

**CAMLEY STREET BRIDGE**

**KINGS CROSS CENTRAL**

**Applied Landscape Design**

**Materials Tracker to Discharge:**

Reserved matter conditions 6b  
Camley Street Bridge  
Kings Cross Central 2016/0288/P

<b>ALD Project Ref:</b>	697
<b>Document Ref:</b>	ALD697_RP902
<b>Document Revision:</b>	P01
<b>Current Issue Date:</b>	13.02.2017
<b>ALD working date:</b>	13.02.2017
<b>Reason For Issue:</b>	Approval

---

**Prepared By:** Applied Landscape Design Ltd  
Landscape Architect

**Client:** Carillion



## INTRODUCTION




**This document has been prepared to discharge the following planning conditions as highlighted below:**

Under application 2016/0288/P, Camley Street Bridge, Kings Cross Central

CONDITION	DETAILS OF CONDITION	NOTES
6	Prior to commencement of the relevant part of the development hereby approved, the following details shall be submitted to and approved in writing by the Local Planning Authority:	
(a)	Details including sample panels of all external materials and finishes. The material under this condition shall be displayed in the form of a samples board to be retained on site for the duration of the relevant works	Information already submitted as part of previous application, refer to document ALD697_RP901
(b)	Details including sample panels of hard landscape surface treatments. The samples to demonstrate all materials and typical variations of pattern relationships within those materials	Part discharge of condition, details of surface treatment of bridge deck and ramp included within this document. For all other hard landscape surface treatments, refer to information already submitted as part of previous application: document ALD697_RP901
(c)	Details of proposed CCTV masts	Information already submitted as part of previous application, refer to document ALD697_RP901
(d)	Details of lighting within the public realm, to include location, design, specification, fittings & fixtures	Information already submitted as part of previous application, refer to document ALD697_RP901

NOTE: Refer to drawing ALD697P\_GA002 for hard landscape surface finish extent

**EXTERNAL MATERIALS: BRIDGE DECK & RAMP SURFACE FINISHES**

Material REF.	Material Details	Location	Further Information	Supplier	Photo	Location example
<b>BRIDGE DECK &amp; RAMP SURFACE FINISHES</b>						
1	<p><u>Bridge Deck Surface Finish (vertical face)</u> Interthane 870 paint finish Colour as sample board</p>	Camley Street Bridge Deck: Vertical surface finishes	Refer to appendix for technical data sheets	International Paint	 NOTE: refer to sample board on site for true colours	Refer to sample board on site (as pictured)
2	<p><u>Bridge Deck Surface Finish (horizontal face):</u> Bimagrip HD to be applied to horizontal bridge deck surface Colour as sample board</p>	Camley Street Bridge Deck: Horizontal surface finishes	Refer to appendix for technical data sheets	RS Clare	 NOTE: refer to sample board on site for true colours	Refer to sample board on site (as pictured)
3	<p><u>Camley Street Ramp Surface Finish:</u> Bimagrip HD as per the above to match the Bridge Deck Colour as sample board</p>	Camley Street Ramp	Refer to appendix for technical data sheets	RS Clare	 NOTE: refer to sample board on site for true colours	Refer to sample board on site (as pictured)

**EXTERNAL MATERIALS: BRIDGE DECK & RAMP SURFACE FINISHES****NOTE:**

The original reserved matters application proposed the bridge deck finish to be applied to both horizontal and vertical faces of the bridge deck structure, this is not possible due to:

- difficulty in applying finish to vertical and curved faces
- ongoing maintenance issues and risk of graffiti to vertical faces of bridge deck

A painted finish is therefore proposed to the vertical & curved faces as visualised below:



Indicative visualisation showing finishes to bridge deck



Proposed finishes sample board

**APPENDIX 1 - BIMAGRIP FINISH TECHNICAL DATA SHEETS**

# SAFETY DATA SHEET

## Bimagrip Pack A

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

<b>PRODUCT NAME</b>	Bimagrip Pack A
<b>PRODUCT NO.</b>	D6091,D6091, D6093, D6094
<b>APPLICATION</b>	Polyurethane Precursor
<b>SUPPLIER</b>	R S Clare & Co Ltd Stanhope Street Liverpool L8 5RQ 0151 7092902 0151 7090518

### 2 COMPOSITION/INFORMATION ON INGREDIENTS

Name	EC No.	CAS-No.	Content	Classification
DIPHENYLMETHANEDIISOCYANATE - Isomers & homologues		9016-87-9	10-30%	Xn;R20. Xi;R36/37/38. R42.
MODIFIED MDI			1-10%	Xn;R20. Xi;R36/37/38. R42/43.

