SAFETY DATA SHEET

SECTION 1 – IDENTIFICATION

1.1 Product Identifier

Product number and name	**67004-H PRATLEY WONDAFIX AUTO HARDENER, bubble pack**
Product type	Adhesive

1.2 Relevant identified uses of the substance or mixture and uses advised against

Relevant identified uses	Consumer use
Uses advised against	No specific uses advised against. Avoid skin and eye contact, inhalation of vapours or ingestion.

1.3 Details of Supplier of Safety Data Sheet

Manufactured by	Pratley Polymers Manufacturing (Proprietary) Ltd 14 Jackson Street, Factoria, Krugersdorp, 1745 South Africa Tel: +27-11-955-2190 Fax: +27-11-955-3918 www.pratleyadhesives.com
Supplied in South Africa by	Pratley (Proprietary) Ltd 14 Jackson Street, Factoria, Krugersdorp, 1745 South Africa Tel: +27-11-955-2190 Fax: +27-11-955-3918 sales@pratley.com www.pratleyadhesives.com
Supplied outside South Africa by	Pratley Exporting (Proprietary) Ltd 14 Jackson Street, Factoria, Krugersdorp, 1745 South Africa Tel: +27-11-955-2190 Fax: +27-11-955-3918 exports@pratley.com www.pratleyadhesives.com

1.4 Emergency Telephone Number

South Africa	+27-11-955-2190 during office hours 10117 All emergencies +27-21-689-5227 Poisons Information Centre
Europe	112 All emergencies
	For detailed poison information, the national poison centre, if available, should be contacted.

United Kingdom	999 All emergencies
	111 (NHS, England, NHS 24, Scotland or NHS Direct, Wales), 0808 808 8000 (Lifeline, N. Ireland) 01 809 2166 (National Poison Information Centre, Republic of Ireland)
Australia	000 All emergencies
	13 11 26 NSW Poison Information Centre
New Zealand	111 All emergencies
	0800 764 766 National Poisons Centre (poisons@otago.ac.nz)
Americas	911 All emergencies
	1-800-222-1222 Poisons Help (PoisonHelp.org)

SECTION 2 – HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

2.1.1 Classification

Class	Category	Hazard Code and Statement	
Acute Toxicity, oral	4	H302	Harmful if swallowed.
Acute Toxicity, dermal	4	H312	Harmful in contact with skin.
Skin Corrosion/Irritation	1	H314	Causes severe skin burns and eye damage.
Eye Corrosion/Irritation	1	H318	Causes serious eye damage.
Skin Sensitizer	1	H317	May cause an allergic skin reaction.
Aquatic Toxicity - Chronic	3	H412	Harmful to aquatic life with long lasting effects.

2.1.2 Additional Information

EUH208 Contains DCCI and Polymercaptan. May produce an allergic reaction.

2.2 Label Elements

Hazard Pictogram(s), Signal Word and Ingredients

DANGER

DBU
Bis(4-amino-3-methylcyclohexyl)methane
DCCI
TDMA-Methylphenol

The technical name has been replaced on the label by a name / identification that is easier for a consumer to identify. See section 16 for a comparison of the technical and alternative names used.

Hazard Statements	H302	**Harmful if swallowed.**
	H312	**Harmful in contact with skin.**
	H314	**Causes severe skin burns and eye damage.**
	H317	May cause an allergic skin reaction.
	H318	Causes serious eye damage.
	H412	**Harmful to aquatic life with long lasting effects.**
Obligatory Statements	EUH208	**Contains DCCI and Polymercaptan. May produce an allergic reaction.**

Precautionary Statements	P101	**If medical advice is needed, have product container or label at hand.**
	P102	**Keep out of reach of children.**
	P103	**Read label before use.**
	P260	Do not breathe dust/fumes/gas/mist/vapours/spray.
	P261	Avoid breathing vapours.
	P264	Wash hands thoroughly after handling.
	P270	Do not eat drink or smoke when using this product.
	P272	Contaminated work clothing should not be allowed out of the workplace.
	P273	Avoid release to the environment.
	P280	**Wear protective gloves/eye protection.**
	P301+P330+P331	IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
	P330	Rinse mouth.
	P302+P352	IF ON SKIN: Wash with plenty of soap and water.
	P303+P361+P353	**IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.**
	P304+P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
	P305+P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
	P310	Immediately call a POISON CENTER/doctor.
	P312	Call a POISON CENTRE/doctor/ … if you feel unwell.
	P321	Specific treatment (see..on this label)
	P333+P313	If skin irritation or rash occurs: Get medical advice/attention.
	P363	Wash contaminated clothing before reuse.
	P362+P364	Take off contaminated clothing and wash before reuse.
	P405	Store locked up.
	P501	**Dispose of contents/container in accordance with local regulations.**

Only the hazard statements and Precautionary statements in bold text have been included on the label in accordance with the allowed omissions set out in the ECHA Guidance on Labelling and Packaging.

