

SELECTION & SPECIFICATION DATA

Generic Type	Fluorourethane
Description	Premium, ultra-durable ambient cured finish meeting AAMA 605.2 performance requirements. 950 is a VOC-compliant coating that provides unparalleled color and gloss retention and exterior weathering characteristics. Available in gloss and satin finishes as well as metallic finishes with clear coats, 950 offers a level of durability for field application previously not available in the construction industry. Also can be applied directly to aged PVDF finishes.
Features	<ul style="list-style-type: none"> • Ambient temperature cure; no heat cure required • Meets AAMA 605.2 requirements (industry standard for PVDF finishes) • Exceptional weatherability • Available in a variety of Carboline colors • Excellent flow characteristics allow for application by spray or roller • Excellent graffiti resistance • VOC compliant to current AIM regulations
Color	Refer to Carboline Color Guide. Certain colors may require multiple coats for hiding.
Finish	Satin *Color variations within a batch and batch-to-batch may occur due to the metallic pigments and variations in application techniques and conditions.
Primer	Refer to Substrates & Surface Preparation
Dry Film Thickness	2 - 3 mils (51 - 76 microns) per coat
Solids Content	By Volume 38% +/- 2%
Theoretical Coverage Rate	610 ft ² /gal at 1.0 mils (15.0 m ² /l at 25 microns) 305 ft ² /gal at 2.0 mils (7.5 m ² /l at 50 microns) 203 ft ² /gal at 3.0 mils (5.0 m ² /l at 75 microns) Allow for loss in mixing and application.
VOC Value(s)	Per EPA Method 24: 3.5 lbs./gal (420 g/l) As Supplied: 2.5 lbs./gal (300 g/l) These are nominal values and may vary slightly with color. This product contains US EPA VOC-exempt solvent(s). For thinned VOC information please contact Carboline Technical Service.
Dry Temp. Resistance	Continuous: 200°F (93°C) Non-Continuous: 250°F (121°C) Slight discoloration and loss of gloss is observed above 200 °F (93 °C)
Topcoats	950 Clear for certain accent colors

SUBSTRATES & SURFACE PREPARATION

General	Surfaces must be clean and dry. Employ adequate methods to remove dirt, dust, oil and all other contaminants that could interfere with adhesion of the coating.
Steel	Prime with specific Carboline primers as recommended by your Carboline Sales Representative.

Carboxane[®] 950 Satin

PRODUCT DATA SHEET



SUBSTRATES & SURFACE PREPARATION

Galvanized Steel | Prime with specific Carboline primers as recommended by your Carboline Sales Representative.

Aluminum | Prime with specific Carboline primers as recommended by your Carboline Sales Representative.

Aged PVDF Finishes | SSPC-SP1
(A test patch adhesion check is recommended.)

Other Aged Finishes | Must attain a minimum 3B rating in accordance with ASTM D3359 "X-Scribe" adhesion test. Prime with specific Carboline primers as recommended by your Carboline Sales Representative.

PERFORMANCE DATA

Test Method	System	Results
AAMA 605.2 Paragraph 7.3 Hardness	Blasted Steel 1 ct. Epoxy 1 ct. 950 Series	Pass. 3H exceeds F hardness requirements. No rupture of film.
AAMA 605.2 Paragraph 7.4 Adhesion	Blasted Steel 1 ct. Epoxy 1 ct. 950 Series	Passes Wet, Dry and Boiling Water Adhesion Test
AAMA 605.2 Paragraph 7.5 Impact Resistance	Aluminum 1 ct. 950	Pass. No delamination after tape pull following 0.1 inch minimum deformation
AAMA 605.2 Paragraph 7.7 Chemical Resistance	Blasted Steel 1 ct. Epoxy 1 ct. 950 Series	Passes Test for Muriatic Acid, Nitric Acid, Mortar Resistance and Detergent Resistance
ASTM D3359 Adhesion	Aged Kynar 1 ct 950 Series	5A
ASTM D4541 Adhesion	Blasted Steel 1 ct. Epoxy 1 ct. 950 Series	1585 psi Pneumatic
ASTM D4585 Humidity Resistance	Blasted Steel 1 ct. Zinc 1 ct Epoxy 1 ct. 950 Series	No effect on coated surface after 3000 hours exposure
ASTM Salt Fog	Blasted Steel 1 ct. zinc 1 ct. Epoxy 1 ct. 950 Series	No effect on plane area; less than 1/32" undercutting at scribe after 3000 hours
EMMAQUA	Blasted Steel 1 ct. Zinc 1 ct. Epoxy 1 ct 950 Series	Greater than 90% gloss retention after 1252 JM/m ² UV exposure
Graffiti Resistance	Blasted Steel 1 ct Zinc 1 ct. Epoxy 1 ct 950 Series	Complete removal and no stain from all spray paints, crayons, lipstick, shoe polish and marker

Test reports and additional data available upon written request.

