Origination Form

Specifications

Submittal Information			
Name:	Mateo Carvajal	**Standard Specification Section:**	975
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Date:	2026-05-21T20:28:43Z	**Associated Specs:**	562

Summary:

The revision adds water-repellent coatings as an allowable Class 5 coating option.

Justification:

The existing language needs to be revised to explicitly allow water-repellent coatings as a Class 5 option. These coatings have shown acceptable performance on Department projects through Technical Special Provisions. Adding this option to the specification will provide clearer guidance and more flexibility for District use.

Do the changes affect other types of specifications?

Neither

List Specifications Affected:

Other Affected Documents/Offices	Contacted	Yes/No
Other Standard Plans		No
Florida Design Manual		No
Structures Manual		No
Basis of Estimates Manual		No
Approved Product List		No
Construction Office		No
Maintenance Office		No
Materials Manual		No

Traffic Engineering Manual		No

Are changes in line with promoting and making progress on improving safety, enhancing mobility, inspiring innovation, and fostering talent; explain how?

This change supports innovation by allowing an additional coating option that has demonstrated acceptable performance on Department projects and provides greater flexibility in selecting suitable materials.

What financial impact does the change have; project costs, pay item structure, or consultant fees?

N/A

What impact does the change have on production or construction schedules?

N/A

How does this change improve efficiency or quality?

This change improves efficiency by expanding allowable coating options within the specification and reducing the need for project-specific Technical Special Provisions for coatings that have already shown acceptable performance.

Which FDOT offices does the change impact?

State Materials Office, District Maintenance Offices

What is the impact to districts with this change?

Districts will have greater flexibility to select an additional acceptable coating type for Class 5 applications without relying on a project-specific Technical Special Provision.

Does the change shift risk and to who?

N/A

Provide summary and resolution of any outstanding comments from the districts or industry.

Comments and Responses are available on the Track the Status of Revisions hyperlink located on the Specifications landing page: https://www.fdot.gov/specifications/default.shtm

What is the communication plan?

Through the established specification revision process (e.g., Internal and Industry Review)

What is the schedule for implementation?

The Standard Specifications eBook and Workbook are effective July 1st every year.

STRUCTURAL COATING MATERIALS
(REV 5-26-26)

ARTICLE 975-1 is deleted and the following substituted:

975-1 General Requirements.

975-1.1 General: Upon curing, all coatings and/or coating systems must produce an adherent coating that is visually uniform. The composition of the coating is left to the discretion of the manufacturer but the finished product shall meet all requirements of this Section. All coats of multi-coat systems shall be supplied by the same manufacturer. Multi-component coatings shall be prepackaged in the required ratios.

975-1.2 Environmental Requirements: Coating materials and their waste shall be characterized as non-hazardous as defined by Resource Conservation and Recovery Act (RCRA) Subarticle C rules, Table 1 of 40 CFR 261.24 Toxicity Characteristic.

Volatile Organic Compounds (VOC) shall be less than 3.5 pounds per gallon when tested in accordance with ASTM D3960.

975-1.3 Approved Product List (APL): ~~All polymeric coating materials except the materials in 975-4 shall be listed on the Department's Approved Product List (APL). Manufacturers seeking evaluation of their products shall submit the product data sheets, performance test reports from AASHTO Product Evaluation & Audit Solutions, or an independent laboratory showing that the product meets the requirements of this Section~~, a ~~Product SDS or performance test reports showing percent weight compositional analysis including Chemical Abstract Number, ACGIH time weighted average and ceiling exposure limits for all components, lower and upper explosive limits, flash point, boiling point, amount of volatile organic compounds by weight, and specific gravity for each component of the coating system, and a APL application in accordance with Section 6.~~All materials shall be one of the products listed on the Department's Approved Product List (APL). Manufacturers seeking evaluation of their product shall submit an application in accordance with Section 6 and include the documentation identified in Table 975-1.

Table 975-1
APL Required Documentation

Documentation	Requirements
Product Photo	Provide product photos that display the significant features of the product.
Technical Data Sheet	Provide product data sheets that uniquely identifies the product and includes product specifications, storage instructions, and recommended installation materials and equipment as applicable.
Product label and Packaging	Materials shall be shipped in containers legibly marked with application instructions, lot number, batch number, date of manufacture, shelf life, and Department APL number. Each lot or batch manufactured must have a unique number.

