

SELECTION & SPECIFICATION DATA

Generic Type	A 4:1, high solids, two component, direct-to-metal (DTM) polyurethane coating
Description	A 4:1, high solids, two component, direct-to-metal (DTM) polyurethane coating. This coating is designed to provide very good corrosion, UV and chemical resistance in a one coat system.
Features	<ul style="list-style-type: none"> • Excellent Weathering resistance • Single coat direct to metal urethane • Very Low HAPS • Low VOC • Easy one coat coverage • Excellent adhesion • Very good resistance to corrosion and spillage /splash of mild chemicals • Very flexible • Excellent Gloss
Color	White, Black and Grey or per customer requirements
Gloss	90-95°+ (ASTM D523 @ 60° angle)
Dry Film Thickness	4 - 6 mils (102 - 152 microns) per coat Min. 2 mils (100 microns) over profile, not to exceed 10 mils (250 microns)
Solids Content	By Volume 66% +/- 3%
Theoretical Coverage Rate	1059 ft ² /gal at 1.0 mils (26.0 m ² /l at 25 microns) 265 ft ² /gal at 4.0 mils (6.5 m ² /l at 100 microns) 176 ft ² /gal at 6.0 mils (4.3 m ² /l at 150 microns) Allow for loss in mixing and application.
VOC Values	As Supplied : Per EPA Method 24: 1.8 lbs/gal (216 g/l) Varies with colors and gloss

SUBSTRATES & SURFACE PREPARATION

General	Designed to be applied in a single or two coat application.
Steel	Blasted to SSPC-SP-10 to a 1.5-2.5 mil angular profile Lesser service applications – blasted to SSPC-SP-6 Surface to be free of all looser rust, dirt, grease and other contaminants.
Aluminum	Remove all surface contaminants and treat with Strathmore's Wash Primer or equivalent

Railplex 1.8 VOC HB Urethane

PRODUCT DATA SHEET



PERFORMANCE DATA

Test Method	System	Results
Adhesion (ASTM D3359)	Railplex 1.8 VOC HB Urethane	5A (not peeling or removal)
Conical Mandrel Flexibility (ASTM D522)	Railplex 1.8 VOC HB Urethane	Passes 1/8"
Hardness (ASTM D3363)	Railplex 1.8 VOC HB Urethane	H
Impact Resistance (ASTM D2794)	Railplex 1.8 VOC HB Urethane	Up to 160 lbs.in (Direct) and 160 lbs. in (Rev)
QUV Resistance (ASTM G154)	Railplex 1.8 VOC HB Urethane	4000 hours UVA-340

Chemical Resistance: No effect on film in various chemicals on 4 hrs/8hrs spot tests.

Corrosion Resistance: 500 hours salt fog over recommended primer (ASTM B117).

MIXING & THINNING

Mixing |
• Agitate thoroughly each component before combining
• Mix (combine) 4:1 by volume Part A and Part B
• Agitate thoroughly again after combining
• If necessary reduce up to 15% after combining components

Thinning | None required

Ratio | 4:1 A to B (by volume)

Pot Life | 3 hours (@70°F (21°C))

APPLICATION EQUIPMENT GUIDELINES

Listed below are general equipment guidelines for the application of this product. Job site conditions may require modifications to these guidelines to achieve the desired results.

Airless Spray |
• 45:1 Airless spray equipment
• 0.013 to 0.017
• Pump Pressure: 2500-3500 psi (17-24 MPa)

To minimize or eliminate thinner use in-line heated equipment with insulated hoses to reach application vis. Do not exceed 165°F (74°C).

APPLICATION CONDITIONS

Condition

Must be a minimum of 5oF (3oC) above the dew point during the surface preparation and coating application

CURING SCHEDULE

Surface Temp.	Dry to Handle	Dry to Touch	Maximum Recoat Time	Minimum Recoat Time
70°F (21°C)	6 Hours	2 Hours	NR	NR
72°F (22°C)	NR	NR	5 Days	8 Hours

Force Cure | If car is force dried, 1 hr minimum air dry @75°F (23°C) before oven. Then force dry @145°F (60°C) for 1 hour, adjusting for ambient maximum conditions

CLEANUP & SAFETY

Cleanup	MEK may be used for clean up. Batch mixed material will set up in the lines and equipment if left overnight. With plural component equipment, be sure to flush from the mixing head through the delivery hose and guns.
Safety	Handle with care. Before and during use, observe all safety labels on packaging and paint containers and follow all caution statements on this product data sheet. Consult Safety Data Sheet (SDS) for this product and follow all local or national safety regulations. Employ normal workmanlike safety precautions.
Ventilation	When used in enclosed areas, thorough air circulation must be used during and after application until the coating is cured. The ventilation system should be capable of preventing the solvent vapor concentration from reaching the lower explosion limit for the solvents used. User should test and monitor exposure levels to ensure all personnel are below guidelines. If not sure or if not able to monitor levels, use MSHA/NIOSH approved respirator.

PACKAGING, HANDLING & STORAGE

Packaging	55 gal drums or 5 gal pails
Shelf Life	Generally one year from date of manufacturing when kept at recommended storage conditions at 70°F (21°C) and in original unopened containers. Do not use material beyond shelf life
Storage Temperature & Humidity	Do not store at temperatures above 100°F (38°C)
Storage	Containers must be closed tightly. Do not store outside. Rotate stock.

WARRANTY

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