MIXING & THINNING

Mixing | Power mix Part A, then combine and power mix to a uniform consistency. DO NOT MIX PARTIAL KITS.

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Thinning	Spray: Up to 7 oz/gal (5.5%) w/ Thinner 25 Spray: Up to 8 oz/gal (6%) w/ Thinner 214 for hot, windy conditions. Roller: Up to 8 oz/gal (6%) w/ Thinner 234. Shake Thinner 234 well before using. Do not exceed 6% by volume. Use of thinners other than those supplied by Carboline may adversely affect product performance and void product warranty, whether expressed or implied.
Ratio	3.2 Gal. Kit: (3 gal. Part A: 0.2 gal. Part B) 1 Gal Kit: (0.94 gal. Part A: 0.06 Part B)
Pot Life	4 Hours at 75 °F (24 °C) and less at higher temperatures. Pot life ends when coating becomes too viscous to use. THIS PRODUCT IS MOISTURE SENSITIVE. AVOID MOISTURE CONTAMINATION.

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.

Spray Application (General)	The following spray equipment has been found suitable and is available from manufacturers such as Binks, DeVilbiss and Graco.
Conventional Spray	Pressure pot equipped with dual regulators, 3/8" I.D. minimum material hose, 0.070" I.D. fluid tip and appropriate air cap.
Airless Spray	Pump Ratio: 30:1 (min.)* GPM Output: 3.0 (min.) Material Hose: 3/8" I.D. (min.) Tip Size: 0.013-0.017" Output PSI: 2000-2300 Filter Size: 60 mesh *PTFE packings are recommended and available from the pump manufacturer.
Brush	Recommended for touch-up only. Use a medium bristle brush. Do not use for metallic finishes.
Roller	Use a short (mohair) or high quality medium (3/8") nap roller. A minimum of two coats may be required to attain desired appearance, hiding and recommended dry film thickness. Do not use for metallic finishes.

APPLICATION CONDITIONS

Condition	Material	Surface	Ambient	Humidity
Minimum	50°F (10°C)	40°F (4°C)	40°F (4°C)	0%
Maximum	100°F (38°C)	120°F (49°C)	95°F (35°C)	80%

Industry standards are for substrate temperatures to be above 5 °F (3 °C) the dew point. Special application techniques may be required above or below normal application conditions.

Caution: Product is moisture sensitive. Application and/or curing in humidity above maximum, or exposure to moisture from rain or dew may result in a loss of gloss and/or microbubbling of the product.

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CURING SCHEDULE

Surface Temp.	Dry to Handle	Dry to Recoat	Final Cure General
50°F (10°C)	6 Hours	6 Hours	24 Hours
75°F (24°C)	3 Hours	3 Hours	20 Hours
90°F (32°C)	2 Hours	2 Hours	16 Hours

These times are based on a 2.0-3.0 mil (50-75 micron) dry film thickness for 950. Higher film thickness, insufficient ventilation or cooler temperatures will require longer cure times and could result in solvent entrapment and premature failure.

CLEANUP & SAFETY

Cleanup	Use Thinner 2 or Acetone. In case of spillage, absorb and dispose of in accordance with local applicable regulations.
Safety	Read and follow all caution statements on this product data sheet and on the SDS for this product. Employ normal workmanlike safety precautions. Use adequate ventilation. Keep container closed when not in use.
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. In addition to ensuring proper ventilation, appropriate respirators must be used by all application personnel.
Caution	This product contains flammable solvents. Keep away from sparks and open flames. All electrical equipment and installations should be made and grounded in accordance with the National Electric Code. In areas where explosion hazards exist, workers should be required to use non-ferrous tools and wear conductive and non-sparking shoes.

PACKAGING, HANDLING & STORAGE

Shelf Life	Part A: Min. 36 months at 75 °F (24 °C) Part B: Min. 24 months at 75 °F (24 °C) Shelf Life: (actual stated shelf life) when kept at recommended storage conditions and in original unopened containers.
Storage Temperature & Humidity	40–110 °F (4-43 °C) 0-80% Relative Humidity
Storage	Store Indoors
Shipping Weight (Approximate)	1 Gallon Kit - 13 lbs (6 kg) 3.2 Gallon Kit - 38 lbs (17 kg)
Flash Point (Setaflash)	Part A: 87 °F (31 °C) Part B (Urethane Converter 811): 127 °F (53 °C)



WARRANTY

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