The Full Text for all R-Phrases are Displayed in Section 16

### 3 HAZARDS IDENTIFICATION

Harmful by inhalation. Irritating to eyes, respiratory system and skin. May cause sensitisation by inhalation and skin contact.

**CLASSIFICATION** Xn;R20. R42/43. Xi;R36/37/38.

### 4 FIRST-AID MEASURES

#### INHALATION

Keep the affected person warm and at rest. Get prompt medical attention. When breathing is difficult, properly trained personnel may assist affected person by administering oxygen. If breathing stops, provide artificial respiration.

#### INGESTION

DO NOT INDUCE VOMITING! Rinse mouth thoroughly. Provide rest, warmth and fresh air. Get medical attention immediately!

#### SKIN CONTACT

Remove contaminated clothing. Wash the skin immediately with soap and water. Get medical attention if any discomfort continues.

#### EYE CONTACT

Promptly wash eyes with plenty of water while lifting the eye lids. Continue to rinse for at least 15 minutes and get medical attention.

### 5 FIRE-FIGHTING MEASURES

#### EXTINGUISHING MEDIA

Foam, carbon dioxide or dry powder.

#### SPECIAL FIRE FIGHTING PROCEDURES

Containers close to fire should be removed immediately or cooled with water.

### 6 ACCIDENTAL RELEASE MEASURES

#### ENVIRONMENTAL PRECAUTIONS

Prevent entry into drains, sewers and watercourses

#### SPILL CLEAN UP METHODS

Clean up should only be performed by trained personnel. Wear necessary protective equipment. Should be prevented from entering drains. Absorb into vermiculite, dry sand or earth Allow to react for at least 30 minutes Shovel into open top drums for further decontamination. Remove and dispose of residues

### 7 HANDLING AND STORAGE

# Bimagrip Pack A

## USAGE PRECAUTIONS

Avoid inhalation of vapours. Avoid spilling, skin and eye contact. Avoid contact with water

## STORAGE PRECAUTIONS

Store in tightly closed original container in a cool, dry well-ventilated place. Keep away from moisture. Due to reaction with water, production of Carbon dioxide may cause a build up of pressure if containers are resealed.

## 8 EXPOSURE CONTROLS/PERSONAL PROTECTION

Name	Std	LT - ppm	LT - mg/m3	ST - ppm	ST - mg/m3
DIPHENYLMETHANEDIISOCYANATE -Isomers & homologues	MEL		0.02 mg/m3(Sen)		0.07 mg/m3(Sen)

## INGREDIENT COMMENTS

MEL = Maximum Exposure Limit.

## PROTECTIVE EQUIPMENT



## ENGINEERING MEASURES

Provide adequate general and local exhaust ventilation.

## RESPIRATORY EQUIPMENT

If ventilation is insufficient, suitable respiratory protection must be provided.

## HAND PROTECTION

Use protective gloves made of: Butyl rubber. Neoprene, nitrile, polyethylene or PVC.

## EYE PROTECTION

Wear approved safety goggles. Use full face shield if risk of splashing

## OTHER PROTECTION

Wear suitable protective clothing as protection against splashing or contamination.

## HYGIENE MEASURES

Promptly remove any clothing that becomes contaminated. Wash at the end of each work shift and before eating, smoking and using the toilet. When using do not eat, drink or smoke.

## 9 PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE	Liquid		
COLOUR	Brown		
ODOUR	Characteristic		
BOILING POINT (°C)	>300	RELATIVE DENSITY	1.26 @25C
VISCOSITY	130 mPas 25	FLASH POINT (°C)	212 CC (Closed cup).
AUTO IGNITION TEMPERATURE (° >600 C)			

## 10 STABILITY AND REACTIVITY

### STABILITY

Stable under normal temperature conditions. at room temperature

### CONDITIONS TO AVOID

Avoid heat, flames and other sources of ignition. Avoid contact with water.

### MATERIALS TO AVOID

Amines. Acids. Bases. Alcohols.

## 11 TOXICOLOGICAL INFORMATION

### INHALATION

May cause sensitisation by inhalation. May cause irritation to the respiratory system.

### INGESTION

May cause Gastrointestinal symptoms, including upset stomach.

### SKIN CONTACT

Slightly irritating. May cause sensitisation by skin contact.

### EYE CONTACT

Irritating to eyes.

# Bimagrip Pack A

## 12 ECOLOGICAL INFORMATION

### ECOTOXICITY

Not known.

LC 50, 96 Hrs, FISH mg/l >1000

EC 50, 48 Hrs, DAPHNIA, mg/l >1000

## 13 DISPOSAL CONSIDERATIONS

### DISPOSAL METHODS

Dispose of waste and residues in accordance with local authority requirements.

