NZDU02465 Dulux Aquanamel Gloss on New Non-Ferrous Metals [Exterior]

Scope of Works

DULUX Aquanamel Gloss is a premium quality water based interior and exterior acrylic enamel, that dries to a tough finish. This product is so resistant that common marks are able to be removed virtually without trace. It resists knocking, chipping and yellowing and is highly recommended for walls, doors, architraves, timber trim and skirting boards as an alternative to enamels, and is ideal for bathrooms, kitchens and laundries.

Substrate and Substrate Preparation

Substrate Notes

This is a generic non-ferrous metal substrate. Please see the respective substrate for: steel, galvanised steel, precoated sheet steel . Other specialty metal substrates may also not be covered by this substrate.

ALUMINIUM & ALLOYS
Aluminium and its alloys rapidly oxidise on exposure, forming a chemically inert, protective layer that protects the metal from further corrosion.

Aluminium and its alloys may be extremely smooth or contaminated with greases, oils and foreign matter leading to poor paint adhesion and reduced lifetime. Careful cleaning and thorough abrasion of the surface must be carried out prior to painting to ensure maximum coating performance.

ANODISED ALUMINIUM
Anodising is an electro-chemical process which physically alters the surface of the metal to produce a very smooth, tough, dense, invisible oxide layer on the surface. The aluminium surface is ‘passivated’ and sealed and therefore unable to bond with any organic coating, including powder coatings unless proper surface preparation is carried out to ensure adequate adhesion of the applied finish.

COPPER
Copper metal has a dull brown metallic lustre but will oxidise to the familiar chalky green patina often seen on copper domes on heritage buildings. This green patina must be completely removed prior to painting.

BRASS
Brass is an alloy (blend) of copper and zinc. Brass can be polished to a bright, shiny, lustrous metallic dark gold appearance but is prone to tarnishing (surface corrosion), particularly on contact with skin, and therefore should not be handled with bare hands. Brass is very smooth and may be coated with oils leading to poor paint adhesion and reduced lifetime. Careful cleaning and thorough abrasion of the surface must be carried out prior to painting to ensure maximum coating performance.

BRONZE
Bronze is an alloy (blend) of copper and tin and has a shiny, lustrous brown metallic appearance that is prone to tarnishing (surface corrosion) to a dusty green patina with time. Bronze is generally quite smooth and may be contaminated with oils leading to poor paint adhesion and reduced lifetime. Careful cleaning and thorough abrasion of the surface must be carried out prior to painting to ensure maximum coating performance.

Substrate Preparation Notes

DOMESTIC
CLEAN
Remove all surface contamination such as oil, grease or dirt by washing with an alkaline detergent, such as Dulux Prep Wash, and rinse with fresh potable water.

ABRADE
Thoroughly abrade the non ferrous metal surface to establish a mechanical key by scouring the surface with a nylon scouring pad, scotch-brite pad or power tool using a 50/50 mix of methylated spirits and water as a lubricant. Ensure all dust is removed prior to continuing.

DRY
Wipe dry using a clean cloth and allow to dry completely.

PRIME
Apply a suitable primer over the entire area as soon as possible to reduce the risk of corrosion.

INDUSTRIAL
CLEAN
Remove all surface contamination such as oil, grease or dirt by washing with an alkaline detergent, such as Dulux Prep Wash, and rinse with fresh potable water. Refer to AS1627.1 Part 1.4.4 - 1.4.6.

ABRADE
Dry abrasive "brush blast" clean (whip blast) the surface using a non-metallic abrasive such as garnet. The abrasive size and blast pressure shall be such that all oxidation products and other surface contaminants are completely removed and that the surface is profiled to provide a suitable key for adhesion of the coating system.

If the item being painted is not suitable for brush blasting (eg sheet metal or thin extrusions) then use non-metallic abrasive sanding pads to remove any existing oxidation and provide a suitable key for coating adhesion. Note that this preparation method is likely to be less effective than brush blasting and should only be used where brush blasting is not suitable.
Remove all spent abrasive and residual dust by using dry compressed air or, preferably, vacuum cleaning prior to application of the coating. Avoid handling abraded metal with bare hands.

REPAIR SURFACE IMPERFECTIONS
Inspect the surface prior to coating to ensure no contamination is present and no surface defects exist. If either contaminants or defects are present, rectification is required before any coating is applied.

PRIME
Apply first or primer coat as soon as practical after preparation and before the surface oxidises or becomes re-contaminated.

