DURATION® T80

Premium Water Borne Fluorinated Polymer Finish — PC 865

FEATURES
- EXCELLENT UV RESISTANCE AND GLOSS RETENTION
- LOW VOC & LOW ODOUR
- TINTABLE – AVAILABLE IN OVER 5,000 COLOURS
- VERY GOOD ANTI GRAFFITI PROPERTIES

USES DURATION® T80 is a premium, two-component, water borne, fluorinated polymer finish that demonstrates excellent gloss and colour retention and is designed for applications where extended service periods are required. This is delivered via a system with a low VOC content. DURATION® T80 is formulated to be used as part of complete DURATION® water borne protective coatings system for steel that is subject to sheltered or mild (C1-C3) corrosive environments including residential and commercial construction, hospitals, warehouses, schools, shopping centres and factories. DURATION® T80 can also be used directly over Dulux® solvent borne epoxy primers, universal primers, epoxy intermediates and to aged, tightly adhering coatings subject to necessary solvent resistance tests and appropriate surface preparation.

SPECIFICATIONS APAS 1441/1 and 1441/2: assessed and confirmed to meet all requirements on specific certified products

RESISTANCE GUIDE

WEATHERABILITY	Excellent gloss and colour retention on exterior exposure	**SOLVENTS**	Unaffected by splash and spillage of common alcohols, aliphatic and aromatic hydrocarbons, esters and ketones
HEAT RESISTANCE	Up to 120°C dry heat.	**WATER**	Excellent resistance to fresh and salt water but not suitable for immersion.
SALTS	Unaffected by splash and spillage of most salt solutions	**ALKALIS**	Good resistance to splash and spillage of most common alkalis
ACIDS	Suitable for splash and spillage exposure to most acids	**ABRASION**	Good when fully cured

TYPICAL PROPERTIES AND APPLICATION DATA

CLASSIFICATION	Two pack fluoropolymer
FINISH	Gloss and Satin
COLOUR	Extensive range of colours using the Dulux Authentic Colour® Low VOC Tint System.
COMPONENTS	Two
VOLUME SOLIDS	>30% (Gloss, Vivid White, untinted) >38% (Satin, Vivid White, untinted)
VOC LEVEL	<52 g/L (Gloss, Vivid White, untinted) <39 g/L (Satin, Vivid White untinted)
FLASH POINT	N/A
POT LIFE	1 hour (4 litre kit, 25°C)
MIXING RATIO V/V	Part A : 5 Part B : 1
THINNER	Potable Water
PRODUCT CODE	H25-04912 Gloss Vivid White Base H25-16101 Gloss Ultra Deep Tone Base H25-87663 Gloss Extra Bright Base H26-04912 Satin Vivid White Base H26-16101 Satin Ultra Deep Tone Base H26-87663 Satin Extra Bright Base 976-H0182 Standard Hardener

APPLICATION CONDITIONS

	Min	Max
Air Temp.	10°C	40°C
Substrate Temp.	10°C	40°C
Relative Humidity		85%

COATING THICKNESS (MICRONS)

	Min	Max	Recommended
Wet film per coat (µm)	See below	See below	See below
Dry film per coat (µm)	See below	See below	See below

SUITABLE SUBSTRATES	Suitably primed steel, aluminium, zinc coated steel, concrete and MDF
PRIMERS	Epoxy primers, etch primers and universal metal primers
APPLICATION METHODS	Air spray, airless, roller and brush

DRYING CHARACTERISTICS AT 50 µm DRY FILM THICKNESS GLOSS BASE*

					OVERCOAT	
Temperature	**Humidity**	**Touch**	**Handle**	**Full Cure**	**Min**	**Max[1]**
25° C	50%	45 Minutes	24 Hours	7 Days	24 Hours	3 days

*These figures are a guide only, as ventilation, film thickness, humidity, thinning and other factors will influence the rate of drying.

[1] **If the maximum overcoat interval is exceeded then the surface MUST be abraded to ensure maximum intercoat adhesion**

SPREADING RATE **6.0 square metres per litre equals 50 µm dry film thickness**
ASSUMING NO LOSSES
NOTE: Practical spreading rates will vary depending on such factors as colour, application method, ambient conditions and surface porosity and roughness.

