



# **FACADESXi**

---

**FACADEONE IRONCLAD XI-SERIES  
WALL ASSEMBLY**

# TABLE OF CONTENTS

<b>LIMITATIONS</b>	3
<b>PART 1 - GENERAL</b>	4
1.1 SECTION INCLUDES	4
1.2 RELATED SECTIONS	4
1.3 REFERENCES	4
1.4 SUBMITTALS	5
1.5 DESIGN CRITERIA	5
1.6 QUALITY ASSURANCE	6
1.7 PERFORMANCE CRITERIA	6
1.8 DELIVERY/STORAGE/HANDLING	7
1.9 PROJECT CONDITIONS	7
1.10 COORDINATION AND SCHEDULING	7
1.11 WARRANTY	7
<b>PART 2 - PRODUCTS</b>	7
2.1 MANUFACTURER	7
2.2 SYSTEM/MATERIALS	7
<b>PART 3 - INSTALLATION/EXECUTION</b>	10
3.1 EXAMINATION	10
3.2 PREPARATION	10
3.3 APPLICATION	10
3.4 QUALITY CONTROL	11
3.5 CLEANING	12
3.6 PROTECTION	12

# FACADESXi FACADES ONE IRONCLAD XI-SERIES WALL ASSEMBLY

CSI SECTION 09 24 23 CEMENT STUCCO

This specification is to assist in correctly specifying the FACADESXi FacadesOne IronClad Xi-Series Assembly, products and installation and should be used in conjunction with Assembly Details. The stucco assembly includes WaterShield water resistive air barrier, drainage mat, continuous insulation, code compliant lath, one coat cement-based stucco (3/8 inch thick), reinforced polymer modified base coat, primer and acrylic finish.

The specifier MUST edit these specifications to fit the needs of each specific project and the design is the responsibility of the specifier to determine if a product is applicable.

FACADESXi Wall systems provides these specifications, Typical Assembly details, and product data sheets for use in the design of the project.

FACADESXi is not liable for any errors or omissions in design details, structure capability, attachment details, or shop drawings. See Full Disclaimer at end of document.

Although not a part of the FacadesOne IronClad Xi-Series Assembly, flashings and sealants are elements of all exterior wall assemblies and must be designed, integrated and installed, in conjunction with the wall cladding to create an air and water-resistant assembly. Stucco Wall assemblies will allow water to flow through it; the wall should be designed for this consideration.

Construction Types: I-V, Fire Rated and Non-combustible, Commercial and Residential Non-combustible and Fire Rated construction: ensure that the system chosen has been tested and is compliant with the necessary tests for these assemblies.

## LIMITATIONS

- Ambient / surface temperature must remain above 40°F (4°C) during and for 24-hours after set occurs.
- Efflorescence is a natural occurrence when using cement-based products subject to exterior or wet environments and is not a defect of the product.
- Cracking will occur in portland cement stucco, as is with any Portland cement-based product, and is not a defect of the product. Cracking can be minimized by following best practices, including proper installation of lath, proper use of control and expansion joints, proper sand selection, proper mix proportions, limit excess water, moist curing of the stucco, and proper sequencing of construction to avoid stresses.
- For use on vertical above grade walls only.
- Moist curing must be provided.
- Where snow may occur, increase the distance required between grade and the stucco and increase the slope requirement of the Stucco and Foam Shapes
- Maintenance is Required with periodic cleaning, repair of cracks and impact damage, if they occur, and/or recoating to enhance appearance of weathered finish.
- Dark colors show more efflorescence and imperfection in the stucco base coat compared to light colors. With Foam Shapes, select a color with a light reflectance value (LRV) of 20 percent or higher. EPS has a service temperature limitation of approximately 160 degrees F (71 degrees C).

Contact FACADESXi technical services to assist in appropriate product selection.

