE:

Acute oral toxicity LD 50 (Rat): 29.1 g/kg

Acute dermal toxicity LD 50 (Rabbit): >24 g/kg

Skin corrosion/irritation Causes skin irritation.

Product:

Remarks May cause skin irritation and/or dermatitis.

Components:**POLYMER:**

Result: Irritating to skin

Remarks: Information given is based on data obtained from similar substances.

SCAVENGER:

Result: Possibly irritating to skin.

URETHANE PREPOLYMER:

Result: Not irritating to skin.

Components:**4,4'-DIPHENYLMETHANE DIISOCYANATE:**

Result: Irritating to skin

TALC: Result: Probably irritating to skin

PROPYLENE CARBONATE: Species: Rabbit
Method: OECD Test Guideline 404
Result: Not irritating to skin

Serious eye damage / eye irritation

Causes serious eye irritation.

Product:

Remarks: Vapours may cause irritation to the eyes, respiratory system and the skin. Causes serious eye irritation.

Components:

POLYMER:

Result: Not irritating to eyes
Remarks: Information given is based on data obtained from similar substances.

SCAVENGER:

Result: Mildly irritating to eyes

URETHANE PREPOLYMER:

Result: Mildly irritating to eyes.

Components:

4,4'-DIPHENYLMETHANE DIISOCYANATE:

Result: Irritating to eyes

TALC: Result: Possibly irritating to eyes

PROPYLENE CARBONATE: Species: Rabbit
Result: Irritating to eyes
Method: OECD Test Guideline 405

Respiratory or skin sensitization

Skin sensitization: May cause an allergic reaction.

Respiratory Sensitization: May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Components:

POLYMER: Test Type: Maximization Test (GPMT)
Species: Guinea pig
Assessment: May cause sensitization by skin contact.
Result: The product is a skin sensitizer, sub-category 1A.

Assessment: May cause sensitization by inhalation
Result: The product is a respiratory sensitizer, sub-category 1A.

URETHANE PREPOLYMER: Assessment: May cause sensitization by skin contact.
Assessment: May cause sensitization by inhalation.

Components:

4,4'-DIPHENYLMETHANE DIISOCYANATE:
Assessment: May cause sensitization by inhalation.
Assessment: May cause sensitization by skin contact.

Germ Cell Mutagenicity Not classified based on available information.

Components:

POLYMER:
Genotoxicity in vitro Test Type: Ames Test
Result: negative
Remarks: Information given is based on data obtained from similar substances.

Genotoxicity in vivo Test Type: In vivo micronucleus test
Test species: Rat
Method: OECD Test Guideline 474
Remarks: Information given is based on data obtained from similar substances.

Components:

PROPYLENE CARBONATE:
Genotoxicity in vitro Test Type: Ames Test
Test species: Salmonella typhimurium
Metabolic activation: with and without metabolic activation
Method OECD Test Guideline 471
Result: negative

Genotoxicity in vivo

Test Type: Micronucleus test
Test species: Mouse
Cell type: Bone marrow
Method: OECD Test Guideline 474
Result: negative

Carcinogenicity

Not classified based on available information.

Product:

Carcinogenicity – Assessment

Methylene bisphenylisocyanate (MDI) aerosol has been reported to be irritating to lungs at a concentration of 1 mg/m³ with no effect observed at 0.2 mg/m³. Although MDI has been reported to cause an increase in non-carcinogenic lung tumors and a single carcinogenic lung tumor at very high concentrations (6 mg/m³), it is not classified as a carcinogen by IARC, NTP or OSHA.

Reproductive toxicity

STOT – single exposure

Not classified based on available information.
May cause respiratory irritation.

Components:

POLYMER:

Exposure routes: inhalation
Target Organs: Respiratory Tract
Assessment: May cause respiratory irritation

Components:

4,4'-DIPHENYLMETHANE DIISOCYANATE:

Exposure routes: Inhalation

Target Organs: respiratory system

Assessment: May cause respiratory irritation.

STOT – repeated exposure

May cause damage to organs (Respiratory system, Respiratory Tract) through prolonged or repeated exposure if inhaled.

Components:

POLYMER:

Exposure routes: Inhalation
Target Organs: Respiratory Tract
Assessment: May cause damage to organs through prolonged or repeated exposure.

Components:

4,4'-DIPHENYLMETHANE DIISOCYANATE:

Exposure routes: Inhalation

Target Organs: Respiratory system

Assessment: May cause damage to organs through prolonged or repeated exposure.

