



## 8910 Epoxy Coating System

### DESCRIPTION:

**8910 Epoxy Coating System** is a high solids, high build epoxy resin coating formulated for long work time and ease of use. It provides a hard wearing surface suitable for foot and rubber-tyred vehicles.

**8910 Epoxy Coating System** is available in both the standard **Epoxy Bisphenol A** type and the new generation of low viscosity **Epoxy Novolacs**. Novolacs are a high performance resins suitable for coatings that require increased chemical and heat resistance over the traditional epoxy types. Such applications are chemical and food processing areas where concrete surfaces require increased protection against a wide variety of solvents, alkalis and acid solutions.

**8910 Epoxy Coating System** can be applied using the 'spread and sprinkle' technique to produce non-slip surfaces for maximum safety. The product is easily applied by roller or brush, and is available in a wide range of colours. When cured 8910 is vapour proof and does not support bacterial growth and is readily cleaned. This product meets the requirements of AS4020 for potable water.

### APPLICATION DATA:

8910 should not be applied to surfaces subject to rising damp or have moisture content higher than 4%. The surface must be free from oils, chemicals and any other material that may affect the adhesion such as concrete curing membranes. Cement based substrates should be at least 21 days old.

8910-CS and 8910-SHS should be mixed at low speed, thoroughly for 3 minutes. Allowing the paint to develop heat in the mixing container to above 18 °c in cold weather will assist in speeding the cure on the floor. Do not thin, as this may have adverse affects on cured film properties.

### APPLICATION PRECAUTIONS:

High atmospheric humidity or drops in 4 °c temperature around dew point may result in condensation on the uncured film causing changes in the film surface. This is commonly known as whitening or blooming. This effect may cause loss of intercoat adhesion. In these conditions good adhesion may be obtained by re-roughening the surface.

Although the coating cures at colder temperatures, the extended gel times may make the resultant film susceptible to water spotting. Maximum relative humidity during cure should not exceed 85%. The cure film must be protected from condensation and water for at least 1 week at 20 °c.

**8910 Epoxy Novolac** is not recommended for permanent immersion with harsh chemicals  
8910 is flammable. Good ventilation must be available at all times. Consult MSDS.  
8910 will yellow and loose gloss on direct exposure to sun light.

### TECHNICAL DATA:

Mix Ratio	3 Parts 8910-CS to 1 Part 8910-SHS by Volume
Density kg/lt	Part 8910-CS 1.73
	Part 8910-SHS 1.00
Solids Content Volume approx	88%
PotLife 20 °c	1 hour
Coverage	1 litre covers 4.25m <sup>2</sup> at 200 micron dry film build (Theoretical)
Hardeners Temperature range	HS Tropical 25 – 35 °c



	ECO8910a2A 15 - 25 °c
	ECO8910a1A 5 - 15 °c
	HS Novolac Part 8910-SHS 5 - 35 °c To be used only with HS Novolac Part 8910-CS
Application Temperature	5 °c to 35 °c
Maximum recoat time	18 hours 20 °c
Cure Times (HS Standard)	Tack Free 5.5 – 6.0 hours
	Light Traffic 48 hours
	Full Cure 7 Days
Number of coats	2 for 400 microns dry film build
DG Transport/Storage	Flammable Paint UN 1263 Part 8910-CS
	Corrosive Liquid UN 1760 Part 8910-SHS

**COMBINED MATERIAL SAFETY DATA SHEET**  
**PRODUCT NAME: 8910-CS**

Hazardous according to criteria of Worksafe Australia

**Description:** Paint (Pigmented Epoxy resin and Xylene)

**Manufacturer's Code:** F286  
**Hazchem Code:** 3[Y]  
**Poisons Schedule:** 5

**U.N. Number:** 1263  
**Dangerous Goods Class 3**  
**Risk:** Flammable



**USE:** In conjunction with epoxy hardeners for protection of concrete

**PHYSICAL DATA:**

PHYSICAL DATA:

**Appearance:** Coloured  
**Specific Gravity:** 1.70  
**Flash Point:** 24 Deg C PMCC  
**Odour:** Xylene

**Percent Volatile:** 10%  
**Flammability Limits:** N/A  
**Auto Ignition:** Not Determined  
**Boiling Point:** Not Determined