*Notes to Specifier are in White Italics and should be deleted before publishing.*

*[Select or Delete] Assembly Options. Choose one and delete the remaining options. Delete the brackets and un-bold the selected option(s).*

*<Text> Include the appropriate information.*

*FacadesOne Stucco base can be installed in one pass at  $\frac{3}{8}$ "  $\frac{1}{2}$ " – in one or two passes. Choose the thickness desired.*

*Primer is an Optional Layer that will enhance the color uniformity of the acrylic finish coat, especially in hot weather.*

## **PART 1 - GENERAL**

### **1.1 SECTION INCLUDES**

- A. Materials and installation of an exterior stucco assembly including: WaterShield water resistive and barrier, means of drainage, continuous insulation, code compliant lath, [ $\frac{3}{8}$ "] [ $\frac{1}{2}$ "] one coat stucco base coat, [OPTIONAL reinforced base coat for crack resistance], [primer] and 100% acrylic textured finish coat**

### **1.2 RELATED SECTIONS**

- A. Section 03 30 00 Cast in Place Concrete**
- B. Section 04 20 00 Unit Masonry**
- C. Section 06 11 00 Wood Framing**
- D. Section 06 16 00 Sheathing**
- E. Section 07 27 00 Air barriers**
- F. Section 07 60 00 Flashing and Sheet Metal**
- G. Section 07 90 00 Joint Protection**
- H. Section 08 40 00 Entrances, storefronts, curtain walls**
- I. Section 08 50 00 Windows**
- J. Section 09 22 00 Supports for Plaster and Gypsum Board**
- K. Section 09 22 36 Lath**
- L. Section 09 21 16 Gypsum Board Assemblies**

### **1.3 REFERENCES**

- A. ASTM**
  - 1. C144 Specification for Aggregate for Masonry Mortar
  - 2. C847 Standard Specification for Metal Lath
  - 3. C897 Standard Specification for Aggregate for Job-Mixed Portland Cement-Based Plaster
  - 4. C1177 Specification for Glass Mat Gypsum for Use as Sheathing
  - 5. D226 Standard Specification for Asphalt-Saturated Organic Felt Used in Roofing and Waterproofing
  - 6. D1784 Specification for Rigid Poly (Vinyl Chloride) (PVC) Compounds and Chlorinated Poly (Vinyl Chloride) (CPVC) Compound
  - 7. E84 Test Method for Surface Burning Characteristics of Building Material
  - 8. E119 Standard Test Methods for Fire Tests of Building Construction and Materials
  - 9. E330 Test Method for Structural Performance of Windows, Curtain Walls, and Doors by Uniform Static Air Pressure Difference
  - 10. E2430 Standard Specification for Expanded Polystyrene ("EPS") Thermal Insulation Boards For Use in Exterior Insulation and Finish Systems ("EIFS")
  - 11. G155 Standard Practice For Operating Xenon Arc Light Apparatus For Exposure Of Non-Metallic Materials
- B. APA**

1. Voluntary Product Standard: PS 1, Structural Plywood
  2. Voluntary Product Standard: PS 2, Performance Standard for Wood Based Wood structural panels.
- C. ACCEPTANCE CRITERIA AC11 - Cementitious Exterior Wall Coatings**
- D. NFPA**
1. NFPA 285 Standard Fire Test Method for Evaluation of Fire Propagation Characteristics of Exterior Wall Assemblies Containing Combustible Components
  2. NFPA 268 Standard Test Method for Determining Ignitability of Exterior Wall Assemblies Using a Radiant Heat Energy Source

#### 1.4 SUBMITTALS

- A. Submit under the provisions of Section [01 33 00]**
- B. Product data on assembly materials, including specifications, assembly details, installation and warranty information**
- C. Current Manufacturer's Code Evaluation Report**
- D. Shop drawings to be provided by the subcontractor.**
- E. Samples: two 6 inches by 6-inch finish coat sample per designers' request**
- F. Lath Fasteners pull-out testing, if outside of the Evaluation Report Scope of Wind Loads allowances**

#### 1.5 DESIGN CRITERIA

- A. Structural**
  1. Maximum deflection not to exceed  $L/360$  of the span under positive or negative design load.
  2. Structural Design for wind load shall be engineered by others. See Evaluation report for Wind Load limitations.
- B. Moisture / air control**
  1. The exterior wall must be designed and installed to allow moisture to drain to the exterior in accordance with the International Building codes.
  2. Do not use vapor retarders on the interior side of the wall. Using vapor retarders on the exterior is the decision of the designer.
  3. Design flashing to direct water to the exterior, including above window and door heads, window and door sills, at roof/ wall intersections, decks, Floor lines, high to low wall intersections, at the base of the wall, and where required by code and in the project details.
- C. Fire Rated Assemblies / Non-combustible Assembly**
  1. Ensure that the assembly complies with an associated UL assembly, Fire rated assembly, Non-combustible, NFPA 285 tested, or listed in the code compliance report.