Aspiration toxicity

Not classified based on available information.

Further information**Product:**

Remarks: No data available.

Components:

4,4'-DIPHENYLMETHANE DIISOCYANATE:

Remarks: Lung

Carcinogenicity:**IARC**

Group 2B: Possibly carcinogenic to humans

TALC

14807-96-6

OSHA

No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

NTP

No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

12. ECOLOGICAL INFORMATION**Ecotoxicity****Components:**

POLYMER:

Toxicity to fish

LC 50 (*Oryzias latipes* (Japanese medaka)): >3,000 mg/l

Exposure time: 96 h

Test type: semi-static test

Remarks: Information given is based on data obtained from similar substances.

<p>Toxicity to daphnia and other aquatic invertebrates</p>	<p>(Daphnia magna (Water flea)):>1,000 mg/l Exposure time: 24 h Test Type: static test Method: OECD Test Guideline 202 Remarks: Information given is based on data obtained from similar substances.</p>
<p>Toxicity to algae</p>	<p>NOEC (Desmodesmus subspicatus (green algae)): 1,640 mg/l End point: Growth inhibition Exposure time: 72 h Test Type: Static test Method: OECD Test Guideline 201 Remarks: Information given is based on data obtained from similar substances.</p>
<p>4,4'-DIPHENYLMETHANE DIISOCYANATE:</p>	
<p>Toxicity to fish</p>	<p>LC50 (Oryzias latipes (Orange-red killifish)):>3,000 mg/l Exposure time: 96 h Test Type: semi-static test Remarks: Information given is based on data obtained from similar substances.</p>
<p>Toxicity to daphnia and other aquatic invertebrates</p>	<p>EC50 (Water flea (Daphnia magna)): 100 mg/l Exposure time: 24 h Test Type: static test Method: OECD Test Guideline 202 Remarks: Information given is based on data obtained from similar substances.</p>
<p>Toxicity to daphnia and other aquatic invertebrates (Chronic toxicity)</p>	<p>NOEC (Water flea (Daphnia magna)): 10 mg/l Exposure time: 21 d End point: Reproduction Test Test Type: semi-static test Method: OECD Test Guideline 211 Remarks: Information given is based on data obtained from similar substances.</p>
<p>PROPYLENE CARBONATE:</p>	
<p>Toxicity to fish</p>	<p>LC50 (Cyprinus carpio(Carp)):>1,000 mg/l Exposure time: 96 h Test Type: semi-static test Method: Directive 67/548/EEC, Annex V, C.1.</p>

Toxicity to daphnia and other aquatic invertebrates	EC50 (Water flea (<i>Daphnia magna</i>)): >1,000 mg/l Exposure time: 48 h Test Type: static test Method: OECD Test Guideline 202
Toxicity to algae	EC50 (<i>Desmodesmus subspicatus</i> (green algae)): >900 mg/l End point: Growth inhibition Exposure time: 72 h Test Type: static test Method: OECD Test Guideline 201

NOEC (*Desmodesmus subspicatus* (green algae)): >900 mg/l
End point: Growth inhibition
Exposure time: 72 h
Test Type: static test
Method: OECD Test Guideline 201

Persistence and degradability

Components:

POLYMER:

Biodegradability

Result: Not readily biodegradable.
Biodegradation: 0%
Exposure time: 28 d
Method: OECD Test Guideline 302C

4,4'-DIPHENYLMETHANE DIISOCYANATE:

Biodegradability

Result: Not biodegradable
Biodegradation: 0%
Exposure time: 28 d
Method: OECD Test Guideline 302C
Remarks: Information given is based on data obtained from similar substances.

PROPYLENE CARBONATE:

Biodegradability

Result: Readily biodegradable
Biodegradation: 87.1%
Exposure time: 29 d
Method: OECD Test Guideline 301B

Bioaccumulative potential

Components:

PROPYLENE CARBONATE

Partition coefficient: n-octanol/water

log-Pow: -0.41

Mobility in soil

Components:

No data available

Other adverse effects

No data available

Product

Additional ecological information

No data available

13. DISPOSAL CONSIDERATIONS**Disposal methods**

General advice

Do not dispose of waste in sewer.
Do not contaminate ponds, waterways or ditches
with chemical or used container.
Send to a licensed waste management company.
Dispose of in accordance with all applicable
local, state and federal regulations.

Contaminated packaging

Empty remaining contents.
Dispose of as unused product.
Empty containers should be taken to an approved
waste handling site for recycling or disposal.
Do not re-use empty containers.