2.3 Other Hazards

None known.

SECTION 3 – COMPOSITION / INFORMATION ON INGREDIENTS

3.2 Mixtures

Hazardous Ingredients	% [weight]	CAS No. EC No. Index No.	SCL, M-Factors, ATE	Classification	H / EUH Code(s)
1,8-diazobicyclo[5.4.0] undec-7-ene	0.5 – 1.5	6674-22-2 229-713-7		Acute Toxicity (oral) – 3 Skin Corrosion – 1B Eye Damage - 1	H301 Toxic if swallowed. H314 Causes severe skin burns and eye damage. H318 Causes serious eye damage.

2,2'-dimethyl-4,4'methylenebis (cyclohexylamine)	4 - 5	6864-37-5 229-962-1 612-110-00-1		Acute Toxicity (oral) – 4 Acute Toxicity (dermal) – 3 Acute Toxicity (inhalation) – 3 Skin Corrosion – 1A Aquatic Toxicity, chronic - 2	H302 Harmful if swallowed. H311 Toxic in contact with skin. H331 Toxic if inhaled. H314 Causes severe skin burns and eye damage. H411 Toxic to aquatic life with long lasting effects.
dicyclohexylcarbodiimide	0.4 – 0.7	538-75-0 208-704-1		Acute Toxicity (oral) – 4 Acute Toxicity (dermal) – 3 Skin Corrosion – 1 Eye Damage – 1	H302 Harmful if swallowed. H311 Toxic in contact with skin. H314 Causes severe skin burns and eye damage. H318 Causes serious eye damage.
2,4,6-tris(dimethylaminomethyl) phenol	25 - 45	90-72-2 202-013-9 603-069-00-0		Acute Toxicity (oral) – 4 Skin Irritant – 2 Eye Irritant - 2	H302 Harmful if swallowed. H315 Causes skin irritation. H319 Causes serious eye irritation.
Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether	45 - 65	72244-98-5 615-735-8		Skin Sensitizer – 1 Aquatic toxicity, chronic – 3	H317 May cause an allergic skin reaction. H412 Harmful to aquatic life with long lasting effects.

SECTION 4 – FIRST AID MEASURES

4.1 Description of First Aid Measures

SKIN Wash contaminated skin with soap and water. Remove contaminated clothing and shoes. Continue to rinse for at least 10 minutes. Get medical attention. In the event of any complaints or symptoms, avoid further exposure. Wash clothing before reuse. Clean shoes thoroughly before reuse.

EYE Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses. Continue to rinse for at least 10 minutes. Get medical attention.

INHALATION Move exposed person to fresh air. Keep person warm and at rest. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to give mouth-to-mouth resuscitation. Get medical attention if adverse health effects persist or are severe. if unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as collar, tie, belt or waistband.

INGESTION Wash out mouth with water. Remove dentures if any. Move exposed person to fresh air. Keep person warm and at rest. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Do not induce vomiting unless directed to do so by medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Get medical attention if adverse health effects persist or are severe. Never give anything by mouth to an unconscious person. If unconscious, place in the recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as collar, tie, belt, or waistband.

4.2 Most important symptoms and effects, both acute and delayed

SKIN Brief contact may cause skin irritation. Symptoms may include pain and local redness. May cause an allergic skin reaction.

EYE Due to the viscous state of the material eye contact is unlikely during normal use. May cause irritation with corneal injury.

INHALATION No relevant data found. At room temperature, exposure to vapour is minimal due to low volatility.

INGESTION Swallowing may result in gastrointestinal irritation or ulceration. Swallowing may result in burns of the mouth and throat.

SECTION 5 – FIRE FIGHTING MEASURES

5.1 Extinguishing Media

SUITABLE Water fog, foam, extinguishing powder, or carbon dioxide.
NOT SUITABLE Do not use water jet.

5.2 Special Hazards arising from the Substance or Mixture

HAZARDS FROM THE SUBSTANCE / MIXTURE Fire water contaminated with this material must be contained and prevented from being discharged to any waterway, sewer or drain.
HAZARDOUS THERMAL DECOMPOSITION PRODUCTS No specific data.