**NOTE TO SPECIFIER:** It is not the responsibility of the contractor to determine the placement of control and expansion joints or their design. The project designer must determine the placement and size of all joints.

One coat stucco is a proprietary wall assembly that does not require that the lath be dis-continuous behind control joints, however if this desired by the designer, then this section should be modified and the framing must be designed to accommodate this.

- D. System Joints**
  1. Locate control joints on the vertical wall every 144 square foot minimum with a maximum length or width of 18 lineal ft. and a maximum length to width ration of 2.5: 1
  2. Plaster base may be continuous or discontinuous at locations of control joints. If the plaster base is to be discontinuous, additional framing must be provided so that the plaster base may be securely fastened to a framing member at both sides of the control joint, and the control joints wire tied to the plaster base.
  3. For continuous plaster base, the control joint shall be installed over the plaster base and wire tied to it. Vertical control joints shall be continuous, with horizontal control joints abutting them and set in a bead of sealant.
  4. Two Piece Expansion joints are required at building expansion joints, at floor lines, where dissimilar materials

meet, or other areas where movement in the structure is anticipated. Sheathing must not span these breaks in construction.

5. The placement of the control joints, expansion joints, is not the responsibility of the contractor. Designer to show placement on the project drawings.

**E. Stucco installation**

1. FaçadesOne is not to be used below grade or on walls with negative water pressure.
2. Stucco terminates a minimum of 4 inch (100 mm) above earth grade, minimum 2 inch (51 mm) above finished grade.
3. Stucco should be used on vertical walls only.

**F. Foam Shapes**

1. Horizontal/Sloped surfaces of Foam shapes must be coated with FACADESXi - WaterLock
2. Slope Minimums; Standing Snow areas – 6:12, No Standing Snow - 3:12
3. Horizontal surfaces will gather dirt easier than vertical walls and require more consistent maintenance.

## 1.6 QUALITY ASSURANCE

**A. Manufacturer**

1. Stucco product has been installed for over 20 years on over 10 million square feet.

**B. Applicator**

1. Listed by FACADESXi Wall Systems. Licensed, insured and engaged in application of stucco and coatings for a minimum of 3 years.
2. Employ mechanics who are skilled and experienced in stucco applications and knowledgeable in the FACADESXi One Coat Evaluation Report.

**C. Conform to all applicable building code requirements.**

**D. Construct one sample panel<SIZE> in the field for each color and texture, using the same methods to be used in the actual construction. Maintain on jobsite**

**E. Third party inspection where required by code or contract documents, are to be contracted by the owner. Inspections are not performed by the stucco manufacturer.**

## 1.7 PERFORMANCE CRITERIA

**A. Air /Weather Barrier**

1. Water/Air Barrier Coatings: Compliant with Acceptance Criteria 212/ASTM E2570 Water-resistive Coatings Used as Water-resistive Barriers over Exterior Sheathing
2. Slip Sheet: Water/Air Barrier Sheet goods: Compliant with Acceptance Criteria 38 or Water-resistive Barriers Building Paper: As per the International Building/Residential Code

**B. Stucco Base**

1. In compliance with International Code Council AC 11 for Acceptance Criteria For Cementitious Exterior Wall Coatings
2. Accelerated Weathering Test, ASTM G155, after 2,000 hours Surface changes do not result in cracking, checking, crazing, erosion, or chalking.
3. Freeze Thaw Resistance: AC 11 Criteria, No sign of deleterious effects after 10 cycles when examined under 5x magnification.
4. Transverse Loads: See Evaluation Report
5. Fire Rated Assemblies: See Evaluation Report

## 1.8 DELIVERY/STORAGE/HANDLING

**A. Deliver, store and handle products per product data and under Section [ ]**

**B. Deliver FACADESXi materials in original unopened packages with labels intact.**

**C. Protect FACADESXi materials during transportation and installation to avoid physical damage.**

**D. Protect Portland cement-based material (bag products) from moisture and humidity. Store under cover and off the ground in a dry location.**

**E. Store FACADESXi materials in cool, dry place, out of direct sunlight, protect from freezing.**

- F. Store insulation boards in original packaging, flat and out of heat and direct sunlight.