Safety Data Sheet (SDS)	Provide SDS meeting OSHA requirements for product and manufacturer recommended installation materials as applicable. Non-Hazardous, per RCRA Subtitle C Table 1 of 40 CFR 261.24 "Toxicity Characteristic" and not exude fumes which are hazardous, toxic, or detrimental to persons or property.
Independent Lab Test Report	Provide test reports as required for each product, showing that the product meets this specification. Reports may come from: 1. an independent testing lab, conducted in accordance with the specification requirements. Laboratories used must be independent from the manufacturer unless otherwise stated in the specification. 2. AASHTO Product Evaluation & Audit Solutions Test Report in accordance with the specifications. Testing reports cannot be reused for the same product requalification. Samples for testing reports must be supplied from current production. Product SDS or performance test reports showing percent weight compositional analysis including Chemical Abstract Number, ACGIH time weighted average and ceiling exposure limits for all components, lower and upper explosive limits, flash point, boiling point, amount of volatile organic compounds by weight, and specific gravity for each component of the coating system.
Manufacturer's Instructions	Manufacturer's instructions must include surface preparation details.
Coating Identification	When applicable, the Department will conduct Fourier Transform Infrared Spectroscopy (FTIR) analysis on coating system components for material identification.
Product Sample (for APL listing)	A sample may be requested to verify the product. If the product is a system, a sample of each component must be submitted. Prepare samples in accordance with the product specific requirements of this Section.

~~**975-1.4 Packaging and Labeling:** Materials shall be shipped in containers legibly marked with application instructions, lot number, batch number, date of manufacture, shelf life, and Department APL number. Each lot or batch manufactured must have a unique number.~~

~~**975-1.5 Coating Identification:** When applicable, the Department will conduct Fourier Transform Infrared Spectroscopy (FTIR) analysis on coating system components for material identification.~~

ARTICLE 975-6 is deleted and the following substituted:

975-6 Class 5 Applied Finish Coatings.

975-6.1 General: All coatings shall possess physical properties and handling characteristics compatible with the application requirements of Section 400. Unless otherwise specified, the color of the finish coat shall meet FED-STD-595, Table VIII, Shade No. 36622, or

No. 36642 for uncoated weathering steel bridges. Upon request, submit a one-quart wet sample of each component of each coating system to the SMO.

~~**975-6.2 Coating Requirements:** Prepare four, 4 inch by 8 inch (except as required below) fiber cement test panels with a mass of 7 to 9 pounds per square foot of surface area to perform the laboratory tests. Apply the finish coating to each test panel at a rate of 50 square feet per gallon, plus or minus 10 square feet per gallon. Seal the corners of all test panels with a high build epoxy or equivalent to prevent moisture ingress at corners and cut edges. Submit the samples to an independent laboratory for testing. Coating performance shall meet the requirements in Table 975-5. Upon request, submit a one quart wet sample of each component of each coating system to the SMO.~~

975-6.2 Textured Finish Coatings: Submit the samples to an independent laboratory for testing. Textured finish coatings shall meet the requirements in Table 975-5.

975-6.3 Water-Repellent Coatings: Submit the samples to an independent laboratory for testing. Water-Repellent coatings shall meet the requirements in Table 975-5 and shall be of water-based silicone acrylic.

Table 975-5
Class 5 Applied Finish Coatings Performance Requirements

Laboratory Testing		
Property	Test Method	Acceptance Criteria
Resistance to Wind Driven Rain	ASTM D6904	No visible water leaks, and if the rear face of the block is damp, the average gain in weight of the three 8”x16”x2” blocks must be less than 0.2 lb.
Freeze ~~t~~Thaw ~~r~~Resistance	AASHTO R 31 Test No. 6	No disbondment
Water Vapor Transmission	ASTM D1653 ~~;~~Method B ~~,~~Condition C	WVT≥10 perms
Abrasion Resistance	ASTM D968, 3,000 ~~l~~Liters of ~~s~~Sand	No loss of coating thickness per ASTM D6132
Salt Spray (~~f~~Fog) ~~r~~Resistance	ASTM B117 ~~,~~2,000 hours	No disbondment
Fluorescent UV-Condensation Exposure	ASTM D4587 ~~,~~2000 hours ~~,~~4 hours UV ~~,~~4 hours ~~c~~Condensation	No blistering per ~~(~~ASTM D714.~~),~~ No cracking ~~(visual),~~ or delamination. ~~(visual). c~~Chalking rating no less than 8~~(~~ per ASTM D4214 Method D~~)~~ ~~rating no less than 8~~.
Fungal Resistance	ASTM D3273	Rating of 10 per ~~,~~ASTM D3274