## 14 TRANSPORT INFORMATION

ADR CLASS Not classified for transportation.

## 15 REGULATORY INFORMATION

### LABELLING



Harmful

### CONTAINS

DIPHENYLMETHANEDIISOCYANATE -Isomers & homologues  
MODIFIED MDI

### RISK PHRASES

R20 Harmful by inhalation.  
R36/37/38 Irritating to eyes, respiratory system and skin.  
R42/43 May cause sensitisation by inhalation and skin contact.

### SAFETY PHRASES

S23 Do not breathe vapour/spray.  
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 label where possible).  
P4 Contains isocyanates. See information supplied by the manufacturer.

### UK REGULATORY REFERENCES

Health and Safety at Work Act 1974.

### EU DIRECTIVES

System of specific information relating to Dangerous Preparations. 2001/58/EEC.

### STATUTORY INSTRUMENTS

Chemicals (Hazard Information and Packaging for Supply) Regulations 2002 (CHIP3)

### APPROVED CODE OF PRACTICE

Classification and Labelling of Substances and Preparations Dangerous for Supply.

### GUIDANCE NOTES

CHIP for everyone HSG(108). Occupational Exposure Limits EH40.

## 16 OTHER INFORMATION

REVISION DATE 03-06-2004

SDS NO. FL004

### RISK PHRASES IN FULL

R20 Harmful by inhalation.  
R36/37/38 Irritating to eyes, respiratory system and skin.  
R42 May cause sensitisation by inhalation.  
R42/43 May cause sensitisation by inhalation and skin contact.



# Bimagrip Pack A

## DISCLAIMER

*The information provided only relates to the product or material specified and does not apply if used in combination with other materials. The data sheet gives information to the best of RS Clare & Co Ltd knowledge and awareness as of the date of issue. If you have purchased the product for supply to a third party for a use at work, it is your duty to take all necessary steps to ensure that any person handling or using the product is provided with the information in this sheet. If you are an employer, it is your duty to inform your employees and others who may be affected by any of the hazards described in this sheet and any precautions which should be taken.*

## SAFETY DATA SHEET

### Bimagrip (Pack B)

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

<b>PRODUCT NAME</b>	Bimagrip (Pack B)
<b>PRODUCT NO.</b>	D6069
<b>APPLICATION</b>	Anti Skid - Material
<b>SUPPLIER</b>	R S Clare & Co Ltd Stanhope Street Liverpool L8 5RQ 0151 7092902 0151 7090518

#### 2 COMPOSITION/INFORMATION ON INGREDIENTS

Name	EC No.	CAS-No.	Content	Classification
1,2,4-TRIMETHYLBENZENE	202-436-9	95-63-6	<1.0%	R10 Xn;R20 Xi;R36/37/38 N;R51,R53
CYCLOHEXANONE	203-631-1	108-94-1	<1.0%	R10 Xn;R20
PHENYL MERCURIC NEODECANOATE			<1.0%	T;R24/25,R48. C;R34. N;R50/53.
SOLVENT NAPHTHA (PETROLEUM), LIGHT AROMATIC			1-10%	Xn;R65. N;R51/53. R10,R66,R67.
TOLUENE	203-625-9	108-88-3	<1.0%	F;R11 Xn;R20
XYLENE	215-535-7	1330-20-7	<1.0%	R10 Xn;R20/21 Xi;R38

The Full Text for all R-Phrases are Displayed in Section 16

#### 3 HAZARDS IDENTIFICATION

Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

**CLASSIFICATION** R52/53.

#### 4 FIRST-AID MEASURES

##### INHALATION

Move the exposed person to fresh air at once. Get medical attention if any discomfort continues.

##### INGESTION

NEVER MAKE AN UNCONSCIOUS PERSON VOMIT OR DRINK FLUIDS! Rinse mouth thoroughly. Drink plenty of water. Get medical attention if any discomfort continues.

##### SKIN CONTACT

Remove affected person from source of contamination. Get medical attention if irritation persists after washing.

##### EYE CONTACT

Make sure to remove any contact lenses from the eyes before rinsing. Promptly wash eyes with plenty of water while lifting the eye lids. Continue to rinse for at least 15 minutes. Get medical attention if any discomfort continues.

#### 5 FIRE-FIGHTING MEASURES

##### EXTINGUISHING MEDIA

This product is not flammable. Use fire-extinguishing media appropriate for surrounding materials.

#### 6 ACCIDENTAL RELEASE MEASURES

##### SPILL CLEAN UP METHODS

Stop leak if possible without risk. Absorb in vermiculite, dry sand or earth and place into containers. Flush with plenty of water to clean spillage area. Do not contaminate water sources or sewer.