## 1.9 PROJECT CONDITIONS

- A. Ambient and surface temperature must be above 40 degrees F during application and for 24 hours after application of FACADESXi materials.
- B. Provide supplementary heat /shading for installation, if necessary, to maintain minimum or maximum allowable temperatures.
- C. Prevent uneven or excessive evaporation of moisture from base coat during dry, hot weather. Do not install coatings in temperatures above 100 F.
- D. Protect surrounding areas and adjacent surfaces from application of materials.

## 1.10 COORDINATION AND SCHEDULING

- A. Interior drywall, all floor, roof construction and other work that imposes dead loads on the walls should be completed prior to the FacadesOne Wall System to prevent excessive deflection and help prevent cracking of the stucco.
- B. Coordinate and schedule installation of FACADESXi with related work; windows, doors, flashing, AC units, foundation waterproofing, roofing, trim, flashing, and joint sealers; to prevent water infiltration behind and the drainage of the system.
- C. Protect sheathing per industry and/or sheathing manufacturer's instructions.
- D. Install sealant immediately after stucco finish has dried.
- E. Attach penetrations through the stucco per FACADESXi Application Details.

## 1.11 WARRANTY

- A. Provide FACADESXi Wall systems limited material warranty under project provisions.
- B. See FACADESXi Warranty Technical Document for specific warranties available.

# PART 2 - PRODUCTS

## 2.1 MANUFACTURER

FACADESXi, 15262 Capital Port, San Antonio TX 78249 | 1.833.899.0787 | [www.FACADESXi.com](http://www.FACADESXi.com) | [technical@facadesxi.com](mailto:technical@facadesxi.com)

## 2.2 SYSTEM/MATERIALS

- A. **System:** FacadesOne IronClad Xi-Series Wall system: Substrate, water resistive barrier, drainage mat, code compliant lath, one coat stucco, fiberglass mesh reinforced base coat, [primer], acrylic integrally colored finish coat.
- B. **Materials**
  - 1. Air/Weather Barrier
    - a. WaterShield Assembly
      - 1) WaterShield – Liquid applied air/ water barrier.
      - 2) WaterShield Joint Mesh– Reinforcement for Watershield over joints and gaps
      - 3) WaterShield - SAF Self Adhered Flashing peel and stick WaterShield Flashing Tape: Primer-Free peel and stick Tape designed for use with stucco and EIFS systems The polyester fabric top layer provides an excellent bonding surface for cementitious and synthetic stucco coatings.
      - 4) Xi-FlashFill: Gunnable, or Trowelable waterproofing Sealant applied at 12 mils.

*This system requires a means of drainage between the water barrier and the insulation.*

- 2. Drainage Mat: Randomly oriented, geometric patterned drainage and ventilation mat or equal.]