14. TRANSPORT INFORMATION**International transport regulations****REGULATION**

ID NUMBER	PROPER SHIPPING NAME	*HAZARD CLASS	SUBSIDIARY HAZARDS	PACKING GROUP	MARINE POLLUTANT / LTD. QTY.
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U.S. DOT - ROAD

Not dangerous goods



U.S. DOT - RAIL

Not dangerous goods

U.S. DOT - INLAND WATERWAYS

Not dangerous goods

TRANSPORT CANADA - ROAD

Not dangerous goods

TRANSPORT CANADA - RAIL

Not dangerous goods

TRANSPORT CANADA - INLAND WATERWAYS

Not dangerous goods

INTERNATIONAL MARITIME DANGEROUS GOODS

Not dangerous goods

INTERNATIONAL AIR TRANSPORT ASSOCIATION - CARGO

Not dangerous goods

INTERNATIONAL AIR TRANSPORT ASSOCIATION - PASSENGER

Not dangerous goods

MEXICAN REGULATION FOR THE LAND TRANSPORT OF HAZARDOUS MATERIALS AND WASTES

Not dangerous goods

***ORM = ORM-D, CBL = COMBUSTIBLE LIQUID**

Marine pollutant: no

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.



15. REGULATORY INFORMATION

EPCRA – Emergency Planning and Community Right-to-Know Act CERCLA Reportable Quantity

Components	CAS-No	Component RQ (lbs)	Calculated product RQ (lbs)
4,4'-DIPHENYLMETHANE DIISOCYANATE	101-68-8	5000	14206.159791

SARA 311/312 Hazards

Acute Health Hazard
Chronic Health Hazard

SARA 313

Component(s)

4,4'-DIPHENYLMETHANE DIISOCYANATE
101-68-8
35.51%

California Prop 65

WARNING! This product contains a chemical known to the
State of California to cause cancer.
QUARTZ/SAND 14808-60-7

The components of this product are reported in the following inventories:

TSCA On TSCA Inventory
DSL This product contains one or several components that are
not on the Canadian DSL and have annual quantity limits.
AUSTR On the inventory, or in compliance with the inventory
ENCS Not in compliance with the inventory
KECL On the inventory, or in compliance with the inventory.
PICCS On the inventory, or in compliance with the inventory.
IECSC On the inventory, or in compliance with the inventory.

Inventories

AICS (Australia), DSL (Canada), IECSC (China), REACH (European Union), ENCS (Japan), ISHL
(Japan), KECI (Korea), NZloC (New Zealand), PICCS (Philippines), TSCA (USA)

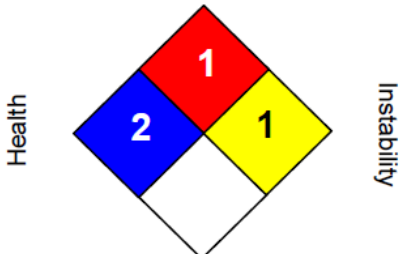
Chemical Name	Identification number
POLYMER	254504001-5759
SCAVENGER	254504001-5709
URETHANE PREPOLYMER	800986-5572P



16. OTHER INFORMATION

Further Information

Revision Date: 05/26/2015

NFPA:	HMIS III:						
<p>Flammability</p>  <p>Health</p> <p>Instability</p> <p>Special hazard.</p>	<table border="1"> <tr> <td>HEALTH</td><td>2*</td></tr> <tr> <td>FLAMMABILITY</td><td>1</td></tr> <tr> <td>PHYSICAL HAZARD</td><td>1</td></tr> </table> <p>0 = not significant, 1 = Slight, 2 = Moderate, 3 = High 4 = Extreme, * = Chronic</p>	HEALTH	2*	FLAMMABILITY	1	PHYSICAL HAZARD	1
HEALTH	2*						
FLAMMABILITY	1						
PHYSICAL HAZARD	1						

NFPA Flammable and Combustible Liquids Classification

Combustible Liquid Class IIIB

Full text of H-Statements

H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H332	Harmful if inhaled.
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H335	May cause respiratory irritation.
H373	May cause damage to organs through prolonged or repeated exposure if inhaled.

Sources of key data used to compile the Safety Data Sheet

J-B Weld Company internal data including own and sponsored test reports.

The UNECE administers regional agreements implementing harmonized classification for labelling (GHS) and transport.