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GLOSS BASE WITH STANDARD HARDENER

COATING THICKNESS (MICRONS)

	Min	Max	Recommended
Wet film per coat (µm)	170	250	170
Dry film per coat (µm)	50	75	50

SOLIDS BY VOLUME	>30% (Vivid White Base, untinted)
VOC LEVEL	<52 g/L (Vivid White, untinted)
FLASH POINT	N/A
POT LIFE	1 Hour (4 litre kit, 25°C)

APPLICATION CONDITIONS

	Min	Max
Air Temperature	10°C	40°C
Substrate Surface Temperature	10°C	40°C
Relative Humidity		85%

DRYING CHARACTERISTICS AT 50 µm DRY FILM THICKNESS* (GLOSS BASE)

					OVERCOAT	
Temperature	Humidity	Touch	Handle	Full Cure	Min[1]	Max[2]
25° C	50%	45 Minutes	24 Hours	7 Days	24 Hours	3 Days

*These figures are a guide only, as ventilation, film thickness, humidity, thinning and other factors will influence the rate of drying.
[1] If the maximum overcoat interval is exceeded then the surface MUST be abraded to ensure maximum intercoat adhesion

SPREADING RATE
GLOSS BASE WITH STANDARD HARDENER ASSUMING NO LOSSES

6.0 square metres per litre equals 50 µm dry film thickness
NOTE: Practical spreading rates will vary depending on such factors as application method, ambient conditions and surface porosity and roughness.

SATIN BASE WITH STANDARD HARDENER

COATING THICKNESS (MICRONS)

	Min	Max	Recommended
Wet film per coat (µm)	130	200	130
Dry film per coat (µm)	50	75	50

SOLIDS BY VOLUME	>38% (Vivid White, untinted)
VOC LEVEL	<39 g/L (Vivid White, untinted)
FLASH POINT	N/A
POT LIFE	1 Hour (4 litre kit, 25°C)

APPLICATION CONDITIONS

	Min	Max
Air Temperature	10°C	40°C
Substrate Surface Temperature	10°C	40°C
Relative Humidity		85%

DRYING CHARACTERISTICS AT 50 µm DRY FILM THICKNESS* (SATIN BASE)

					OVERCOAT	
Temperature	Humidity	Touch	Handle	Full Cure	Min	Max[1]
25° C	50%	45 Minutes	24 Hours	7 Days	24 Hours	3 Days

*These figures are a guide only, as ventilation, film thickness, humidity, thinning and other factors will influence the rate of drying.
[1] If the maximum overcoat interval is exceeded then the surface MUST be abraded to ensure maximum intercoat adhesion

SPREADING RATE
SATIN BASE WITH STANDARD HARDENER ASSUMING NO LOSSES

7.6 square metres per litre equals 50 µm dry film thickness
NOTE: Practical spreading rates will vary depending on such factors as application method, ambient conditions and surface porosity and roughness.

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TYPICAL SYSTEMS

This is a guide only and not to be used as a specification. Your specific project needs must be discussed with a Dulux Protective Coatings Consultant.

SURFACE	ENVIRONMENT	PREPARATION GUIDE	SYSTEM		DFT (µm)
STEEL - NEW	Low–medium corrosivity (AS2312.1 Cat C1-C3)	Abrasive blast AS1627.4 Class 2.5	1st Coat 2nd Coat 3rd Coat	Duration® P23 Duration® X21 Duration® T80	75 µm 50 µm 50 µm
GALVANISED STEEL	Exterior	Degrease and whip blast	1st Coat 2nd Coat 3rd Coat	Duration® P23 Duration® X21 Duration® T80	75 µm 50 µm 50 µm
ALUMINIUM	Exterior/Interior	Clean, degrease and abrade surface	1st Coat 2nd Coat 3rd Coat	Duration® P23 Duration® X21 Duration® T80	75 µm 50 µm 50 µm
MDF	Interior	Sand and dust down before and after first coat	1st Coat 2nd Coat 3rd Coat	Luxepoxy® 4 White Primer Duration® X21 Duration® T80	50 µm 50 µm 50 µm

NOTE: If application is by brush or roller, additional coats will be necessary to achieve the minimum DFT and full opacity

SURFACE PREPARATION

Specifiers should follow the surface preparation guidelines from the data sheet for the first coat selected. The surface must be sound and free from grease, oil, dirt, rust, loose paint and other contaminants. Dulux® recommends that surfaces be degreased with Gamlen CA 1 detergent (according to the manufacturer's written instructions and all safety warnings) and then abraded to provide a key for the coating system.

APPLICATION

NOTE: DO NOT ADD WATER TO PART B AT ANY STAGE.