3. XI Continuous Insulation
  - b. Expanded polystyrene; ASTM C578, Type I (over solid sheathing)
    - 5) Flame spread less than 25, smoke developed less than 450 per ASTM E84, UL 723.
    - 6) Minimum thickness as indicated on drawings minimum 3/4" (19 mm)
  - b. Extruded polystyrene; ASTM C578, Type IV.
    - 1) Flame spread less than 25, smoke developed less than 450 per ASTM E84, UL 723.
    - 2) Minimum thickness as indicated on drawings minimum 19 mm (3/4").
  - c. Polyisocyanurate insulation board
    - 1) Minimum thickness as indicated on drawings 25mm (1")
4. Lath (by others) Select One
  - a. [Welded Wire Lath: No. 20 gauge, meeting ASTM C933 Standard Specification for Welded Wire Lath or have code recognition as equal, galvanized steel, woven-wire fabric. Furring crimps shall be provided at maximum 6-inch (152 mm) intervals each way.]
  - b. [Woven-Wire Lath: No. 20 gauge, meeting ASTM C1032 Standard Specification for Woven Wire Plaster Base.]
  - c. [Expanded metal lath Minimum 2.5 lb/yd<sup>2</sup> (1.4 kg/m<sup>2</sup>), meeting ASTM C847 Specification for Metal Lath. Furring crimps shall be provided at maximum 6-inch (152mm) intervals each way and shall fur the body of the lath a minimum of 1/4-inch (6.4mm) from the substrate after installation.]
  - d. [Plastic Lath that maintains a current code report as equal to the lath required.]
  - e. When the base coat thickness is 1/2-inches (12.7 mm) thick or less, the body of metal plaster base shall be furred a nominal of 1/8-inch (3.2 mm) from the substrate
  - f. Lath Fasteners per FacadesOne Evaluation Report for the specific framing, Wind load, fire rated assembly. Pull-out or withdrawal capacity of the selected fastener must be verified with respect to anticipated wind load, desired safety factor and building code requirements.
5. Accessories
  - a. Lathing accessories in conformance with ASTM C1861 Specification for Lathing and Furring Accessories, and Fasteners, for Interior and Exterior Portland Cement-Based
  - b. PVC in compliance with ASTM D 1784.
  - c. Zinc in compliance with ASTM B69.
  - d. Galvanized metal in compliance with ASTM A653 with G60 coating.
6. Stucco
  - a. FaçadesOne Concentrate: Proprietary fiber reinforced One coat portland cement stucco concentrate, mixed with sand in the field.
  - b. FaçadesOne Sanded: Proprietary pre-Blended, sanded, fiber reinforced One coat portland cement stucco mixed with water in the field.
  - c. Sand: ASTM C 897 or ASTM C 144, per FacadesOne Evaluation Report
  - d. Water: Clean and potable.
7. Fracture Stop - Crack Resistance Layer
  - a. Base Coat: [Xi-Dry Acrylic Base Coat or Xi-Acrylic Base Coat: Dry polymer containing Portland cement mixed with water in the field or 100% acrylic base coat mixed with Portland cement in the field.]
  - b. Reinforcing Mesh: Xi-Mesh Standard Reinforcing Mesh: 4. 2 oz/ yd<sup>2</sup> open weave glass fiber coated reinforcing mesh.]
8. [Foam Shapes
  - a. Insulation board: Expanded Polystyrene (EPS), Nominal 1.0 lb/ft<sup>3</sup> (16 kg/m<sup>3</sup>) in compliance with ASTM C578 Type I /ASTM E2430.
  - b. Foam shape thickness for Non-combustible construction is limited to 4" in thickness.



- c. Base Coat:
  - 1) Xi-WaterLock: Waterproof Base Coat for Sloped surfaces - acrylic-based, fiber-reinforced, waterproofer mixed with Portland cement in the field.
  - 2) Xi-Acrylic Base Coat/Xi-Dry Acrylic Base Coat: 100% acrylic base coat mixed with Portland cement in the field or Dry polymer mix containing Portland cement mixed with water in the field.
- d. Reinforcing Mesh: Facades Xi-Mesh Standard Reinforcing Mesh: 4.5 oz/ yd<sup>2</sup> open weave glass fiber coated reinforcing mesh.]

Specifiers note: the use of primer will enhance the color uniformity of the acrylic finish coat, especially in hot weather. If the pH of the stucco surface is greater than 10, the primer must be used to lower the pH. Xi-FastPrime may lower the pH faster, see Product datasheet.