5.3 Advice for Firefighters

SPECIAL PRECAUTIONS FOR FIREFIGHTERS Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training.
SPECIAL PROTECTIVE EQUIPMENT FOR FIRE-FIGHTERS Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode.

SECTION 6 – ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment, and emergency procedures

No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not walk through spilled material. Avoid breathing vapour or mist. Provide adequate ventilation.

6.1.1 For non-emergency personnel

Wear appropriate personal protective equipment. Collect and dispose of as soon as possible.
SKIN General purpose non-permeable gloves and overalls.
FACE / EYES Safety goggles.
CLOTHING No special requirements. Wash clothing thoroughly if contaminated.
VENTILATION If ventilation is poor use a self-contained breathing apparatus suitable for organic vapours.

6.1.2 For emergency personnel

Wear appropriate personal protective equipment. Collect and dispose of as soon as possible.
SKIN General purpose non-permeable gloves and overalls.
FACE / EYES Safety goggles.
CLOTHING No special requirements. Wash clothing thoroughly if contaminated.
VENTILATION If ventilation is poor use a self-contained breathing apparatus suitable for organic vapours.

6.2 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, air). May be harmful to the environment if released in large quantities.

6.3 Method and material for containment and cleaning up

6.3.1 Containment procedure

Due to the viscous nature of the material, containment is not usually necessary. If released into water, immediate collection by a suitably sized scoop is needed.

6.3.2 Clean-up procedure

Small amounts should be cured by mixing the hardener and resin together and then disposed of in accordance with local regulations.
Large amounts would need to be incinerated in accordance with local regulations.

6.3.3 Additional Information

See SECTION 13 for disposal considerations.

6.4 Reference to other sections

See SECTION 13 for disposal considerations.

SECTION 7 – HANDLING AND STORAGE

7.1 Precautions for Safe handling

7.1.1 Recommendations for safe handling and storage

Do not eat, drink, or smoke where this material is stored. Avoid release to the environment. Keep in the original container and keep tightly closed when not in use. Empty containers retain product residue and may be hazardous. Do not reuse containers.

7.1.2 Advice on general occupational hygiene

Put on appropriate personal protective equipment (see SECTION 8). Do not eat, drink, or smoke when working with this material. Wash hands and face before eating, drinking, or smoking. Persons with a history of skin sensitization problems should not use this product. Do not get in eyes. Avoid skin contact as much as possible. Do not ingest. Avoid breathing vapours.

7.2 Conditions for safe storage, including any incompatibilities

Store in accordance with local regulations. Store in the original container protected from sources of ignition or direct sunlight in a dry, cool (10-40°C) and well-ventilated area, away from incompatible materials, food and drink. Keep container tightly closed and sealed until ready to use. Do not store in unlabelled containers. Use appropriate containment to avoid environmental contamination.

Incompatible Materials:	Strong oxidizing agents and acids.
Packaging Material:	Use original container.

7.3 Specific end use(s)

Not applicable.

SECTION 8 – EXPOSURE CONTROL / PERSONAL PROTECTION

8.1 Control Parameters

The DNEL (Derived No-Effect Level) for humans by inhalation, ingestion and dermal routes of exposure and the PNEC (Predicted No-Effect Concentration) for environmental exposure given below are not intended to be directly used for setting workplace or general population exposure limits. Due to differences in calculation methodology the DNEL will tend to be lower (sometimes significantly) than any corresponding health based-OEL for that chemical substance. Further, although DNELs (and PNEC's) are an indication of setting risk measures, it should be recognized that these limits do not have the same regulatory application as officially endorsed government OELs.