# Bimagrip (Pack B)

## 7 HANDLING AND STORAGE

### USAGE PRECAUTIONS

Avoid spilling, skin and eye contact.

### STORAGE PRECAUTIONS

Store in tightly closed original container in a cool, dry well-ventilated place. Keep in original container.

## 8 EXPOSURE CONTROLS/PERSONAL PROTECTION

Name	Std	LT - ppm	LT - mg/m3	ST - ppm	ST - mg/m3
TOLUENE	OES	50 ppm(Sk)	191 mg/m3(Sk)	150 ppm(Sk)	574 mg/m3(Sk)
XYLENE	OES	50 ppm(Sk)	220 mg/m3(Sk)	100 ppm(Sk)	441 mg/m3(Sk)
CYCLOHEXANONE	OES	10 ppm(Sk)		20 ppm(Sk)	

### PROTECTIVE EQUIPMENT



### ENGINEERING MEASURES

Provide adequate general and local exhaust ventilation.

### HAND PROTECTION

Use suitable protective gloves if risk of skin contact.

### EYE PROTECTION

If risk of splashing, wear safety goggles or face shield.

### OTHER PROTECTION

Wear appropriate clothing to prevent any possibility of skin contact.

### HYGIENE MEASURES

DO NOT SMOKE IN WORK AREA! Wash at the end of each work shift and before eating, smoking and using the toilet. Wash promptly if skin becomes wet or contaminated. Promptly remove any clothing that becomes contaminated. Use appropriate skin cream to prevent drying of skin. When using do not eat, drink or smoke.

## 9 PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE	Liquid		
COLOUR	White / off-white		
ODOUR	Characteristic		
RELATIVE DENSITY	1.04 20	FLASH POINT (°C)	> 200 CC (Closed cup).
AUTO IGNITION TEMPERATURE (° < 200 C)			

## 10 STABILITY AND REACTIVITY

### STABILITY

Stable under normal temperature conditions.

### CONDITIONS TO AVOID

Avoid excessive heat for prolonged periods of time.

### HAZARDOUS DECOMPOSITION PRODUCTS

Fire creates: Carbon monoxide (CO). Carbon dioxide (CO2).

## 11 TOXICOLOGICAL INFORMATION

### INHALATION

May cause irritation to the respiratory system.

### INGESTION

May cause discomfort if swallowed.

### SKIN CONTACT

May cause sensitisation by skin contact.

# Bimagrip (Pack B)

## EYE CONTACT

May cause transient irritation

## 12 ECOLOGICAL INFORMATION

### ECOTOXICITY

Dangerous for the environment: May cause long-term adverse effects in the aquatic environment.

## 13 DISPOSAL CONSIDERATIONS

### DISPOSAL METHODS

Dispose of waste and residues in accordance with local authority requirements.

## 14 TRANSPORT INFORMATION

ADR CLASS Not classified for transportation.

## 15 REGULATORY INFORMATION

### RISK PHRASES

R52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

### SAFETY PHRASES

S61 Avoid release to the environment. Refer to special instructions/safety data sheets.

### UK REGULATORY REFERENCES

Health and Safety at Work Act 1974.

### EU DIRECTIVES

System of specific information relating to Dangerous Preparations. 2001/58/EEC.

### STATUTORY INSTRUMENTS

Chemicals (Hazard Information and Packaging for Supply) Regulations 2002 (CHIP3)

### APPROVED CODE OF PRACTICE

Classification and Labelling of Substances and Preparations Dangerous for Supply.

### GUIDANCE NOTES

Occupational Exposure Limits EH40. CHIP for everyone HSG(108).

## 16 OTHER INFORMATION

REVISION DATE 15-01-2003

SDS NO. FL002

### RISK PHRASES IN FULL

R10 Flammable.  
R11 Highly flammable.  
R20 Harmful by inhalation.  
R20/21 Harmful by inhalation and in contact with skin.  
R24/25 Toxic in contact with skin and if swallowed.  
R34 Causes burns.  
R36/37/38 Irritating to eyes, respiratory system and skin.  
R38 Irritating to skin.  
R48 Danger of serious damage to health by prolonged exposure.  
R50/53 Very toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.  
R51/53 Toxic to aquatic organisms, may cause long-term adverse effects in the aquatic environment.  
R65 Harmful: may cause lung damage if swallowed.  
R66 Repeated exposure may cause skin dryness or cracking.  
R67 Vapours may cause drowsiness and dizziness.