HAZARDOUS INGREDIENTS: Standard Grade:

Chemical Entity	C.A.S. No.	Haz	R-phrases	Concentration
Bisphenol A epoxy resin	025085-99-8	Xi	R36/38-R43	30% - 45%
Inert filler	014808-60-7	Xn	R48/20	> 30%
Xylene	001330-20-7	F	R10-20/21-38	5% - 10%
Non-hazardous ingredients or those below cut off limits				to 100%

HAZARDOUS INGREDIENTS: Novolac Grade:

Chemical Entity	C.A.S. No.	Haz	R-phrases	Concentration
Epoxy Novolac resin	028064-14-4	Xi	R36/38-R43	30% - 45%
Inert filler	014808-60-7	Xn	R48/20	> 30%
Xylene	001330-20-7	F	R10-20/21-38	5% - 10%
Non-hazardous ingredients or those below cut off limits				to 100%



**HEALTH HAZARD INFORMATION**

**HEALTH EFFECTS:**

**Short Term Hazards (Acute Exposure):**

**Inhaled:** May cause irritation to the nose, throat and respiratory system with effects including: Dizziness, headache and loss of co-ordination.

**Skin Contact:** A single prolonged exposure is not likely to result in the material being absorbed through the skin in harmful amounts.

**Eye Contact:** May cause slight transient (temporary) eye irritation. Corneal injury is unlikely.

**Swallowed:** May cause irritation to mouth, throat and stomach with effects including irritation to the tongue and lips and pains in the stomach.

**Long Term Hazards (Chronic Exposure):**

**Inhaled:** Prolonged exposure to high concentrations of vapour may affect the central nervous system.

**Skin Contact:** Product may be a skin sensitizer in some individuals.

**Eye Contact:** Corneal injury.

**Systematic and other effects:** Diglycidyl ether of Bisphenol A (Base epoxy resin) that is representative of the current manufacturing process is not believed to be a cancer hazard to humans. Did not cause birth defects or other adverse effects on the foetus when pregnant rabbits were exposed by skin contact, the most likely route of exposure. Results of mutagenicity tests in animals have been negative. Has been shown to be negative in some "in vitro" (test tube) mutagenicity tests and positive in others.

**FIRST AID:**

**Inhaled:** If effects occur, remove to fresh air. Seek Medical attention.

**Skin Contact:** Wash skin thoroughly with soap and flowing water for 15 minutes. **DO NOT** use solvents to remove product from skin. It is recommended to remove contaminated clothing immediately. Wash clothing thoroughly before re-use. Discard contaminated footwear.

**Eye Contact:** Hold eyes open and wash thoroughly with flowing water for 15 minutes. Seek prompt medical attention by a doctor.

**Swallowed:** Do **NOT** induce vomiting. Give glass of water. Call a doctor and/or transport to a hospital promptly.

**Advise to doctor:**

No specific antidote. Supportive care. Treatment based on the judgement of the doctor in response to the reactions of the patient. Treat symptomatically.

**PRECAUTIONS FOR USE**

<b>Exposure limits:</b>	Xylene	TWA 80 ppm	350 mg.m <sup>3</sup>
		STEL 150 ppm	655 mg.m <sup>3</sup>
	Silica	0.3 mg / m <sup>3</sup>	

**Ventilation:** Provide general and / or local exhaust Ventilation, depending on type of operations, to control airborne exposures.

**PERSONAL PROTECTION:**

**Respiratory:** Not required for normal operations. For emergency conditions, use an approved positive pressure self-contained breathing apparatus.

**Hands:** Wear body-covering clothing. Protect hands with impervious gloves when handling or using this product. Wear boots.

**Eyes:** Wear chemical goggles. Eye wash facilities should be located in the immediate work area.

Selection and the use of personal protective equipment should be in accordance with the recommendations in one or more of the relevant Australian Standards, including:

AS 1336:	Recommended practices for eye protection in the industrial environment.
AS/NZS 1337:	Eye protectors for industrial application.
AS/NZS 1715:	Selection, use and maintenance of respiratory protective devices.
AS 2161:	Industrial safety gloves and mittens (excluding electrical and medical gloves).
AS/NZS 2210:	Occupational protective footwear.
AS 2919:	Industrial clothing.