DNEL

Ingredient (CAS No,)	**Route of exposure**		**Exposure Limit**	
			Workers	**Consumers**
1,8-diazobicyclo[5.4.0] undec-7-ene **(6674-22-2)**	Oral	ST, local	Not applicable	No data available
		ST, systemic	Not applicable	No hazard identified
		LT, local	Not applicable	No data available
		LT, systemic	Not applicable	1,5 mg/kg bw/day (repeated dose)
	Dermal	ST, local	Medium hazard	Medium hazard (no threshold derived)
		ST, systemic	No hazard identified	No hazard identified
		LT, local	Medium hazard	Medium hazard (no threshold derived)
		LT, systemic	3 mg/kg bw/day (repeated dose)	1,5 mg/kg bw/day (repeated dose)
	Inhalation	ST, local	Medium hazard (no threshold derived)	Medium hazard (no threshold derived)
		ST, systemic	Medium hazard (no threshold derived)	Medium hazard (no threshold derived)
		LT, local	Medium hazard (no threshold derived)	Medium hazard (no threshold derived)
		LT, systemic	10.6 mg/m^3 (repeated dose)	2.6 mg/m^3 (repeated dose)
2,2'-dimethyl-4,4'methylenebis (cyclohexylamine) **(6864-37-5)**	Oral	ST, local	No applicable	No data available
		ST, systemic	Not applicable	Hazard unknown
		LT, local	Not applicable	No data available
		LT, systemic	Not applicable	8 µg/kg bw/day (repeated dose)
	Dermal	ST, local	Medium hazard	Hazard unknown
		ST, systemic	Medium hazard	Hazard unknown
		LT, local	Medium hazard	Hazard unknown
		LT, systemic	50 µg/kg bw/day	Hazard unknown
	Inhalation	ST, local	Medium hazard	Hazard unknown
		ST, systemic	High hazard	Hazard unknown
		LT, local	1 mg/m^3	Hazard unknown
		LT, systemic	600 µg/m3 (repeated dose)	Hazard unknown

Dicyclohexylcarbodiimide **(538-75-0)**	Oral	ST, local	Not applicable	No data available
		ST, systemic	Not applicable	No hazard identified
		LT, local	Not applicable	No data available
		LT, systemic	Not applicable	17 µg/kg bw/day³ (repeated dose)
	Dermal	ST, local	High hazard	High hazard
		ST, systemic	Hazard unknown	Medium hazard
		LT, local	High hazard	High hazard
		LT, systemic	34.28 µg/kg bw/day (carcinogen)	17 µg/kg bw/day³ (repeated dose)
	Inhalation	ST, local	Hazard unknown	Hazard unknown
		ST, systemic	Hazard unknown	Hazard unknown
		LT, local	Hazard unknown	Hazard unknown
		LT, systemic	211.6 µg/m³ (carcinogen)	52.17 µg/m³ (carcinogen)
2,4,6-tris(dimethylaminomethyl) phenol **(90-72-2)**	Oral	ST, local	Not applicable	No data available
		ST, systemic	Not applicable	No hazard identified
		LT, local	Not applicable	No data available
		LT, systemic	Not applicable	75 µg/kg bw/day (repeated dose)
	Dermal	ST, local	Medium hazard	Medium hazard
		ST, systemic	600 µg/kg bw/day (repeated dose)	75 µg/kg bw/day (repeated dose)
		LT, local	Medium hazard	Medium hazard
		LT, systemic	150 µg/kg bw/day (repeated dose)	75 µg/kg bw/day (repeated dose)
	Inhalation	ST, local	Medium hazard	Medium hazard
		ST, systemic	2.1 mg/m³ (repeated dose)	130 µg/m³ (repeated dose)
		LT, local	Medium hazard	Medium hazard
		LT, systemic	530 µg/m³ (repeated dose)	130 µg/m³ (repeated dose)
Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether **(72244-98-5)** *Information for a similar material*	Oral	ST, local	Not applicable	No data available
		ST, systemic	Not applicable	No data available
		LT, local	Not applicable	No data available
		LT, systemic	Not applicable	1.9 mg/kg bw/day (repeated dose)
	Dermal	ST, local	No data available	No data available
		ST, systemic	No data available	No data available
		LT, local	No data available	No data available
		LT, systemic	DNEL: 2.7 mg/kg bw/day	DNEL: 1.61 mg/kg bw/day
	Inhalation	ST, local	No data available	No data available
		ST, systemic	No data available	No data available

		LT, local	No data available	No data available
		LT, systemic	DNEL: 22mg/m^3 (repeated dose)	6.52 mg/m^3 (repeated dose)