### DISCLAIMER

*The information provided only relates to the product or material specified and does not apply if used in combination with other materials. The data sheet gives information to the best of RS Clare & Co Ltd knowledge and awareness as of the date of issue. If you have purchased the product for supply to a third party for a use at work, it is your duty to take all necessary steps to ensure that any person handling or using the product is provided with the information in this sheet. If you are an employer, it is your duty to inform your employees and others who may be affected by any of the hazards described in this sheet and any precautions which should be taken.*

# SAFETY DATA SHEET

## Bimagrip LS / HD - Pack C Component

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

<b>PRODUCT NAME</b>	Bimagrip LS / HD - Pack C Component
<b>PRODUCT NO.</b>	D6092, D6095
<b>APPLICATION</b>	Polyurethane Filler
<b>SUPPLIER</b>	R S Clare & Co Ltd Stanhope Street Liverpool L8 5RQ 0151 709 2902 0151 709 0518

### 2 COMPOSITION/INFORMATION ON INGREDIENTS

### 3 HAZARDS IDENTIFICATION

Not regarded as a health or environmental hazard under current legislation.

The grain size distribution of this product gives potential for generation of airborne respirable crystalline silica dust during handling and use. Prolonged and/or massive inhalation of respirable crystalline silica dust may cause lung fibrosis, commonly referred to as silicosis. Principal symptoms of silicosis are cough and breathlessness. Occupational exposure to respirable crystalline silica dust should be monitored or controlled.

### 4 FIRST-AID MEASURES

#### GENERAL INFORMATION

No recommendation given.

#### INHALATION

No recommendation given. Move the exposed person to fresh air at once.

#### INGESTION

No toxic effects, treat symptomatically and seek medical advice as necessary.

#### EYE CONTACT

Immediately flush with plenty of water or eyewash solution for up to 10 minutes.

### 5 FIRE-FIGHTING MEASURES

#### EXTINGUISHING MEDIA

The product is non-combustible.

### 6 ACCIDENTAL RELEASE MEASURES

#### PERSONAL PRECAUTIONS

Avoid airborne dust generation. In case of exposure to airborne dust concentrations exceeding regulatory limits, wear a personal respirator in compliance with national legislation

#### ENVIRONMENTAL PRECAUTIONS

No special requirements

#### SPILL CLEAN UP METHODS

Avoid dry sweeping and use water spraying or vacuum cleaning systems to prevent airborne dust generation.

### 7 HANDLING AND STORAGE

#### USAGE PRECAUTIONS

Avoid airborne dust generation. Provide appropriate exhaust ventilation at places where airborne dust is generated. In case of insufficient ventilation, wear suitable respiratory protective equipment. Please contact your supplier if you require advice on safe handling techniques.

#### USAGE DESCRIPTION

When mixing with other substances the afore-mentioned safe handling advice shall apply.

# Bimagrip LS / HD - Pack C Component

## STORAGE PRECAUTIONS

Ensure abatement of dust produced during the loading of silos. Keep containers closed and store/handle bagged products so as to prevent accidental bursting.

## 8 EXPOSURE CONTROLS/PERSONAL PROTECTION

### PROCESS CONDITIONS

Provide appropriate local exhaust ventilation in places where dust is generated. Control of occupational exposure may also be achieved by enclosing plant and equipment, by isolating personnel from dusty areas and by ensuring good standards of ventilation in the workplace.

### RESPIRATORY EQUIPMENT

In case of exposure to airborne dust concentrations exceeding regulatory limits, wear a personal respirator that complies with the requirements of national legislation

### HAND PROTECTION

No specific hand protection noted, but gloves may still be advisable.

### EYE PROTECTION

Wear approved chemical safety goggles where eye exposure is reasonably probable.

### OTHER PROTECTION

Wear dust masks in dusty areas.

### ENVIRONMENTAL EXPOSURE CONTROLS

No special requirements

## 9 PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE	Powder		
COLOUR	Buff		
ODOUR	Odourless		
MELTING POINT (°C)	1610	BULK DENSITY	2.65 kg/m3
SOLUBILITY VALUE (g/100g H <sub>2</sub> O@20°C)	Negligible		

## 10 STABILITY AND REACTIVITY

### STABILITY

Stable under normal temperature conditions and recommended use.

## 11 TOXICOLOGICAL INFORMATION

### GENERAL INFORMATION

Prolonged and/or massive exposure to respirable crystalline silica-containing dust may cause silicosis, a nodular pulmonary fibrosis caused by deposition in the lungs of fine respirable particles of crystalline silica. In 1997, IARC (the International Agency for Research on Cancer) concluded that crystalline silica inhaled from occupational sources can cause lung cancer in humans. However it pointed out that not all industrial circumstances, nor all crystalline silica types, were to be incriminated. (IARC Monographs on the evaluation of the carcinogenic risks of chemicals to humans, Silica, silicates dust and organic fibres, 1197, Vol 68, IARC, Lyon, France.) In June 2003, SCOEL (the EU Scientific Committee on Occupational Exposure Limits) concluded that the main effect in humans of respirable crystalline silica dust is silicosis. "There is sufficient information to conclude that the relative risk of Lung Cancer is increased in persons with silicosis (and, apparently, not in employees without silicosis exposed to silica dust in quarries and in the ceramic industry). Therefore preventing the onset of silicosis will also reduce the cancer risk....." (SCOEL SUM Doc 94-final, June 2003). There is a body of evidence supporting the fact that increased cancer risk would be limited to people already suffering from silicosis. According to the current state of the art, worker protection against silicosis can be consistently assured by respecting the existing regulatory occupational exposure limits.