- 9. [Xi-Primer] [Xi-FastPrime] (OPTIONAL PER SPECIFIER): 100% Acrylic tintable primer]
- 10. Xi-Textured Acrylic Finish Coat
  - a. 100% Acrylic polymer, dirt pick up resistant textured finish coat water based acrylic coating with integral color and texture.
  - b. Color:
  - c. Texture: Xi-Smooth, XI- Ultra Fine Sand .75 Xi-Fine Sand 1.0 Xi-Medium Sand 1.25 Xi Coarse Sand 1.5 Xi-Fine Swirl 1.5 Xi- Coarse Swirl 2.0

## PART 3 - INSTALLATION/EXECUTION

### 3.1 EXAMINATION

- A. **Verify the following:**
  - 1. Substrate is allowable and code compliant.
  - 2. Surfaces must be free of mildew, dirt, efflorescent, oils, damage deterioration or any foreign materials.
  - 3. Surfaces must be free from excessive moisture; moisture content should be recorded before installation of the water barrier materials.
  - 4. Openings, Roofs, terminations have been properly flashed
- B. **Substrate – Fire Rated wall should be per the assembly - Choose one**  
 [½" minimum Exterior Glass mat gypsum Sheathing complying with ASTM C1177]  
 [½" minimum Exterior fiber reinforced cement sheathing complying with ASTM C1325] [½" minimum APA Exposure 1 or exterior plywood (Grade C/D or better)]  
 [½" minimum APA Exposure I OSB] [Gypsum sheathing (ASTM C79/C1396)]  
 [Other substrate, or Painted as approved by Facades XI]
- C. **Unsatisfactory conditions shall be corrected before the installation of any FACADESXi System materials. The contractor must notify the general contractor and/or owner and /or architect of all discrepancies. Do not proceed with water/air barrier until conditions are resolved.**

### 3.2 PREPARATION

- A. **Framing, Sheathing, Substrate**
  - 1. Sheathing must be installed per the applicable manufacturer /industry standards.
- B. **Flashing**
  - 1. Head, jamb and sills of all openings must be flashed in conjunction with the water /air barrier per project details and to create positive drainage.
  - 2. Roof Flashing, Kick out Flashing must be installed per project design
  - 3. Install copings and sealants after Stucco assembly has been installed and is completely dry.
  - 4. Do not proceed until all unsatisfactory conditions have been corrected.

### 3.3 APPLICATION

## A. Mixing

1. Mix each product in accordance with the most current product datasheet.
2. No additives are permitted to any components unless specifically approved by FXI.

The transition of water barriers on the project with other materials and/or with other water barriers on the project must be considered by the designer before installation.

## B. Air/Water Barrier

1. Coordinate installation with all flashing, terminations, roofing, accessories, windows, other adjacent water barrier materials to provide an air/watertight assembly.
2. Install WaterShield and WaterShield accessory products in accordance with the WaterShield Product datasheet and system details.
3. Treat all Gaps, joints, corners and dissimilar transitions with the appropriate Joint Treatments to ensure a water and airtight assembly.
4. After Flashings, window fins, penetrations are installed, install Watershield transition treatment per project details to create a waterproof connection and positive drainage.
5. Watershield Field Application: Install in accordance with the WaterShield Product datasheet and system details.
6. The wet mil will be approximately 10-12 wet mils.
  - a. OSB/Plywood: Plywood/OSB surface may create imperfections in the WaterShield. The WaterShield must be re applied in any areas that are not completely covered.
  - b. CMU: CMU will require more Watershield than other substrates or it may be skimmed out with Xi-Base or Xi-VersaBase.
  - c. Apply 2 coats, allowing the first coat to fully dry. It may require back rolling with a  $\frac{3}{4}$ " nap roller for complete coverage without pinholes.
7. Transition between Water Resistant Barriers: When there is a transition between WaterShield and Non-FacadesXi materials, consult FacadesXi Technical Services. The adhesion between products is not always known and testing may be necessary.

If applicable, Stucco materials should not be installed directly over water barrier coatings and a slip sheet should be installed to prevent adhesion of the stucco to the Air/Water Barrier Coatings which can cause Stucco cracking.

## C. Drainage - Temporarily install with as few fasteners as possible to hold the paper in place until the installation of the lath.

## D. Exterior Continuous Insulation

1. Start installing Exterior Insulation at the base of the wall in running bond pattern.
2. Use no more than 2 fasteners per board to hold it in place until the lath is installed.
3. Stagger Vertical joints of the boards themselves and offset insulation board joints with Sheathing board joints.
4. Boards must be flat and flush, rasped if necessary, for an appropriate stucco surface.