**FLAMMABILITY:**

Flammable liquid. Will support combustion.



**SAFE HANDLING INFORMATION**

**REGULATORY INFORMATION**

<b>Risk Phrases:</b>	R10	Flammable
	R20/21	Harmful by inhalation and in skin contact
	R36/37/38	Irritating to eyes, respiratory system and skin
	R43	May cause sensitisation by skin contact
	R48/20	Dangerous of serious damage to health through prolonged inhalation of sanding dust

<b>Safety Phrases:</b>	S16	Keep away from sources of ignition - No smoking
	S24/25	Avoid contact with skin and eyes
	S23	Do not breathe dust when sanding
	S29	Do not empty into drains.
	S36/37/39	Wear suitable protective clothing, gloves and eye face protection.
	S38	If insufficient ventilation use suitable respiratory equipment.

**STORAGE AND TRANSPORT**

**Storage:** Store in cool place away from heat and ignition sources. Keep partially used product containers closed. Store away from foodstuffs, clothing and keep out of reach of children. Store away from amines.

**Transport Information**

Dangerous Goods Class	3
Shipping Name	PAINT OR PAINT RELATED MATERIAL
UN.Number	1263 (Contains Liquid Epoxy Resins and Xylene)
Packing Group	III
Emergency Procedure Guide	3C1

**SPILLS AND DISPOSAL**

Soak up in an absorbent material, such as sand, sawdust or absorbent clay. Place in secure container for disposal. Burn in an adequate incinerator or bury in an approved landfill in accordance with State and/or Local government regulations.

**FIRE/EXPLOSION HAZARD**

Extinguish with foam, water, dry chemical or carbon dioxide. Drums may rupture when exposed to fire conditions. Wear positive pressure self-contained breathing apparatus. Decomposition products include phenolics, carbon monoxide and water.

**MATERIAL SAFETY DATA SHEET**

**PRODUCT NAME: 8910-SHS**

Hazardous according to criteria of Worksafe Australia

**Description:** Formulated polyamine adduct.

**Manufacturer's Code:** F259

**Hazchem Code:** 2X

**Poisons Schedule:** 5

**U.N. Number:** 1760

**Dangerous Goods Class:** 8

**Risk:** Corrosive



**USE:** CURING AGENT FOR 8910EPOXY PAINT PART A STANDARD AND NOVOLAC

**PHYSICAL DESCRIPTION/PROPERTIES:**

**PHYSICAL DATA**



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编号: ECO8910a1~2A

**Appearance:** Clear liquid  
**Specific Gravity:** 1.00- 1.06  
**Flash Point:** 112 Deg C PMCC  
**Odour:** Slightly ammoniacal

**Percent Volatile:** < 1%  
**Flammability Limits:** Not.Det  
**Auto Ignition:** Not Determined  
**Boiling Point:** Not Determined

### HAZARDOUS INGREDIENTS:

Chemical Entity	C.A.S. No.	Haz	R-phrases	Concentration
Isophorone Diamine	002855-13-2	C	R21/22-R34-R43	20% - 40%
M-Xylene diamine	001477-55-0	C	R20/22-R34	5% - 30%
Benzyl Alcohol	000100-51-6	Xn	R20/22	30% - 50%
Non-hazardous ingredients or those below cut off limits				to 100%

### **HEALTH HAZARD INFORMATION**

#### HEALTH EFFECTS: Short Term Hazards (Acute Exposure):

**Inhaled:** Not expected to be an inhalation hazard by this route, due to the low vapour pressures of the components at ambient temperatures.

**Skin Contact:** May cause severe irritation and possibly burns.

**Eye Contact:** Based on data available for the components of this product, eye contact may result in severe eye irritation and corneal injury, which may be permanent.

**Swallowed:** Single dose oral toxicity has not been determined for this formulation. Single dose oral toxicity is expected to be low, based on information available for each item.

#### HEALTH EFFECTS: Long Term Hazards (Chronic):

**Inhaled:** Prolonged exposure to high concentrations of vapour may affect the central nervous system.

**Skin Contact:** Product will cause severe irritation and burns.

Product may be a skin sensitiser in some individuals.