## 12 ECOLOGICAL INFORMATION

### ECOTOXICITY

The product is not expected to be hazardous to the environment.

## 13 DISPOSAL CONSIDERATIONS

### DISPOSAL METHODS

Dispose of waste and residues in accordance with local authority requirements.

## 14 TRANSPORT INFORMATION

## 15 REGULATORY INFORMATION

### RISK PHRASES

NC

Not classified.

# Bimagrip LS / HD - Pack C Component

**SAFETY PHRASES**

NC

Not classified.

---

**16 OTHER INFORMATION**

---

**GENERAL INFORMATION**

According to the Control of Substances Hazardous to Health Regulations 2002, there are restrictions on the use of ground quartz in certain processes associated with the manufacture and decoration of pottery. HSE Chemical Hazard Alert Notice 35 - the HSE issued a Chemical Hazard Alert Notice for Respirable Crystalline Silica on 7th May 2003. The notice states:- "HSE believes that in most cases it should be reasonably practicable to control exposure to 0.1 mg/m<sup>3</sup> (8 hour TWA) or less by engineering or process control. Employers should aim to ensure that workers are not exposed to RCS dust concentrations above this level. If exposure cannot be controlled to 0.1 mg/m<sup>3</sup> (8 hour TWA) or below by elimination or process or engineering controls, then exposure must be controlled by provision and use of suitable respiratory equipment." The full text of the notice is available at:

[www.hse.gov.uk/pubns/chan35.htm](http://www.hse.gov.uk/pubns/chan35.htm). Literature references are available on request from EUROSIL, the European Association of Industrial Silica Sand Producers, Bd. S. Dupuis 233 Bte 124, 1070 Brussels, Belgium. Tel: +32 (0)2 524 55 00, Fax: +32 (0)2 524 45 75, e-mail: [secretariat@ima-eu.org](mailto:secretariat@ima-eu.org)

**REVISION DATE**

16-05-2007

**DISCLAIMER**

*The information provided only relates to the product or material specified and does not apply if used in combination with other materials. The data sheet gives information to the best of RS Clare & Co Ltd knowledge and awareness as of the date of issue. If you have purchased the product for supply to a third party for a use at work, it is your duty to take all necessary steps to ensure that any person handling or using the product is provided with the information in this sheet. If you are an employer, it is your duty to inform your employees and others who may be affected by any of the hazards described in this sheet and any precautions which should be taken.*

**APPENDIX 2 - INTERTHANE 870 TECHNICAL DATA SHEETS**



**PRODUCT DESCRIPTION**

A two component, high build, acrylic polyurethane finish giving excellent durability and long term recoatability.

**INTENDED USES**

Suitable for use in both new construction and as an industrial maintenance finish which can be used in a wide variety of environments including offshore structures, petrochemical facilities, bridges, pulp and paper mills, and in the power industry.

Particularly designed for use in areas where a high gloss is either not desired or where a semi-gloss is the preferred option.

Provides a versatile option where overcoating of intermediates in one coat is not possible using conventional high gloss polyurethane finishes.

**PRACTICAL INFORMATION FOR INTERTHANE 870**

<b>Colour</b>	Wide range via the Chromascan system			
<b>Gloss Level</b>	Semi Gloss			
<b>Volume Solids</b>	56% ± 3% (depends on colour)			
<b>Typical Thickness</b>	75-125 microns (3-5 mils) dry equivalent to 134-223 microns (5.4-8.9 mils) wet			
<b>Theoretical Coverage</b>	4.50 m <sup>2</sup> /litre at 125 microns d.f.t and stated volume solids 180 sq.ft/US gallon at 5 mils d.f.t and stated volume solids			
<b>Practical Coverage</b>	Allow appropriate loss factors			
<b>Method of Application</b>	Airless Spray, Air Spray, Brush, Roller			
<b>Drying Time</b>	Overcoating Interval with recommended topcoats			
<b>Temperature</b>	<b>Touch Dry</b>	<b>Hard Dry</b>	<i>Minimum</i>	<i>Maximum</i>
5°C (41°F)	90 minutes	30 hours	30 hours	Extended <sup>1</sup>
15°C (59°F)	75 minutes	16 hours	16 hours	Extended <sup>1</sup>
25°C (77°F)	60 minutes	5 hours	5 hours	Extended <sup>1</sup>
40°C (104°F)	45 minutes	2.5 hours	2.5 hours	Extended <sup>1</sup>