The information accumulated herein is believed to be accurate but is not warranted to be whether originating with the company or not. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances. This SDS has been prepared by J-B Weld Company.



List of abbreviations and acronyms that could be, but not necessarily are, used in this safety data sheet:

ACGIH: American Conference of Industrial Hygienists

BEI: Biological Exposure Index

CAS: Chemical Abstracts Service (Division of the American Chemical Society).

CMR: Carcinogenic, Mutagenic or Toxic for Reproduction

FG: Food grade

GHS: Globally Harmonized System of Classification and Labeling of Chemicals.

H-Statement: Hazard Statement

IATA: International Air Transport Association.

IATA-DGR: Dangerous Goods Regulation by the "International Air Transport Association" (IATA).

ICAO: International Civil Aviation Organization

ICAO-TI (ICAO): Technical Instructions by the "International Civil Aviation Organization"

IMDG: International Maritime Code for Dangerous Goods

ISO: International Organization for Standardization

logPow: octanol-water partition coefficient

LCxx: Lethal Concentration, for xx percent of test population

LDxx: Lethal Dose, for xx percent of test population

ICxx: Inhibitory Concentration for xx of a substance

Ecxx: Effective Concentration of xx

N.O.S.: Not Otherwise Specified

OECD: Organization for Economic Co-operation and Development

OEL: Occupational Exposure Limit

P-Statement: Precautionary Statement

PBT: Persistent, Bioaccumulative and Toxic

PPE: Personal Protective Equipment

STEL: Short-term exposure limit

STOT: Specific Target Organ Toxicity

TLV: Threshold Limit Value

TWA: Time-weighted average

vPvB: Very persistent and Very Bioaccumulative

WEL: Workplace Exposure Level

CERCLA: Comprehensive Environmental Response, Compensation and Liability Act

DOT: Department of Transportation

FIFRA: Federal Insecticide, Fungicide, and Rodenticide Act

HMIRC: Hazardous Materials Information Review Commission

HMIS: Hazardous Materials Identification System

NFPA: National Fire Protection Association

NIOSH: National Institute for Occupational Safety and Health

OSHA: Occupational Safety and Health Administration

PMRA: Health Canada Pest Management Regulatory Agency

RTK: Right to Know

WHMIS: Workplace Hazardous Materials Information System



SAFETY DATA SHEET

Issuing Date 31-May 2016

Revision Date 31-May 2016

Revision Number 1

1. IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND OF THE COMPANY/UNDERTAKING

Product identifier

Product SDS Name Plastic Bonder (Black) - Syringe – Parts B

J-B Weld FG SKU Part Numbers Covered

50139

J-B Weld Product Names Covered

J-B Plastic Bonder™ Syringe

J-B Weld Product Type

Polyurethane

Recommended use of the chemical and restrictions on use

Recommended Use Plastic Bonding & General Purpose Adhesive

Uses advised against No information available

Details of the supplier of the safety data sheet

Supplier Name J-B WELD COMPANY,LLC
Supplier Address 1130 COMO ST
SULPHUR SPRINGS, TX 75482
USA

Emergency Telephone Numbers Transportation Emergencies: Chemtrec (24 hour transportation emergency response info): 800-424-9300 or 703-527-3887

Poison/Medical Emergencies: Poison Control Centers (24 hour emergency poison / medical response info): 800-222-1222

Supplier Email info@jbweld.com

Supplier Phone Number 903-885-7696



2. HAZARDS IDENTIFICATION

GHS Classification

Reproductive toxicity : Category 2

GHS label elements

Hazard pictograms



Signal word

: Warning

Hazard Statements

: Suspected of damaging fertility or the unborn child.

Precautionary Statements

: **Prevention:**

Obtain special instructions before use.

Do not handle until all safety precautions have been read and understood.

Wear protective gloves/protective clothing/eye protection/face protection.

Response:

IF exposed or concerned: Get medical advice/attention.

Storage:

Store locked up.

Disposal:

Dispose of contents/container to an approved waste disposal plant.

Other hazards

: None known.

3. COMPOSITION/INFORMATION ON INGREDIENTS

Substance/Mixture : Mixture

Chemical nature : Defatter

Chemical name	CAS-No.	Classification	Concentration (%)
TALC	14807-96-6	This material is not considered hazardous under the OSHA Hazard Communication Standard (HazCom 2012)	25.002
PIPERAZINE	110-85-0	Flam. Sol. 1; H228 Skin Corr. 1B; H314 Eye Dam. 1; H318 Resp. Sens. 1B; H334 Skin Sens. 1B; H317 Repr. 2; H361	0.767

4. FIRST AID MEASURES

General advice

Move out of dangerous area. Show this safety data sheet to the doctor in attendance. Do not leave the victim unattended.