**Eye Contact:** Corneal injury.

**Swallowed:** Product may cause severe irritation and burns to the digestive tract.

#### FIRST AID:

**Inhaled:** If effects occur, remove to fresh air. Seek Medical attention.

**Skin Contact:** Wash skin thoroughly with soap and flowing water for 15 minutes. **DO NOT** use solvents to remove product from skin. It is recommended to remove contaminated clothing immediately. Wash clothing thoroughly before re-use. Discard contaminated footwear. Obtain medical attention promptly.

**Eye Contact:** Hold eyes open and wash thoroughly with flowing water for 15 minutes. Seek prompt medical attention by a doctor.

**Swallowed:** Do **NOT** induce vomiting. Give glass of water. Call a doctor and/or transport to a hospital promptly.

**Advice to doctor:** Main ingredient of this formulation is corrosive to tissue. If product in eyes, check for corneal injury. The decision of whether to induce vomiting should be made by the attending physician. If burn present, suggest treatment as a thermal burn after decontamination. Human effects not established for this product. No specific antidote. Treatment based on the sound judgement of the physician and the individual reactions of the patient.

### **PRECAUTIONS FOR USE**

**Exposure Limits:** Not established for product or individual components.

**Ventilation:** Provide general and / or local exhaust ventilation, depending on type of operations, to control airborne exposures.

#### PERSONAL PROTECTION:

**Respiratory:** Not required for normal operations. For emergency conditions, use an approved positive pressure self-contained breathing apparatus.

**Hands:** Wear body-covering clothing. Protect hands with impervious gloves when handling or using this product. Wear boots.

**Eyes:** Wear chemical goggles. Eye wash facilities should be located in the immediate work area.

Selection and the use of personal protective equipment should be in accordance with the recommendations in one or more of the relevant Australian Standards, including:



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## 米德(中国)复合材料有限公司

编号: ECO8910a1~2A

AS 1336:	Recommended practices for eye protection in the industrial environment.
AS/NZS 1337:	Eye protectors for industrial application.
AS/NZS 1715:	Selection, use and maintenance of respiratory protective devices.
AS 2161:	Industrial safety gloves and mittens (excluding electrical and medical gloves).
AS/NZS 2210:	Occupational protective footwear.
AS 2919:	Industrial clothing.

### FLAMMABILITY:

Non-Flammable liquid. Will support combustion.

### SAFE HANDLING INFORMATION

#### REGULATORY INFORMATION

<b>Risk Phrases:</b>	R20/21/22	Harmful by inhalation, in contact with skin and if swallowed.
	R34	Causes burns
	R43	May cause sensitisation by skin contact
<b>Safety Phrases:</b>	S24/25	Avoid contact with skin and eyes.
	S26	In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.
	S36/37/39	Wear suitable protective clothing, gloves and eye face protection.
	S38	In case of insufficient ventilation, wear suitable respiratory equipment.
	S45	In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible)

#### STORAGE AND TRANSPORT

**Storage:** Store in cool place away from heat and ignition sources. Keep partially used product containers closed. Store away from foodstuffs, clothing and keep out of reach of children.

**Transport:**

Substance Name: CORROSIVE LIQUID, N.O.S.  
UN.Number 1760 Class 8 HazChem 2X Packing Group III EPG 8A1

#### SPILLS AND DISPOSAL:

Soak up in an absorbent material, such as sand, sawdust or absorbent clay. Place in secure container for disposal. Burn in an adequate incinerator or bury in an approved landfill in accordance with State and/or Local government regulations.

#### FIRE/EXPLOSION HAZARD:

Extinguish with foam, water, dry chemical or carbon dioxide. Drums may rupture when exposed to fire conditions. Ammonia is a product of decomposition. Wear positive pressure self-contained breathing apparatus. The amine type component of this product will decompose at temperatures above 260 Deg C and generate ammonia.

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#### IMPORTANT NOTE:

**Data quoted is typical for the product, but does not constitute a specification, and is based on the most accurate information available to MID (Tianjin) at the time of writing. All information contained herein is given in good faith, but is subject to change without notice.**