<sup>1</sup> See International Protective Coatings Definitions and Abbreviations

**REGULATORY DATA**

<b>Flash Point</b>	Part A 35°C (95°F); Part B 50°C (122°F); Mixed 35°C (95°F)	
<b>Product Weight</b>	1.38 kg/l (11.5 lb/gal)	
<b>VOC</b>	3.14 lb/gal (377 g/l) 280 g/kg	EPA Method 24 EU Solvent Emissions Directive (Council Directive 1999/13/EC)

See Product Characteristics section for further details

**SURFACE  
PREPARATION**

All surfaces to be coated should be clean, dry and free from contamination. Prior to paint application all surfaces should be assessed and treated in accordance with ISO 8504:2000.

**Primed Surfaces**

Interthane 870 should always be applied over a recommended anti-corrosive coating scheme. The primer surface should be dry and free from all contamination and Interthane 870 must be applied within the overcoating intervals specified (consult the relevant product data sheet).

Areas of breakdown, damage etc., should be prepared to the specified standard (e.g. Sa2½ (ISO 8501-1:2007) or SSPC-SP6, Abrasive Blasting, or SSPC-SP11, Power Tool Cleaning) and patch primed prior to the application of Interthane 870.

**APPLICATION**

<b>Mixing</b>	Material is supplied in two containers as a unit. Always mix a complete unit in the proportions supplied. Once the unit has been mixed it must be used within the working pot life specified.			
	(1) Agitate Base (Part A) with a power agitator.			
	(2) Combine entire contents of Curing Agent (Part B) with Base (Part A) and mix thoroughly with power agitator.			
<b>Mix Ratio</b>	7 part(s) : 1 part(s) by volume			
<b>Working Pot Life</b>	5°C (41°F) 7 hours	15°C (59°F) 3.5 hours	25°C (77°F) 2 hours	40°C (104°F) 45 minutes
<b>Airless Spray</b>	Recommended	Tip Range 0.43-0.58 mm (17-23 thou) Total output fluid pressure at spray tip not less than 155 kg/cm <sup>2</sup> (2204 p.s.i.)		
<b>Air Spray (Pressure Pot)</b>	Recommended	Gun Air Cap Fluid Tip	DeVilbiss MBC or JGA 704 or 765 E	
<b>Air Spray (Conventional)</b>	Suitable	Use suitable proprietary equipment		
<b>Brush</b>	Suitable	Typically 50-75 microns (2.0-3.0 mils) can be achieved		
<b>Roller</b>	Suitable	Typically 50-75 microns (2.0-3.0 mils) can be achieved		
<b>Thinner</b>	International GTA713 or International GTA733 (or International GTA056)	Do not thin more than allowed by local environmental legislation		
<b>Cleaner</b>	International GTA713, International GTA733 or International GTA056			
<b>Work Stoppages</b>	Do not allow material to remain in hoses, gun or spray equipment. Thoroughly flush all equipment with International GTA713. Once units of paint have been mixed they should not be resealed and it is advised that after prolonged stoppages work recommences with freshly mixed units.			
<b>Clean Up</b>	Clean all equipment immediately after use with International GTA713. It is good working practice to periodically flush out spray equipment during the course of the working day. Frequency of cleaning will depend upon amount sprayed, temperature and elapsed time, including any delays.			

All surplus materials and empty containers should be disposed of in accordance with appropriate regional regulations/legislation.

**PRODUCT CHARACTERISTICS**

Level of sheen and surface finish are dependent on application method. Avoid using a mixture of application methods whenever possible.

Maximum film build in one coat is best attained by airless spray. When applying by methods other than airless spray, the required film build is unlikely to be achieved. Application by air spray may require a multiple cross spray pattern to attain maximum film build. Low or high temperatures may require specific application techniques to achieve maximum film build.

If application in one coat using brush and roller is desired then the undercoat shade should be chosen to match the final coat shade. Dark coloured and MIO undercoats will typically require 2 coats of Interthane 870.

When applying Interthane 870 by brush or roller, it may be necessary to apply multiple coats to achieve the total specified system dry film thickness.

Applicators should be aware that the ability to apply Interthane 870 in one coat will be affected by the temperature of the substrate. At higher steel temperatures, lower film builds and thinner coats are likely to be achieved.