PNEC

Fresh water	Freshwater sediments	Marine water	Marine water sediments	Food chain	Sewage treatment	Soil (agricultural)	Air	Intermittent releases
1,8-diazobicyclo[5.4.0]undec-7-ene **(6674-22-2)**								
240 µg/L	1.46 mg/kg dw	24 µg/L	146 µg/kg dw	no potential for bio-accumulation	13 mg/L	152 µg/kg dw	no hazard identified	500 µg/L
2,2'-dimethyl-4,4'methylenebis(cyclohexylamine) **(6864-37-5)**								
100 µg/L	4.34 mg/kg sediment dw	10 µg/L	434 µg/kg sediment dw	556 µg/kg food	1,6 mg/L	4.56 mg/kg soil dw	no hazard identified	46 µg/L
Dicyclohexylcarbodiimide **(538-75-0)**								
170 ng/L	143.62 µg/kg sediment dw	17 ng/L	14.36 µg/kg sediment dw	3.33 mg/kg food	100 µg/L	6.96 µg/kg soil dw	No hazard identifed	1.7 µg/L
2,4,6-tris(dimethylaminomethyl) phenol **(90-72-2)**								
46µg/L	262.1µg/kg dw	4.6µg/L	26.211µg/kg dw	no potential for bio-accumulation	200µg/L	25,4 µg/kg dw	no hazard identified	460µg/L
Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether **(72244-98-5)** *Information for a similar material*								
70 µg/L	322 µg/kg dw	7 µg/L	32 µg/kg dw	no potential for bio-accumulation	10 mg/L	23 µg/kg dw	no hazard identified	120 µg/L

8.2 Exposure Controls

8.2.1 Appropriate engineering controls

None required. Use in a well-ventilated area. If ventilation is poor use a self-contained breathing apparatus.

8.2.2 Personal Protection

Skin General purpose non-permeable gloves and overalls.

Face / Eye Avoid eye contact. Do not touch or rub eyes after contact with product. Wash hands thoroughly with soap and water first.

Inhalation This is unlikely due to the nature of the material. Use outdoors or in a well-ventilated area.

Ingestion Do not eat, drink, or smoke while working with this product. Wash hands thoroughly with soap and water after using this product. Keep away from children.

Thermal None required when used as instructed.

Other Always wash hands with soap and water after use.

8.2.3 Environmental Protection

Avoid release to the environment. Contain and dispose of in accordance with local regulations.

SECTION 9 – PHYSICAL AND CHEMICAL PROPERTIES

9.1 information on physical and chemical properties

Physical State Liquid

Colour	Black
Odour	Like ammonia
Melting point / Freezing point (°C)	No data available.
Boiling point, initial and range (°C)	No data available.
Flammability	Not flammable.
Explosion / Flammability limits	No data available.
Flash point (°C), closed cup	No data available.
Auto-ignition temperature (°C)	No data available.
Decomposition temperature (°C)	No data available.
pH	No data available.
Kinematic Viscosity (at 23°C)	63000 mPa.s
Solubility	No data available. Partially soluble in water.
Partition co-efficient: n-octanol / water	No data available.
Vapour pressure	No data available.
Density and/or Relative density (at 23°C)	1.1 g/cm^3
Relative Vapour density	No data available.
Particle characteristics	No data available.

9.2 Other information

9.2.1 Information with regards to physical Hazard Classes

No additional information available.

9.2.2 Other Safety Characteristics

No additional information available.

SECTION 10 – STABILITY AND REACTIVITY

10.1 Reactivity

Reacts with strong oxidising agents and acids.

10.2 Chemical Stability

Stable under recommended storage conditions.

10.3 Possibility of Hazardous Reactions

Hazardous reactions may occur under certain conditions of storage or use.

10.4 Conditions to Avoid

Exposure to elevated temperatures can cause material to decompose. Reaction with carbon dioxide may form an amine carbamate. Product absorbs carbon dioxide from the air.

10.5 Incompatible Materials

Strong oxidizing agents, acids, acrylates, alcohols, aldehydes, halogenated hydrocarbons, ketones, nitriles and metals such as brass, bronze, copper and copper alloys.

10.6 Hazardous Decomposition Products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

SECTION 11 – TOXOLOGICAL INFORMATION

11.1 Information on Hazard Classes

Ingredient (CAS No.)	Toxicological effect	Findings
1,8-diazobicyclo[5.4.0] undec-7-ene **(6674-22-2)**	Acute Toxicity - oral	LD_{50}, rat: 215 mg/kg bw
	Acute Toxicity - dermal	No data available
	Acute Toxicity - inhalation	No data available
	Skin Corrosion/ Irritation	Corrosive
	Serious Eye Damage/ Irritation	Irreversible damage
	Skin Sensitizer	No data available
	Respiratory Sensitizer	No data available
	Germ Cell Mutagenicity	No data available
	Carcinogenicity	No data available
	Reproductive Toxicity	No data available
	Developmental / Teratogenetic Toxicity	No data available
	STOT - Single Exposure	No data available
	STOT - Repeated Exposure	NOAEL, subchronic, oral, systemic, rat: 20 mg/kg bw/day
	Aspiration Hazard	No data available
2,2'-dimethyl-4,4'methylenebis (cyclohexylamine) **(6864-37-5)**	Acute Toxicity - oral	LD_{50} (rat): 320 mg/kg bw
	Acute Toxicity - dermal	LD_{50} (rabbit): 320 mg/kg bw
	Acute Toxicity - inhalation	LC_{50} (rat): 420 mg/m^3/4H
	Skin Corrosion/ Irritation	Corrosive
	Serious Eye Damage/ Irritation	Irreversible damage
	Skin Sensitizer	No adverse effects observed
	Respiratory Sensitizer	No data available