If inhaled

If unconscious place in recovery position and seek medical advice. If symptom persists, call a physician.

In case of skin contact

First aid is not normally required. However, it is recommended that exposed areas be cleaned by washing with soap and water.

In case of eye contact

Flush eyes with water as a precaution. Remove contact lenses. Protect unharmed eye. If eye irritation persists, consult a specialist.

If swallowed

Obtain medical attention. Do not give milk or alcoholic beverages. Never give anything by mouth to an unconscious person. If symptoms persist, call a physician.

Most important symptoms and effects, both acute and delayed

No symptoms known or expected. Suspected of damaging fertility or the unborn child.

Notes to physician

No hazards which require special first aid measures.

5. FIREFIGHTING MEASURES

Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Water spray. Foam. Carbon dioxide (CO₂), Dry chemical.

Unsuitable extinguishing media

High volume water jet

Specific hazards during firefighting



Do not allow run-off from fire fighting to enter drains or water courses.

Hazardous combustion products

Toxic fumes, Aldehydes, Ketones, carbon dioxide and carbon monoxide, halogenated hydrocarbons, nitrogen oxides (NO_x)

Specific extinguishing methods

Product is compatible with standard fire-fighting agents.

Further information

Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

Special protective equipment for firefighters

In the event of fire, wear self-contained breathing apparatus.

6. ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Use personal protective equipment. Ensure adequate ventilation. Persons not wearing protective equipment should be excluded from area of spill until clean-up has been completed.

Environmental precautions

Prevent product from entering drains. Prevent further leakage or spillage if safe to do so. If the product contaminates rivers and lakes or drains inform respective authorities.

Methods and materials for containment and cleaning up

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Keep in suitable, closed containers for disposal.

Other information

Comply with all applicable federal, state, and local regulations.



7. HANDLING AND STORAGE

Advice on safe handling

Do not breathe vapours/dust. Do not smoke. Container hazardous when empty. Avoid exposure – obtain special instructions before use. Avoid contact with skin and eyes. Smoking, eating and drinking should be prohibited in the application area. For personal protection see section 8. Dispose of rinse water in accordance with local and national regulations.

Conditions for safe storage

Keep container tightly closed in a dry and well-ventilated place. Observe label precautions. Electrical installations/working materials must comply with the technological safety standards.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Components with workplace control parameters

Components	CAS-No.	Value type (Form of exposure)	Control parameters / Permissible concentration	Basis
TALC	14807-96-6	TWA	2 mg/m ³ Respirable fraction	ACGIH
				ACGIH
				ACGIH/LIS_P
		REL	2 mg/m ³ Respirable.	NIOSH/GUIDE
				NIOSH/GUIDE
				Z3
				Z3
		TWA		Z3
		TWA	0.1 mg/m ³ Respirable.	Z3
		TWA	0.3 mg/m ³ Total dust.	Z3
CARBON BLACK	133-86-4	REL	0.1 mg/m ³	NIOSH/GUIDE
		REL	3.5 mg/m ³	NIOSH/GUIDE
		PEL	3.5 mg/m ³	OSHA_TRANS

		TWA	3 mg/m ³ Inhalable fraction.	ACGIH
PIPERAZINE	110-85-0	TWA	0.03 ppm Inhalable fraction and vapor (as piperazine)	ACGIH
		TWA	0.03 ppm Inhalable fraction and vapor (as piperazine)	ACGIHLIS_P

Hazardous components without workplace control parameters

Engineering measures

Provide sufficient mechanical (general and/or local exhaust) ventilation to maintain exposure below exposure guidelines (if applicable) or below levels that cause known, suspected or apparent adverse effects.

Personal protective equipment

Respiratory protection: In the case of vapour formation use a respirator with an approved filter. A NIOSH-approved air-purifying respirator with an appropriate cartridge and/or filter may be permissible until certain circumstances where airborne concentrations are expected to exceed exposure limits (if applicable) or if overexposure has otherwise been determined. Protection provided by air-purifying respirators is limited. Use a positive pressure, air-supplied respirator if there is any potential for uncontrolled release, exposure levels are not known or any other circumstances where an air-purifying respirator may not provide adequate protection.