## E. Accessories /Lath

1. Install Casing Bead, Trim accessories, and Expansion joints in accordance with the FacadesOne Evaluation Report
2. Weep Screed: Install foundation weep screed at the base of the wall where the nose extends 1" below the intersection of the framing and foundation, 4" above earth and 2" above finished grade (paved surfaces). Attached securely to solid substrate or framing with the appropriate fastener. Lap water resistant/ air barrier over the weep screed flange.
3. Casing Bead: Install casing beads at stucco terminations – doors, windows and other through wall penetrations.
4. Expansion Joints:

- a. Install two piece expansion joints (or back-to-back casing beads) at building expansion joints, where the stucco is to be installed over dissimilar construction or substrates, at changes in building height, at floor lines, columns, and cantilevered areas.
  - b. Install full accessory pieces where possible embed adjoining ends in sealant.
  - c. Attach at no more than 7 inches (178 mm) into solid substrate/framing with appropriate fasteners.
  - d. Install one piece expansion joints at through wall penetrations, for example, above and below doors and windows.
- 5 Horizontal/Vertical intersections: Run the Vertical joint continuous and abut the horizontal trim into it. Attach at 7 inches on center into framing with appropriate fasteners, allow a small 1/8" – 3/16" space between the intersection trim and set in a 4" bed of sealant.
- 6 Plaster Base/Lath
- a. Lapping:
    - 1) Side laps of metal plaster bases shall be secured to framing members and shall be tied between supports with 0.0475-in. (1.21-mm) wire at not more than 9 in. (229mm).
    - 2) Metal lath shall be lapped 1/2 in. (12.7 mm) at the sides and 1" (25 mm) at the ends).
    - 3) Wire lath shall be lapped one mesh at the sides and the ends.
    - 4) Where end laps occur between the framing members, the ends of the sheets of all metal plaster bases shall be laced or wire tied with 0.0475-in. (1.21-mm) galvanized, annealed steel wire.
- 7 Lath Attachment
- a. Plaster base must be installed with the long dimension at right angles to framing members, with the end joints of the plaster base staggered.
  - b. Expanded Metal Lath: Fasten into framing member 7 inches on center vertically at 16 inches on center. Lath shall be fastened directly to the framing member.
  - c. Specific fasteners used to attach metal plaster base to framing must follow FacadesOne Evaluation report.
  - d. Staples must engage not less than three strands of lath.
  - e. Fasteners must penetrate the wood framing members not less than 3/4 in. (19.05 mm)
  - f. Screws shall penetrate metal framing members 3/8", or 3 threads.
  - g. Alternate material plaster bases (nonmetallic) must be overlapped in compliance with the Evaluation Report for that product.
- 8 Control Joints: FacadesOne Stucco Assemblies allow the lath to be continuous behind control joints in accordance with the FacadesOne Evaluation Report. Lath may be continuous or discontinuous at locations of control joints. If the plaster base is to be discontinuous, additional framing must be provided so that the plaster base may be securely fastened to a framing member at both sides of the control joint, and the control joints wire tied to the plaster base. For continuous plaster base, the control joint shall be installed over the plaster base and wire tied to it. Vertical control joints shall be continuous, with horizontal control joints abutting them and set in a bead of sealant.
- 9 Inside and Outside Corners: Install corner lath at inside corners and corner bead at outside corners over lath. Attach through lath into solid substrate or framing at no more than 7 inches (178 mm) on center with appropriate fasteners.

**F. Stucco Base Coat (3/8"-1/2" One Coat)**

- 1. Apply stucco with sufficient pressure to key into and embed the metal lath. Apply sufficient material, 3/8 or 1/2 inch (9 or 12 mm), to cover the metal lath.
- 2. This can also be applied in 2 coats, make sure to level or score or scratch horizontally (or in one direction on ceilings) the surface of the first pass immediately after application. The second coat may be installed as soon as the surface has attained sufficient rigidity to receive it with no visible water on the surface.

Float the brown coat uniformly to prepare for the next step, the finish coat application.

