

SECTION 09 25 13 - DECORATIVE CEMENTITIOUS WALL VENEER**PART 1 GENERAL****1.01 SECTION INCLUDES**

- A. Durable, decorative polymer-based cementitious wall veneer.

1.02 RELATED SECTIONS

- A. Section 03 30 00 - Cast-in-Place Concrete: Concrete wall substrate.
- B. Section 04 20 00 - Unit Masonry: Concrete masonry unit or brick substrate.
- C. Section 09 21 16 - Gypsum Board Assemblies: Gypsum board or plaster base substrate.
- D. Section 09 30 00 - Tiling: Ceramic tile substrate.

1.03 ALLOWANCES

- A. See Section 01 21 00 (01210) - Allowances, for cash allowances affecting this section.

1.04 UNIT PRICES

- A. See Section 01 22 00 (01270) - Unit Prices, for additional unit price requirements.
- B. Decorative Cementitious Wall Veneer: By the square foot (meter). Includes three-coat system in-place, over acceptable substrate.

1.05 REFERENCES

- A. ASTM B 117 - Standard Practice for Operating Salt Spray (Fog) Apparatus.
- B. ASTM C 150 - Standard Specification for Portland cement; 2004a.
- C. ASTM C 588 - Standard Specification for Gypsum Base for Veneer Plaster.
- D. ASTM D 822 - Standard Practice for Filtered Open-Flame Carbon-Arc Exposures of Paint and Related Coatings.
- E. ASTM D 2370 - Standard Test Method for Tensile Properties of Organic Coatings; 2002.
- F. ASTM D 2486 - Standard Test Method for Scrub Resistance of Wall Paints: 2000.
- G. ASTM D 3730 - Standard Guide for Testing High-Performance Interior Wall Coatings.
- H. ASTM E 84 - Standard Test Method for Surface Burning Characteristics of Building Materials.

1.06 DEFINITIONS

- A. Cementitious: Any product containing more than 18% Portland cement.

1.07 SYSTEM DESCRIPTION

- A. Two or more applications of a mix of Portland cement and acrylic copolymers.

1.08 PERFORMANCE REQUIREMENTS

TEST	PROPERTY	TEST RESULTS
ASTM C 501	Wear Resistance	Wear Index 14.5 C-17 wheel
ASTM C 609	Tensile Strength	460 psi
ASTM C 638	Elongation (Crack Bridging)	600% (EM-100-N)
ASTM D 2370	Elongation, tensile strength & stiffness	To be determined, Currently undergoing testing.
ASTM D 3730	Stain & Abrasion	To be determined. Currently undergoing

	Resistance	testing.
ASTM E 84	Fire Test	System Rated Class A
Environmental	VOC	Zero, non-toxic, odorless

1.09 SUBMITTALS

- A. See Section 01 30 00 (01300) - Administrative Requirements, for submittal procedures.
- B. Product Data: Provide manufacturer's literature indicating product performance characteristics for each different surface texture.
- C. Shop Drawings: Indicate wall surfaces to receive product.
- D. Samples: Submit minimum of two substrate panels with cured applied coatings, 7-1/2 x 11 inches (190 x 275 mm) in size, illustrating surface texture and color.
- E. Large Samples: Submit minimum of two portable panel samples, 4 feet (1220 mm) by 4 feet (1220 mm), illustrating texture and color. Deliver to office or field location determined by Architect.
- E. Test Reports: Indicate wear resistance and crack bridging characteristics.
- F. Certificates: Certify that products of this section meet or exceed specified requirements.
- G. Manufacturer's Instructions: Indicate installation.
- H. Maintenance Data: Manufacturer's recommended measures for cleaning soiled surfaces.
- I. Warranty: Submit manufacturer form of warranty and ensure that forms have been completed in manufacturer's name.

1.10 QUALITY ASSURANCE

- A. Source Limitations: Obtain Decorative Cementitious Wall Veneer products, including base, layering and finish coat products from a single manufacturer.
- B. Manufacturer - Installer Qualifications: Company specializing in manufacturing and field installing products specified in this section, with not less than three years of documented experience.

1.11 MOCK-UP

- A. As a substitute for fixed location field mock-ups, provide large portable samples specified in Article 1.09, Submittals, above.

1.12 PRE-INSTALLATION MEETING

- A. Convene one week before starting work of this section.

1.13 DELIVERY, STORAGE, AND PROTECTION

- A. Deliver product ingredients to project site in sealed waterproof containers.
- B. Store products under cover and elevated above grade.