Hand protection

Polyvinyl chloride

Remarks

The suitability for a specific workplace should be discussed with the producers of the protective gloves.

Eye Protection

Not required under normal conditions of use. Wear splash-proof safety goggles if material could be misted or splashed into eyes.

Skin and body protection

Wear as appropriate: Impervious clothing. Safety Shoes, Choose body protection according to the amount and concentration of the dangerous substance at the work place. Wear resistant gloves (consult your safety equipment supplier).

Hygiene measures

Wash hands before breaks and at the end of workday. When using do not eat or drink. When using do not smoke.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical state	:liquid
Color	:black
Odour	:no data available
Odour threshold	:no data available
pH	:no data available
Flash point	:>200.1°F/>93.4°C
Evaporation rate	:no data available
Flammability (solid, gas)	:no data available
Upper explosion limit	:no data available
Lower explosion limit	:no data available
Vapour pressure	:3 hPa (25°C) Calculated Vapor Pressure
Relative vapour density	:no data available
Relative density	:1.26 (25°C)
Density	:ca. 1.26 g/cm ³ (20°C)
Solubility(ies)	
Water solubility	:no data available
Solubility in other solvents	:no data available
Partition coefficient: n-octano/water	:no data available
Thermal decomposition	:no data available
Viscosity	
Viscosity, dynamic	23,000 mPa.s
Viscosity, kinematic	:no data available
Oxidizing properties	:no data available

10. STABILITY AND REACTIVITY

Reactivity

No decomposition if stored and applied as directed.

Chemical Stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

Product will not undergo hazardous polymerization.

Conditions to avoid

Heat. Exposure to moisture.

Incompatible materials

Alkalis, Isocyanates, Oxidizers, Phosphorus Compounds, Strong acids, strong oxidizing agents

Hazardous decomposition products

No hazardous decomposition products are known.

11. TOXICOLOGICAL INFORMATION

Information on likely routes of exposure:

Inhalation
Skin Contact
Eye Contact
Ingestion

Acute toxicity

Not classified based on available information

Components:

PIPERAZINE:

Acute oral toxicity:

LD50 (Rat): 2,600 mg/kg
Method: OECD Test Guideline 401

Acute inhalation toxicity:

LC0 (Rat, male and female): 1.61 mg/l
Exposure time: 8 h
Test atmosphere: vapour

Skin corrosion/irritation:

Not classified based on available information.

Components:

TALC:

Result: Possibly irritating to skin



PIPERAZINE:

Result: Corrosive after 3 minutes to 1 hour exposure

Components:

TALC:

Result: Possibly irritating to eyes

PIPERAZINE:

Result: Corrosive

Respiratory or skin sensitization

Skin sensitization: Not classified based on available information.

Respiratory sensitization: Not classified based on available information.

Components:

PIPERAZINE:

Assessment: The product is a respiratory sensitizer, sub-category 1B

Assessment: The product is a skin sensitizer, sub-category 1B

Germ cell mutagenicity

Not classified based on available information.

Carcinogenicity

Not classified based on available information.

Reproductive toxicity

Suspected of damaging fertility or the unborn child.

Components:

PIPERAZINE:

Reproductive toxicity –

Assessment

Some evidence of adverse effects on sexual function and fertility,
and/or on development, based on animal experiments.

STOT-single exposure

Not classified based on available information.

STOT – repeated exposure

Not classified based on available information.

Aspiration toxicity

Not classified based on available information.

Further information

Product:

Remarks:

No data available.

Carcinogenicity:

IARC

Group 2B: Possibly carcinogenic to humans

TALC 14807-96-6

CARBON BLACK 1333-86-4



OSHA

No component of this product present at levels greater than or equal to 0.1% is identified as a carcinogen or potential carcinogen by OSHA.

NTP

No component of this product present at levels greater than or equal to 0.1% is identified as a known or anticipated carcinogen by NTP.

12. ECOLOGICAL INFORMATION**Ecotoxicity****Product:**

Ecotoxicology Assessment

Acute aquatic toxicity

Not classified based on available information.

Chronic aquatic toxicity

Not classified based on available information.