	Germ Cell Mutagenicity	InVitro - No adverse effects observed
	Carcinogenicity	No data available
	Reproductive Toxicity	NOAEL (subchronic, rat): 1.5 mg/kg bw/day
	Developmental / Teratogenetic Toxicity	NOEL (subchronic, rabbit):9 mg/kg bw/day
	STOT - Single Exposure	No data available
	STOT - Repeated Exposure	NOAEL, oral (subchronic) 1.5 mg/kg bw/day (systemic effects) NOAEC, inhalation (subchronic) 12 mg/m³ (local and systemic effects)
	Aspiration Hazard	No data available
Dicyclohexylcarbodiimide **(538-75-0)**	Acute Toxicity - oral	LD_{50} Oral (rat): 1100 mg/kg bw/day
	Acute Toxicity - dermal	No data available
	Acute Toxicity - inhalation	LC_{50} (rat) 159mg/L/4H
	Skin Corrosion/ Irritation	No adverse effects observed
	Serious Eye Damage/ Irritation	Irreversible damage
	Skin Sensitizer	Adverse effects observed
	Respiratory Sensitizer	No data available
	Germ Cell Mutagenicity	InVitro & InVivo - no adverse effects observed
	Carcinogenicity	No data available
	Reproductive Toxicity	NOEL (rat, subacute, oral): 40mg/kg bw/day
	Developmental / Teratogenetic Toxicity	No data available
	STOT - Single Exposure	No data available
	STOT - Repeated Exposure	NOAEL, oral (rat, subacute): 100 mg/kg bw/day NOAEL, dermal (rabbit, subchronic): 3 mg/kg bw/day
	Aspiration Hazard	No data available
2,4,6-tris(dimethylaminomethyl) phenol **(90-72-2)**	Acute Toxicity - oral	LD_{50} Oral (rat): 2169 mg/kg bw/day
	Acute Toxicity - dermal	No data available
	Acute Toxicity - inhalation	No data available
	Skin Corrosion/ Irritation	Corrosive
	Serious Eye Damage/ Irritation	Irreversible damage

	Skin Sensitizer	No adverse effects observed
	Respiratory Sensitizer	No data available
	Germ Cell Mutagenicity	InVitro - No adverse effects observed
	Carcinogenicity	No data available
	Reproductive Toxicity	NOAEL (rat, subchronic): 150 mg/kg bw/day
	Developmental / Teratogenetic Toxicity	No data available
	STOT - Single Exposure	No data available
	STOT - Repeated Exposure	NOAEL (rt, subchronic): 15 mg/kg bw/day
	Aspiration Hazard	No data available
Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether **(72244-98-5)**	Acute Toxicity - oral	LD_{50} 2600 mg/kg bw/day as per OECD 401, rat.
	Acute Toxicity - dermal	LD_{50} >10200 mg/kg bw/day as per OECD 402, rabbit.
	Acute Toxicity - inhalation	LC_{50} (rat) >0,1mg/L air.
	Skin Corrosion/ Irritation	Not irritating as per OECD 404, rabbit.
	Serious Eye Damage/ Irritation	Not irritating as per OECD 405, rabbit.
	Skin Sensitizer	>3 LLNA, EC3 = 29% as per OECD 429, mouse
	Respiratory Sensitizer	Not sensitizing.
	Germ Cell Mutagenicity	Negative as per OECD 471 (Ames), OECD 473 (Chromosome aberration), and OECD 476 (Micronucleaus).
	Carcinogenicity	Not classifiable.
	Reproductive Toxicity	Not expected to cause reproductive or developmental effects.
	Developmental / Teratogenetic Toxicity	No data available.
	STOT - Single Exposure	No data available.
	STOT - Repeated Exposure	No data available.
	Aspiration Hazard	No data available.

11.2 Information on Other Hazards

11.2.1 Endocrine Disrupting Properties

None of the ingredients in this product are listed as an endocrine disruptor on EDL List I (identified), List II (under evaluation for), or List III (has ED properties).