This product must only be thinned using the recommended International thinners. The use of alternative thinners, particularly those containing alcohols, can severely inhibit the curing mechanism of the coating.

Do not apply at steel temperatures below 5°C (41°F).

When applying Interthane 870 in confined spaces ensure adequate ventilation.

When overcoating after weathering or ageing, ensure the coating is fully cleaned to remove all surface contamination such as oil, grease, salt crystals and traffic fumes, before application of a further coat of Interthane 870.

Condensation occurring during or immediately after application may result in a matt finish and an inferior film.

Premature exposure to ponding water will cause colour change, especially in dark colours and at low temperatures.

Absolute measured adhesion of topcoats to aged Interthane 870 is less than that to fresh material, however, it is adequate for the specified end use.

This product is not recommended for use in immersion conditions. When severe chemical or solvent splashing is likely to occur contact International Protective Coatings for information regarding suitability.

Note: VOC values are typical and are provided for guidance purpose only. These may be subject to variation depending on factors such as differences in colour and normal manufacturing tolerances.

Low molecular weight reactive additives, which will form part of the film during normal ambient cure conditions, will also affect VOC values determined using EPA Method 24.

**SYSTEMS COMPATIBILITY**

---

The following primers/intermediates are recommended for Interthane 870:

Intercure 200	Interplus 356
Intercure 200HS	Interseal 670HS
Intercure 420	Interzinc 52
Intercure 420HS	Interzinc 52HS
Intergard 251	Interzinc 315
Intergard 475HS	Interzone 505
Interplus 256	Interzone 954

Interthane 870 is designed only to be topcoated with itself.

For other suitable primers/intermediates, consult International Protective Coatings.

**ADDITIONAL INFORMATION**

Further information regarding industry standards, terms and abbreviations used in this data sheet can be found in the following documents available at [www.international-pc.com](http://www.international-pc.com):

- Definitions & Abbreviations
- Surface Preparation
- Paint Application
- Theoretical & Practical Coverage

Individual copies of these information sections are available upon request.

**SAFETY PRECAUTIONS**

This product is intended for use only by professional applicators in industrial situations in accordance with the advice given on this sheet, the Material Safety Data Sheet and the container(s), and should not be used without reference to the Material Safety Data Sheet (MSDS) which International Protective Coatings has provided to its customers.

All work involving the application and use of this product should be performed in compliance with all relevant national, Health, Safety & Environmental standards and regulations.

In the event welding or flame cutting is performed on metal coated with this product, dust and fumes will be emitted which will require the use of appropriate personal protective equipment and adequate local exhaust ventilation.

If in doubt regarding the suitability of use of this product, consult International Protective Coatings for further advice.

**Warning: Contains isocyanate. Wear air-fed hood for spray application.**

PACK SIZE	Unit Size	Part A		Part B	
		Vol	Pack	Vol	Pack
	20 litre	17.5 litre	20 litre	2.5 litre	3.7 litre
	5 US gal	4.38 US gal	5 US gal	0.63 US gal	1 US gal
For availability of other pack sizes, contact International Protective Coatings.					
SHIPPING WEIGHT	Unit Size	Part A		Part B	
	20 litre	27 kg		3.1 kg	
	5 US gal	55.1 lb		6.4 lb	
STORAGE	Shelf Life	12 months minimum at 25°C (77°F). Subject to re-inspection thereafter. Store in dry, shaded conditions away from sources of heat and ignition.			

**Important Note**

*The information in this data sheet is not intended to be exhaustive; any person using the product for any purpose other than that specifically recommended in this data sheet without first obtaining written confirmation from us as to the suitability of the product for the intended purpose does so at their own risk. All advice given or statements made about the product (whether in this data sheet or otherwise) is correct to the best of our knowledge but we have no control over the quality or the condition of the substrate or the many factors affecting the use and application of the product. Therefore, unless we specifically agree in writing to do so, we do not accept any liability at all for the performance of the product or for (subject to the maximum extent permitted by law) any loss or damage arising out of the use of the product. We hereby disclaim any warranties or representations, express or implied, by operation of law or otherwise, including, without limitation, any implied warranty of merchantability or fitness for a particular purpose. All products supplied and technical advice given are subject to our Conditions of Sale. You should request a copy of this document and review it carefully. The information contained in this data sheet is liable to modification from time to time in the light of experience and our policy of continuous development. It is the user's responsibility to check with their local International Paint representative that this data sheet is current prior to using the product.*

Issue date: 07/07/2009

Copyright © AkzoNobel, 07/07/2009.

 International, International and all product names mentioned in this publication are trademarks of, or licensed to, AkzoNobel.

[www.international-pc.com](http://www.international-pc.com)