Components:

PIPERAZINE:

Toxicity to fish

LC50 (Poecilia reticulata (guppy)): >1,800 mg/l

Exposure time: 96 h

Toxicity to daphnia and other aquatic invertebrates

EC50 (Water flea (Daphnia magna)): 21 mg/l

Exposure time: 48 h

Method: OECD Test Guideline 202

Toxicity to algae

EC50 (Pseudokirchneriella subcapitata (green algae)): >1,000 mg/l

Exposure time: 72 h

Method: OECD Test Guideline 201

Toxicity to daphnia and other aquatic invertebrates

NOEC (Water flea (Daphnia magna)): 12.5 mg/l

Exposure time: 21 d

(Chronic toxicity)

Method: OECD Test Guideline 211

Persistence and degradability

PIPERAZINE:

Biodegradability

Result: Readily biodegradable

Biodegradation: 70%

Exposure time: 28 d

Method: OECD Test Guideline 301F

No data available

Bioaccumulative potential

PIPERAZINE:



Partition coefficient: n-octanol/water

Log Pow: -1.17

No data available

Mobility in soil

No data available

Other adverse effects

No data available

Product:

Additional ecological information:

No data available

13. DISPOSAL CONSIDERATIONS

Disposal methods

General advice

Do not dispose of waste in sewer.
Do not contaminate ponds, waterways or ditches with chemical or used container.
Send to a licensed waste management company.
Dispose of in accordance with all applicable local, state and federal regulations.
Empty remaining contents.
Dispose of as unused product.
Empty containers should be taken to an approved waste handling site for recycling or disposal.
Do not re-use empty containers.

Contaminated packaging

14. TRANSPORT INFORMATION

REGULATION

ID NUMBER	PROPER SHIPPING NAME	*HAZARD CLASS	SUBSIDIARY HAZARDS	PACKING GROUP	MARINE POLLUTANT / LTD. QTY.
--------------	----------------------	------------------	-----------------------	------------------	------------------------------------

U.S. DOT - ROAD

Not dangerous goods

U.S. DOT - RAIL

Not dangerous goods



U.S. DOT - INLAND WATERWAYS

Not dangerous goods

TRANSPORT CANADA - ROAD

Not dangerous goods

TRANSPORT CANADA - RAIL

Not dangerous goods

TRANSPORT CANADA - INLAND WATERWAYS

Not dangerous goods

INTERNATIONAL MARITIME DANGEROUS GOODS

Not dangerous goods

INTERNATIONAL AIR TRANSPORT ASSOCIATION - CARGO

Not dangerous goods

INTERNATIONAL AIR TRANSPORT ASSOCIATION - PASSENGER

Not dangerous goods

MEXICAN REGULATION FOR THE LAND TRANSPORT OF HAZARDOUS MATERIALS AND WASTES

Not dangerous goods

***ORM = ORM-D, CBL = COMBUSTIBLE LIQUID**

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.

15. REGULATORY INFORMATION

SARA 311/312 Hazards

Chronic Health Hazard

SARA 313**Component(s) SARA 313**

This material does not contain any chemical components with known CAS numbers that exceed the threshold (De Minimis) reporting levels established by SARA Title III, Section 313.



California Prop 65

WARNING! This product contains a chemical known to the State of California to cause cancer.

CARBON BLACK	1333-86-4
QUARTZ/SAND	14808-60-7
FURAN	110-00-9
PROPYLENE OXIDE	75-56-9
ACETALDEHYDE	75-07-0

The components of this product are reported in the following inventories:

TSCA	On TSCA Inventory
DSL	All components of this product are on the Canadian DSL
ENCS	Not in compliance with the inventory
KECI	On the inventory, or in compliance with the inventory.
PICCS	Not in compliance with the inventory
IECSC	On the inventory, or in compliance with the inventory.

Inventories

AICS (Australia), DSL (Canada), IECSC (China), REACH (European Union), ENCS (Japan), ISHL (Japan), KECI (Korea), NZloC (New Zealand), PICCS (Philippines), TCSI (Taiwan), TSCA (USA)