11.2.2 Other Information

No additional information available.

SECTION 12 – ECOLOGICAL INFORMATION

12.1 Toxicity

Classified as Aquatic Toxicity – Chronic category 3 based on >25% 10 × Category 2 ingredients.
Please see Section 8.1 for PNECs on individual ingredients.

12.2 Persistance and Biodegradability

No data available for the mixture.

1,8-diazobicyclo[5.4.0] undec-7-ene **(6674-22-2)**	Under test conditions no biodegradation observed (100%)
2,2'-dimethyl-4,4'methylenebis (cyclohexylamine) **(6864-37-5)**	Not biodegradable (100%) (freshwater)
Dicyclohexylcarbodiimide **(538-75-0)**	Under test conditions no biodegradation observed
2,4,6-tris(dimethylaminomethyl) phenol **(90-72-2)**	Not biodegradable (100%) (freshwater)
Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether **(72244-98-5)** Information for a similar material	Under test conditions no biodegradation observed

12.3 Bioaccumulative Potential

No data available for the mixture.

1,8-diazobicyclo[5.4.0] undec-7-ene **(6674-22-2)**	No data available.
2,2'-dimethyl-4,4'methylenebis (cyclohexylamine) **(6864-37-5)**	Does not significantly accumulate in organisms.
Dicyclohexylcarbodiimide **(538-75-0)**	BCF (aquatic species) 2.2 L/kg ww
2,4,6-tris(dimethylaminomethyl) phenol **(90-72-2)**	No data available.
Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether **(72244-98-5)** Information for a similar material	BCF (aquatic species): 3.16 L/kg ww

12.4 Mobility in Soil

Not mobile in soil.

12.5 Results of PBT and vPvB assessment

No PBT or vPvB assessment has been carried out

12.6 Endocrine Disrupting Properties

This substance does not have endocrine disrupting properties with respect to human or non-target organisms as it does not meet the criteria set out in Section A or B of Regulation (EU) No 2017/2100.

12.7 Other Adverse Effects

None known.

SECTION 13 – DISPOSAL CONSIDERATIONS

13.1 Waste Treatment Methods

The generation of waste should be avoided or minimized wherever possible. Empty containers or liners may retain some product residues. This material (uncured) and its container must be disposed of in a safe way.

Small amounts (during personal use) React the resin and hardener portions together and once cured, dispose of in accordance with local regulations.
Large amounts Contain and dispose of in accordance with local regulations. Mixing large amounts of resin and hardener together creates an exothermic reaction and care should be taken to avoid uncontrolled heating and possible fire.
EWC 20 01 27 MUNICIPAL WASTES (HOUSEHOLD WASTE AND SIMILAR COMMERCIAL, INDUSTRIAL AND INSTITUTIONAL WASTES) INCLUDING SEPARATELY COLLECTED FRACTIONS: separately collected fractions: paint, inks, adhesives and resins containing dangerous substances
EWC (cured) 20 01 28 MUNICIPAL WASTES (HOUSEHOLD WASTE AND SIMILAR COMMERCIAL, INDUSTRIAL AND INSTITUTIONAL WASTES) INCLUDING SEPARATELY COLLECTED FRACTIONS: separately collected fractions: paint, inks, adhesives and resins other than those mentioned in 20 01 27

SECTION 14 – TRANSPORT INFORMATION

	14.1 UN Number	14.2 UN Proper Shipping Name	14.3 Transport Hazard Class	14.4 Packing Group
ADR	UN2735	AMINES, LIQUID, CORROSIVE, N.O.S. contains 2,2'-dimethyl 4,4'methylenebis(cyclohexylamine)	8	II
RID	UN2735	AMINES, LIQUID, CORROSIVE, N.O.S. contains 2,2'-dimethyl-4,4'methylenebis(cyclohexylamine)	8	II
ADN	UN2735	AMINES, LIQUID, CORROSIVE, N.O.S. contains 2,2'-dimethyl-4,4'methylenebis(cyclohexylamine)	8	II
IMO/IMDG	UN2735	AMINES, LIQUID, CORROSIVE, N.O.S. contains 2,2'-dimethyl-4,4'methylenebis(cyclohexylamine)	8	II
ICAO/IATA	UN2735	AMINES, LIQUID, CORROSIVE, N.O.S. contains 2,2'-dimethyl-4,4'methylenebis(cyclohexylamine)	8	II

14.5 Environmental Hazards

Not classified as hazardous for transport.

14.6 Special Precautions for User

None known.