1. Gently power mix each Part (A and B) separately until the contents of each Part is uniform.
2. Add Part B to Part A and power mix together thoroughly. Take care not to aerate – ensure that mixing does not draw in air and generate foam.
3. THIN 5% POTABLE WATER. Add water only to the mixed product.
4. Continue mixing through the gel phase until product appears SMOOTH and consistent.
5. Let stand for 10 minutes.
6. Remix thoroughly before application.

BRUSH/ROLLER

Application can be improved by thinning the mixed product with up to 150 ml/litre with potable water. When brushing and rolling additional coats may be required to attain the specified thickness.

CONVENTIONAL SPRAY

When thinning the mixed product, thin it with potable water up to 150 ml/litre to aid atomisation. Apply in multiple wet coats overlapping each pass 50%.

Typical Set-up	Graco AirPro	1.4mm (239542)
	Pressure at Triton 308:	70-100 kPa (10-15 p.s.i.)
	Pressure at Gun:	380-410 kPa (55-60 p.s.i.)

AIRLESS SPRAY

Standard airless spray equipment such as a Graco Xtreme 30:1 with a fluid tip of 15 thou (0.38) and an air supply capable of delivering 550-690 kPa (80-100 p.s.i.) at the pump. Thinning is not normally required but up to 150 ml/litre of potable water may be added to aid application.

PRECAUTIONS

This is an industrial product designed for use by experienced Coating applicators. Where conditions may require variation from the recommendations on this Product Data Sheet contact your nearest Dulux® Consultant for advice prior to painting. Do not apply in conditions outside the parameters stated in this document without the written consent of Dulux® Australia. **Do not use any product past its pot life**. Product past its pot life may still appear fit for use but will develop substantially reduced gloss and may develop brittleness. Freshly mixed material must not be added to material that has been mixed for some time. The rate of cure is dependent upon temperature. Do not apply at temperatures below 10°C, or where the surface temperature is below 10°C. Do not apply at relative humidity above 85% or when the surface is less than 3°C above the dewpoint. Ensure you read and understand the safety precautions on the Material Safety Data Sheets for the two components before using. You should only thin the mixed product with potable water. **Do not add water to the PART B, isocyanate component**.

CLEAN UP

Clean all equipment with clean warm water immediately after use followed by DULUX® EPOXY THINNER (920-08925).

OVERCOATING

Degrease with Gamlen CA 1 according to the data sheet. Test adhesion of existing coating by standard cross hatch adhesion test. If the coating fails, remove it. High-pressure water wash at 8.3 to 10.3 MPa (1,200-1,500 p.s.i.) to remove chalk and dust. Abrade surface to provide a good key for the new coating. Epoxies must be abraded if recoated outside the recoat window.

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SAFETY PRECAUTIONS	**Read Data Sheet, SAFETY DATA SHEET and any precautions on container labels. SAFETY DATA SHEET is available from Customer Service (13 23 77) or www.duluxprotectivecoatings.com.au**
STORAGE	Prior to use, keep containers closed at all times. Both components are NOT classified as dangerous goods for transport or storage. Store in well ventilated bunded area under cover and away from sources of heat. Once hardener has been added, do not reseal as pressure build up will occur.
HANDLING	As with any chemical, ingestion, inhalation and prolonged or repeated skin contact should be avoided by good occupational work practice. Eye protection approved to AS1337 should be worn where there is a risk of splashes entering the eyes. Always wash hands before smoking, eating, drinking or using the toilet. Once hardener has been added, do not reseal as pressure build up will occur.
USING	Use with good ventilation and avoid inhalation of spray mists and fumes. If risk of inhalation of spray mists exists, wear combined organic vapour/particulate respirator. When spraying, users must comply with their respective State Spray Painting Regulations.
FLAMMABILITY	This product is not flammable. On burning will emit toxic fumes.
WELDING	Avoid inhalation of fumes if welding surfaces coated with this paint. Grind off coating before welding.

COMPANY INFORMATION

Dulux Protective Coatings a division of

DuluxGroup (Australia) Pty Ltd
1956 Dandenong Road, Clayton 3168
A.B.N. 67 000 049 427

DuluxGroup (New Zealand) Pty Ltd
150 Hutt Park Road, Lower Hutt, NZ
A.B.N. 55 133 404 118

PACKAGING, TRANSPORT AND STORAGE

PACKAGING	Available in 4 litre and 20 litre packs
TRANSPORTATION WEIGHT	1.35 kg/litre (Average of components)
DANGEROUS GOODS	Part A: Non Dangerous Goods Part B: Non Dangerous Goods