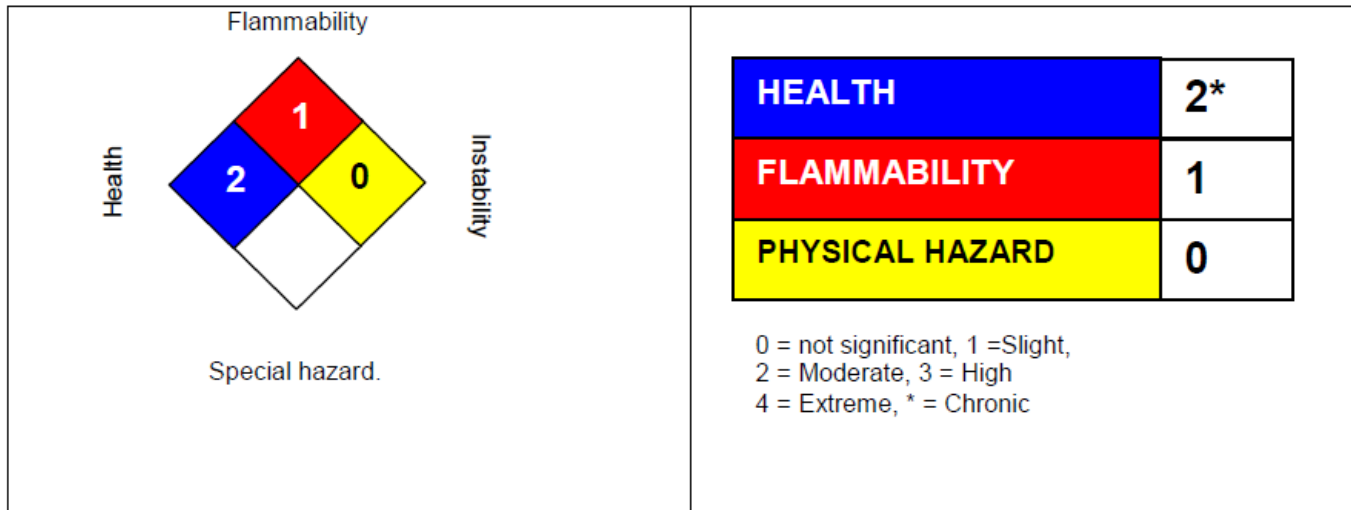
16. OTHER INFORMATION

Further Information

Revision Date: 02/11/2016

NFPA:

HMIS III:



NFPA Flammable and Combustible Liquids Classification

Combustible Liquid Class IIIB



Full text of H-Statements

H228	Flammable solid.
H314	Causes severe skin burns and eye damage.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H361	Suspected of damaging fertility or the unborn child.

Sources of key data used to compile the Safety Data Sheet

J-B Weld Company internal data including own and sponsored test reports.

The UNECE administers regional agreements implementing harmonized classification for labelling (GHS) and transport.

The information accumulated herein is believed to be accurate but is not warranted to be whether originating with the company or not. Recipients are advised to confirm in advance of need that the information is current, applicable, and suitable to their circumstances. This SDS has been prepared by J-B Weld Company.

List of abbreviations and acronyms that could be, but not necessarily are, used in this safety data sheet:

ACGIH: American Conference of Industrial Hygienists

BEI: Biological Exposure Index

CAS: Chemical Abstracts Service (Division of the American Chemical Society).

CMR: Carcinogenic, Mutagenic or Toxic for Reproduction

FG: Food grade

GHS: Globally Harmonized System of Classification and Labeling of Chemicals.

H-Statement: Hazard Statement

IATA: International Air Transport Association.

IATA-DGR: Dangerous Goods Regulation by the "International Air Transport Association" (IATA).

ICAO: International Civil Aviation Organization

ICAO-TI (ICAO): Technical Instructions by the "International Civil Aviation Organization"

IMDG: International Maritime Code for Dangerous Goods

ISO: International Organization for Standardization

logPow: octanol-water partition coefficient

LCxx: Lethal Concentration, for xx percent of test population

LDxx: Lethal Dose, for xx percent of test population

ICxx: Inhibitory Concentration for xx of a substance

Ecxx: Effective Concentration of xx

N.O.S.: Not Otherwise Specified

OECD: Organization for Economic Co-operation and Development



OEL: Occupational Exposure Limit
P-Statement: Precautionary Statement
PBT: Persistent, Bioaccumulative and Toxic
PPE: Personal Protective Equipment
STEL: Short-term exposure limit
STOT: Specific Target Organ Toxicity
TLV: Threshold Limit Value
TWA: Time-weighted average
vPvB: Very persistent and Very Bioaccumulative
WEL: Workplace Exposure Level

CERCLA: Comprehensive Environmental Response, Compensation and Liability Act
DOT: Department of Transportation
FIFRA: Federal Insecticide, Fungicide, and Rodenticide Act
HMIRC: Hazardous Materials Information Review Commission
HMIS: Hazardous Materials Identification System
NFPA: National Fire Protection Association
NIOSH: National Institute for Occupational Safety and Health
OSHA: Occupational Safety and Health Administration
PMRA: Health Canada Pest Management Regulatory Agency
RTK: Right to Know
WHMIS: Workplace Hazardous Materials Information System