14.7 Maritime Transport in Bulk According to IMO instruments

Not applicable as never transported in bulk.

SECTION 15 – REGULATORY INFORMATION

15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture

REACH EC1907/2006 Annex XIII, XIV, XVII The substance(s) in this product are not listed / not subject to restrictions.
International Agency for Research on Cancer (IARC) The substance(s) in this product are not listed / not subject to restrictions.
Australia Inventory of Industrial Chemicals (AIIC) The substance(s) in this product are listed.
New Zealand Inventory (NZIoC) The substance(s) in this product are listed.
Canada Domestic Substances List (DSL) / Non-Domestic Substance List (NDSL) The substance(s) in this product are listed.
United States Inventory (TSCA 8b)
California Proposition 65 The substance(s) in this product are not listed / not subject to restrictions.
Consolidated List of Chemicals Subject to the Emergency Planning and Community Right-to-Know Act (EPCRA), Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) and Section 112(r) of the Clean Air Act (CAA) The substance(s) in this product are not listed / not subject to restrictions.

15.2 Chemical Safety Assessment

Not yet done.

SECTION 16 – OTHER INFORMATION

Alternative names used on consumer packaging:

CAS No.	Ingredient Name (IUPAC)	Name used on Consumer Packaging
6674-22-2	1,8-diazobicyclo[5.4.0]undec-7-ene	DBU
6864-37-5	2,2'-dimethyl-4,4'methylenebis(cyclohexylamine	Bis(4-amino-3-methylcyclohexyl)methane
538-75-0	dicyclohexylcarbodiimide	DCCI
90-72-2	2,4,6-tris(dimethylaminomethyl) phenol	TDMA-Methylphenol
72244-98-5	Poly[oxy(methyl-1,2-ethanediyl)], .alpha.-hydro-.omega.-hydroxy-, ether with 2,2-bis(hydroxymethyl)-1,3-propanediol (4:1), 2-hydroxy-3-mercaptopropylether	Polymercaptan

Changes from previous version:

Date changed	Section	Changes
2024.09.23	1.1	Removed 97004 as packaging type no longer sold
	8.1, 9.1, 12.2, 12.3	More information on ingredients
	11.2.1	2,2'-dimethyl-4,4'methylenebis(cyclohexylamine has been evaluated and found to not be an endocrine disruptor
2022.09.30	14	UN hazard classification does not include category 3 for environmental hazards. Should be UN 2735 and not UN1760.
2022.04.08	1, 2, 3, 9, 11, 12, 14	Major changes to comply with updated Regulation (EU) 2020/878 as well as formulation changes. Separate SDS for Resin and Hardener.
2021.03.18	2, 3, 8, 11	Re-evaluated hazard after additional training.

2, 3, 11	Separated hardener and resin classification. (The label on the pack will combine the information for both parts)
1	Confirmed emergency contact details.
15	Confirmed regulatory information and added information for several regulations.
16	Added list of abbreviations used.

Abbreviations used:

ADN	European Agreement concerning the International Carriage of Dangerous Goods on Inland Waterways
ADR	European Agreement concerning the International Carriage of Dangerous Goods by Road
ATE	Acute Toxicity Estimate
CAS No.	Chemical Abstract Services Number
DNEL	Derived no-effect level
EC3	Effective concentration required to produce a three-fold increase in the stimulation index
EC No.	European Community Number
ECHA	European Chemicals Agency
EWC	European Waste Code
GCL	Generic concentration limit
GLP	Good Laboratory Practice
HSNO	Hazardous Substances and New Organisms Act
IATA	International Air Transport Association
IBC	International Bulk Container
ICAO	International Civil Aviation Authority
IMDG	International Maritime Dangerous Goods
IMO	International Maritime Organization
LD50	Lethal dose to 50% of test population
LLNA	Local lymph node assay
LT	Long term
mg/kg bw	milligrams per kilogram of body weight
mg/kg dwt	milligrams per kilogram dry weight
NOAEL	No observed adverse effect level
OECD	Organisation for Economic Co-operation and Development
OEL	Occupational Exposure Limit
PBT	Persistant, Bioaccumulative and Toxic
PNEC	Predicted no-effect concentration
RID	European Agreements Concerning the International Carriage of Dangerous Goods by Rail
SCBA	Self contained breathing apparatus
SCL	Specific Concentration Limit
ST	Short term
STOT-SE	Specific target Organ Toxicity - Single Exposure
UN	United Nations
vPvB	very Persistant and very Bioaccumulative