1.14 PROJECT CONDITIONS

- A. Coordinate product installation with size, location and installation of service utilities.

1.15 ENVIRONMENTAL REQUIREMENTS

- A. Maintain temperature at 70 degrees F during and after installation of coating mix.

1.16 WARRANTY

- A. See Section 01 78 00 (01780) - Closeout Submittals, for additional warranty requirements.

- B. Correct defective Work within warranty period after Date of Substantial Completion.

PART 2 PRODUCTS

2.01 MANUFACTURERS

- A. DFB Sales, Inc., 21-07 Borden Ave., LIC, NY 11101, 718.707.0007: www.DFBstudio.com, Product Vitruv.
- B. Substitutions: See Section 01 60 00 (01600) - Product Requirements: No substitutions.

2.02 MATERIALS

- A. Durable Decorative Cementitious Wall Veneer: Three or four separate layer mixes and an optional clear gloss coating provided by manufacturer.
 - 1. Reinforcing Fabric: Glass fiber, 9 x 9 mesh, self adhesive
 - 2. Base Coat: Factory apportioned cementitious copolymer mix for field mixing.
 - 3. Layering Coat(s): Cementitious copolymer mix for field mixing.
 - 4. Finish Coat: Cementitious copolymer mix for field mixing.
 - a. Finish Surface:
 - 1) Carrera: Rough grainy cement creates a highly textured concrete look.
 - 2) Shattered Matrix: Combination of rough and fine cement layers creates an organic travertine-like stone appearance.
 - 3) Buttercoat: Fine cement buttered onto surface creates a smooth marble-like finish.
 - 4) Custom Surface Texture:
 - b. Color: As selected by Architect.
 - 5. Top Coating: Clear, tinted, reflective or textured acrylic application.

2.03 MIXES

- A. Field mix factory apportioned cementitious copolymer mix.

PART 3 EXECUTION

3.01 EXAMINATION

- A. Verify that substrates are ready to receive work.
- B. Verify masonry mortar joints are cut flush; verify surface is ready to receive work of this section. Verify no bituminous or water repellent coatings exist on masonry surface.
- C. Verify concrete surfaces are flat, honeycombs are filled flush, and surface is ready to receive work of this section. Verify no bituminous, water repellent, or form release agents exist on concrete surfaces.
- D. Verify gypsum board substrate is flat, joints are taped and sanded, edges are trimmed with J-trim or L-trim molding or reveal made for joint compound finishing, and surface is ready to receive work of this Section. Verify joint and surface perimeter accessories are in place.
- E. Verify gypsum plaster base is flat, edges are trimmed with J-trim or L-trim molding or reveal made for joint compound finishing, smooth and surface is ready to receive work. Verify joint and surface perimeter accessories are in place.

3.02 PREPARATION

- A. Clean surfaces of dust or loose matter.
- B. Concrete: Prepare with high pressure wash and mechanical means to remove laitance, weak surface material, grease, oil, paint or other contaminants that affect a bond.
- C. Remove projections greater than 1/8 inch (3 mm) and fill depressions greater than 1/4 inch (6 mm) with Portland cement mortar.

- D. Apply color tinted bond coat to prepare masonry surfaces within 24 hours of cementitious copolymer veneer application. Apply in accordance with manufacturer's instructions.

3.03 INSTALLATION - CEMENTITIOUS VENEER

- A. Install three or four layer decorative cementitious wall veneer in accordance with manufacturer's instructions.
- B. For Vitruv Carrera Surface: Apply two coats untinted rough cement and one coat tinted cement for a three coat application, excluding topcoat(s).
- C. For Vitruv Shattered Matrix Surface: Apply two coats untinted rough cement and two coats tinted cement for a four coat application, excluding topcoat(s).
- D. For Vitruv Buttercoat Surface: Apply two coats untinted cement and one coat tinted cement.
- E. Apply clear, tinted, textured or reflective acrylic topcoat(s)

3.04 FIELD QUALITY CONTROL

- A. Hand apply in constant environmental conditions by same applicator to obtain consistent appearance
- B. Perform field inspection and compare to approved mock-up or control sample.

3.05 PROTECTION

- A. Protect applied product until space is transferred to Owner. Do not permit traffic near unprotected surfaces. Protect from other construction activity until accepted by Owner.

3.06 SCHEDULES

- A. Room No. _____, surface finish _____.
- B. Room No. _____, surface finish _____.

END OF SECTION