



# Material SAFETY DATA SHEET

## Strongcoat CR402 - Hardener

### 1: PRODUCT AND COMPANY IDENTIFICATION

Product Name: **Strongcoat ZR471 - Hardener**

Description: Hardener component of two part high chemical resistant solvent free epoxy protective coating for concrete and metal

Manufacturer: **Don Construction Chemicals India LTD**  
Tel. +914426185340/41/42  
[www.dcp-int.com](http://www.dcp-int.com)

Date Prepared: 23.10.2013

MSDS Number: DCP-IND/06/03-H

### 2: COMPOSITION / INFORMATION ON INGREDIENTS

Composition: Polyamine adducts plasticizer, and aromatic solvent.

Hazardous Ingredient(s)	Symbol	Risk Phrases	CAS No.	%
Methylene Dianiline	T, Xn, N	R23/24/25, 39, 43, 48, 51/53	101-77-9	15 - 60
Epoxy resin	Xi, N	R36/38, 43, 51/53	25068-38-6	15 - 50
1,2-Epoxy-3-Phenoxypropane	T, Xn, N	R20, 37/38, 43, 45, R52/53, 68	122-60-1	8 - 15

Refer to Section 8 for Occupational Exposure Limits.

### 3: HAZARDS IDENTIFICATION

Hazard Information: Toxic by inhalation, in contact with skin and if swallowed.  
Danger of very serious irreversible effects.  
May cause cancer.  
Danger of serious damage to health by prolonged exposure.  
Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Classification: T, Xn, N. R23/24/25, R39, 45, 48, 51/53



#### **4: FIRST AID MEASURES**

Eyes:	Irrigate immediately with copious quantities of water for 15 minutes. Obtain medical attention immediately.
Skin:	Wash immediately with soap and water or suitable skin cleanser for 10 minutes or longer. Remove contaminated clothes and shoes. Transfer to hospital if there are burns or symptoms of poisoning.
Inhalation:	Remove casualty from exposure ensuring one's own safety whilst doing so. If unconscious, check for breathing and apply artificial respiration if necessary. If unconscious and breathing is OK, place in the recovery position. If conscious, ensure the casualty sits or lies down. If breathing becomes bubbly, have the casualty sit and provide oxygen if available. Transfer to hospital as soon as possible.
Ingestion:	Do not induce vomiting. If conscious, give 1 pint of water to drink immediately. If unconscious, check for breathing and apply artificial respiration if necessary. If unconscious and breathing is OK, place in the recovery position. Transfer to hospital as soon as possible.

#### **5: FIRE FIGHTING MEASURES**

Extinguishing Media:	Carbon dioxide, powder, foam.
Personal Protective Equipment:	Self-contained breathing apparatus. Standard aluminized suit.
Special Exposure Hazards:	Toxic fumes. Nitrogen and carbon oxides.

#### **6: ACCIDENTAL RELEASE MEASURES**

Personal Precautions:	Immediately issue NO SMOKING and NO NAKED FLAMES warnings. Wear suitable protective clothing, gloves and eye/face protection.
Environmental Precautions:	Prevent entry into drains, sewers and water courses.
Decontamination Procedures:	Soak up with inert absorbent like sand. Gather into labeled containers. Dispose off as applicable regulations.

#### **7: HANDLING AND STORAGE**

Handling:	Maintain good standards of personal hygiene. Avoid skin and eye contact. Do not eat, drink or smoke whilst using this product. Ensure adequate ventilation. In case of insufficient ventilation, wear suitable respiratory equipment.
Storage:	Keep container tightly closed in a cool dry area away from sources of heat and out of direct sunlight to avoid pressure build up. Store in conformity with local fire regulations.

## 8: EXPOSURE CONTROLS AND PERSONAL PROTECTION

Eye Protection:	Tightly sealed safety glasses/goggles.
Skin Protection:	Impervious gloves (e.g. PVC). Suitable protective clothing.
Respiratory Protection:	Breathing filters apparatus.
Hygiene Measures:	Change contaminated clothing and clean before re-use.
Engineering Controls:	Use only in well ventilated area. Local exhaust ventilation is recommended.

## 9: PHYSICAL AND CHEMICAL PROPERTIES

Form:	Liquid
Colour:	Yellowish to brown
Odour:	Light
pH (concentrate):	Not applicable
Boiling Point (°C) :	Not applicable
Flash Point (closed cup) (°C):	Not applicable
Autoflammability (°C):	Not applicable
Explosive Properties (%):	Not applicable
Relative Density (@25°C):	1.05 – 1.15
Water Solubility:	Insoluble

## 10: STABILITY AND REACTIVITY

Stability:	Stable under normal conditions.
Conditions to Avoid:	Humidity, elevated temperatures
Chemical Incompatibility:	Strong acids. Strong alkalis. Strong oxidizing agents.
Hazardous Decomposition Products:	Thermal decomposition yield oxides of carbon, nitrogen compounds.



## 11: TOXICOLOGICAL INFORMATION

The following toxicological assessment is based on knowledge of the toxicity of the product's components.

Expected oral LD50, rat > 1665 mg/kg.

Classified as skin sensitizer.

### Health Effects

On Eyes:	Irritant.
On Skin:	May cause sensitization.
By Inhalation:	Harmful by inhalation. May cause respiratory irritation.
By Ingestion:	Harmful if swallowed. May cause irritation of mouth, throat and digestive tract. Ingestion of significant amounts may result in severe systemic effects.
Chronic:	Repeated and prolonged skin contact will result in severe irritation leading to burns.

## 12: ECOLOGICAL INFORMATION

Environmental Assessment:	When used and disposed as intended, no adverse environmental effects are foreseen.
Mobility:	Mobile liquid containing volatile compounds. Partially soluble in water.
Degradability:	Not readily biodegradable.
Bioaccumulation:	Not Known.
Acute Fish Toxicity:	Expected to be ecotoxic to fish/daphnia/algae.

## 13: DISPOSAL CONSIDERATION

Disposal must be in accordance with local and national legislation.

Unused Product:	Classified as a special waste. May be reacted with base component to give an inert polymeric material.
Used/ Contaminated Product:	Classified as a special waste. Dispose off through an authorized waste contractor to a licensed site.
Packaging:	Must be disposed off through an authorized waste contractor.

## 14: TRANSPORT INFORMATION



UN Number: 2810

Transport Name: Toxic liquid, Organic, n.o.s.

Transport Type:		Class:	Pack Group:	Marine Pollutant
At Sea	IMO	6.1	III	No
Air Transport	IATA/ICAO	6.1	III	
At land	RID/ADR	6.1	III	

## 15: REGULATORY INFORMATION

### Hazard Label Data:

**N**



**Dangerous for the environment**

**T**



**Toxic**

UN Number:

2810

Risk Phrases:

R23/24/25	Toxic by inhalation, in contact with skin and if swallowed.
R39	Danger of very serious irreversible effects.
R45	May cause cancer.
R48	Danger of serious damage to health by prolonged exposure.
R51/53	Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

Safety Phrases:

S24/25	Avoid contact with skin and eyes.
S37	Wear suitable gloves.
S45	In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).

## 16: OTHER INFORMATION

Issue Date:

23/10/2013

Revised Date:

Disclaimer:

The information contained herein is derived from the best available sources and is believed to be accurate. However, no guarantee is expressed or implied regarding the accuracy of the data given in the use of this product.