Coating System Summary

- 1st Coat — Dulux 1 Step Prep Water Based Primer Sealer Undercoat
- 2nd Coat — Dulux Aquanamel Gloss
- 3rd Coat — Dulux Aquanamel Gloss

Coating System

1st Coat — Dulux 1 Step Prep Water Based Primer Sealer Undercoat

Coat Type	Datasheet
1st Coat	**NZDU00432 Dulux 1 Step Prep Water Based Primer Sealer Undercoat**

Read the full Datasheet details at Dulux 1 Step Prep Water Based Primer Sealer Undercoat

Application Methods

Air Spray **Airless Spray** **Brush** **Roller**

	Min	Max	Recommended
Theoretical Spread Rate (m²/L)			**14**
Wet Film Per Coat (microns)			**71**
Dry Film Per Coat (microns)			**31**
Recoat Time **	**2 Hours**		

V.O.C. Level	Meets ECNZ V.O.C. Requirements?
< 40g/L untinted	**Not Applicable**

Coating Application Details
Brush, roller, conventional or airless spray.
ROLLER: Using a medium nap roller apply a full even coat direct from the container and finish by light parallel strokes with a dry roller.
Stir contents thoroughly before and during use.
AIRLESS/CONVENTIONAL SPRAY: Suitable for application by all standard spray equipment. If necessary thin with up to 100ml per litre of water to aid atomisation.
BRUSH: Wet brushes with water prior to use to avoid clogging. Apply a full even coat direct from the container.
When painting exterior surfaces, ensure topcoat is applied no more than one week after application.

SDS Number	SDS Link
DLXNZLEN002997	**View SDS Link**

2nd Coat — Dulux Aquanamel Gloss

Coat Type	Datasheet
2nd Coat	**NZDU00333 Dulux Aquanamel Gloss**

Read the full Datasheet details at Dulux Aquanamel Gloss

Application Methods

Air Spray | Airless Spray | Brush | Roller

	Min	Max	Recommended
Theoretical Spread Rate (m²/L)			16
Wet Film Per Coat (microns)			62
Dry Film Per Coat (microns)			23
Recoat Time **	2 hours	Indefinite	

V.O.C. Level
<60 g/L inclusive of Dulux Low VOC tinter.

Meets ECNZ V.O.C. Requirements?
Yes

Total Volatile Organic Content (TVOC) values are calculated in accordance to the stated methodology within Green Star Technical Manuals. The TVOC content is theoretically calculated as the sum total of the known VOC values of the product's raw material components. These materials include the base paint plus additional low VOC tinter required for non-factory packaged colours.

Coating Application Details

*Some colours may require more than the recommended number of coats to achieve full opacity. Stir contents thoroughly before and during use with a broad flat stirrer using an upward lifting action.

Brush, roller or spray

Brush/Roller
Brush- Dulux Professional range of brushes are recommended.

Roller- Very short nap roller e.g. 5mm

Apply evenly, dividing area into patches about 50-60 square centimetres. Paint one patch at a time working back into previously applied paint. Finally lay off each patch with light vertical strokes again lapping lightly into previously painted patches. On wall areas use a 5mm nap roller to achieve the smoothest finish. Do not lay off with a brush. Generally thinning is not recommended, however, under hot conditions Dulux Hot Weather Thinner should be added to improve application performance to maximum of 50 ml per litre.

Airless/Conventional Spray: Airless/Conventional Spray
Suitable for application by conventional or airless spray equipment. Up to 100mL/L of water may be added for application by conventional spray, up to 30mL/L of water for airless spray, and up to 5mL/L for HVLP spray, to aid atomisation.

Wagner recommendation: F230 Aircoat recommended.
Tip: 211 for archs and trim, 411 for doors
Pressure: 1100 PSI
1-1.5 at the bar at the gun.

Graco recommendation: Air Assisted Airless.
Tip: 210 or 310
Pressure: 1100 PSI

SDS Number
DLXGHSEN001089

SDS Link
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3rd Coat — Dulux Aquanamel Gloss

Coat Type
3rd Coat

Datasheet
NZDU00333 Dulux Aquanamel Gloss

Read the full Datasheet details at Dulux Aquanamel Gloss

Application Methods

Air Spray | Airless Spray | Brush | Roller

	Min	Max	Recommended
Theoretical Spread Rate (m²/L)			16
Wet Film Per Coat (microns)			62
Dry Film Per Coat (microns)			23
Recoat Time **	2 hours	Indefinite	

V.O.C. Level
<60 g/L inclusive of Dulux Low VOC tinter.

Meets ECNZ V.O.C. Requirements?
Yes

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Tip: 210 or 310
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Coating System Notes

* Practical Spreading Rate will vary from the quoted Theoretical Spreading Rate due to factors such as method and condition of application and surface roughness. ** Recoat times are quotes for 25°c and 50% relative humidity, these may vary under different conditions.

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The correct colour or colour match is the responsibility of the applicator. Colours will change over time and Dulux does not guarantee that the same colour newly mixed will match a colour applied earlier which has been subjected to weathering or other change elements. No product colour is guaranteed against colour change.

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WHERE LEAD MAY BE PRESENT: The asset manager is responsible for verifying the presence of lead and determining whether to remove or encapsulate the lead. If lead is present, the work must be done in strict accordance with AS/ NZS 4361 Parts 1 and 2 and Worksafe Australia or New Zealand guidelines.