3. Use a rod or straight edge to bring the surface to a true, even plane. Fill depressions in plane with stucco.

#### **G. [Foam Shapes**

1. Apply the base coat to the entire surface on one face of the insulation board, then using a 5/8" x 5/8" x 5/8" (16mm x 16mm x 16mm) notched trowel, run the adhesive in ribbons to a uniform thickness to run vertically when positioned on the wall (do not install adhesive directly to the stucco base coat).
2. Immediately install foam shapes, ornamental pieces applying uniform pressure to promote maximum adhesive contact.
3. Allow the foam insulation shapes to set undisturbed overnight. Cold and humid conditions may require greater than 24 hours before rasping.
4. Rasp the surface of the insulation board smooth, if applicable.
5. Uniformly cover the entire foam board surface with the base coat to approximately 1/16" - 1/8" thick. With the flat edge of a stainless-steel trowel, embed reinforcing mesh into the base coat, from the center to the edges, wrapping it around the edges and system terminations, extending as far onto the structural elements as possible. Use the mesh to gauge base coat thickness. The mesh-reinforced surface should be flat and smooth with no wrinkles. A damp, NOT WET, brush may be used on fresh or uncured base coat to maintain sharp edges of grooves or for smoothing trowel marks. The thickness must be such that the mesh color is not visible at a minimum of 1/16".
6. The base coat and mesh can either be backwrapped behind the shape or lapped onto the stucco surface. You must ensure to feather out the base coat and mesh onto the stucco surface.
7. On the sloped surface of foam shapes slope or shapes greater than 12", WaterLock Waterproof Cementitious base coat must be used on these areas over the Reinforced Base coat.
8. The foam shape can be coated with lath and stucco or with foam shape base coat and reinforcing mesh, both must be tied into the stucco wall.

#### **H. Fracture Stop**

1. Apply mixed Base coat and reinforce with Xi reinforcing mesh to the entire surface the stucco base coat with a stainless-steel trowel to a minimum thickness of 1/16".
2. Allow the base coat to completely dry before installation of the primer/finish coat.]

#### **I. Apply primer to the base coat per the product datasheet.**

#### **J. Apply Selected Finish coat per the product datasheet.**

### **3.4 QUALITY CONTROL**

- A. The contractor is responsible for the proper application of the FACADESXi wall System products.
- B. Facade ONE is not responsible for on-site inspections, if inspections are required, the owner must engage a third-party inspector.

### **3.5 CLEANING**

- A. Clean under the provisions of Section [01 74 00]
- B. All excess materials must be removed from the project siter per the project Provisions
- C. Clean adjacent surfaces of excess materials or debris.

### **3.6 PROTECTION**

- A. Protect installed materials under provisions of Section [01 74 00]

## **END OF SECTION**

Disclaimer prepared in good faith based on the information available at the time of publication.

All information contained in this specification conforms to standard detail and product recommendations for the installation of FACADESXi products and should be used for guidance only. There may be additional information and/or equivalent means of installation that are not referenced in FACADESXi's specifications. All FACADESXi products shall be installed in accordance with FACADESXi product datasheets and all applicable building codes and industry standard practices.

The design, engineering and final details incorporating any FACADESXi product are the sole responsibility of the project design professional. FACADESXi is not responsible for determining the acceptability and/or applicability of any FACADESXi product for any specific project or condition. FACADESXi disclaims all liability for improper installation, workmanship, or design by a third-party. EXCEPT FOR ANY EXPRESS REPRESENTATIONS AND WARRANTIES BY FACADESXi, ALL IMPLIED WARRANTIES OF ANY KIND, INCLUDING BUT NOT LIMITED TO WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE OR COMPLIANCE WITH LAWS OR GOVERNMENT RULES OR REGULATIONS APPLICABLE TO THE PROJECT, ARE HEREBY DISCLAIMED.

FACADESXi's website should always be consulted for the latest version of any details, specifications and/or product information. Contact FACADESXi for any technical assistance.

# **FACADESXi**

15262 Capital Port • San Antonio, TX 78249 • 1.800.611.6602 • FACADESXi.com