ICC-ES Evaluation Report

ESR-1627

Reissued December 2023

Subject to renewal December 2024

This report also contains:

- CBC Supplement

- FBC Supplement

- LABC Supplement

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DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION **Section: 07 46 46—Fiber-Cement Siding**	**REPORT HOLDER: KMEW CO., LTD.**	**EVALUATION SUBJECT: CERACLAD RAIN SCREEN SYSTEM: FIBER-REINFORCED CEMENT EXTERIOR WALL PANEL SYSTEM**	

1.0 EVALUATION SCOPE

1.1 Compliance with the following codes:

- 2021, 2018, 2015, 2012, 2009 and 2006 *International Building Code*® (IBC)
- 2021, 2018, 2015, 2012, 2009 and 2006 *International Residential Code*® (IRC)
- 2013 *Abu Dhabi International Building Code* (ADIBC)†

†The ADIBC is based on the 2009 IBC. 2009 IBC code sections referenced in this report are the same sections in the ADIBC.

For evaluation for compliance with codes adopted by the Los Angeles Department of Building and Safety (LADBS), see ESR-1627 LABC and LARC Supplement.

Properties evaluated:

- Durability
- Transverse loading
- Exterior wall covering
- Fire-resistive-rated construction
- Types I, II, III and IV Construction

1.2 Evaluation to the following green code(s) and/or standards:

- 2022 California Green Building Standards Code (CALGreen), Title 24, Part 11
- 2020, 2015, 2012 and 2008 ICC 700 *National Green Building Standard*™ (ICC 700-2015, ICC 700-2012, and ICC 700-2008)

Attributes verified:

- See Section 3.1

2.0 USES

The CERACLAD Rain Screen System is an alternative exterior wall covering to those materials described in 2021 and 2018 IBC Section 1404.2 [2015, 2012, 2009 or 2006 IBC Section 1405.2], and IRC Section R703.1. The CERACLAD Rain Screen System may be used as a component of a fire-resistance-rated wall assembly when installed in accordance with Section 4.3 of this report. The CERACLAD Rain Screen System may be used in all types of construction. When used in Types I, II, III or IV construction, the wall assembly must be installed in accordance with Section 4.4 of this report.

3.0 DESCRIPTION

3.1 General:

The CERACLAD Rain Screen System consists of ceramic-coated, extruded or filtrated, fiber-reinforced cement panels and mounting clips installed over code-complying solid sheathing attached to wood or steel framing. The reinforced fiber cement panels comply with ASTM C1186, Type A. The CERACLAD panels are supplied with standard mounting hardware, which includes hot dip zinc-aluminum-magnesium (ZAM) alloy coated steel mounting clips, screws, and galvanized steel starter bars.

The attributes of the cladding panels have been verified as conforming to the requirements of (i) CALGreen Section A4.405.1.3 for prefinished building materials and Section A5.406.1.2 for reduced maintenance; (ii) ICC 700-2020 Sections 601.7 and 11.601.7 for site-applied finishing materials; (iii) ICC 700-2015 and ICC 700-2012 Sections 601.7, 11.601.7, and 12.1(A).601.7 for site-applied finishing materials; and (iv) ICC 700-2008 Section 601.7 for site-applied finishing materials. Note that decisions on compliance for those areas rest with the user of this report. The user is advised of the project-specific provisions that may be contingent upon meeting specific conditions, and the verification of those conditions is outside the scope of this report. These codes or standards often provide supplemental information as guidance.

3.2 Materials:

3.2.1 CERACLAD Panels: The panels are manufactured primarily from portland cement, silica sand and fly ash reinforced with polypropylene fiber and pulp, and coating materials mixed and applied respectively in accordance with the specifications and procedures described in the approved quality control manual. The exposed face is finished with baked-on ceramic. The panels are identified as the following: Ceraclad N which is an extruded hollow core panel; Ceraclad F which is an extruded solid core panel; and Ceraclad E which is a filtrated solid core panel. The panels are available in various architectural surface profiles and colors. Panel dimensions and weights must be as shown in Table 1.

3.2.2 Fasteners: The panels must be fastened to supports using CERACLAD No. 22 gage [0.03 inch (0.8 mm)] mounting clips, which provide a $^{3}/_{16}$-inch (5 mm) or $^{9}/_{16}$-inch (15 mm) drainage space between the back of the panels and the sheathing. The mounting clips are made from hot dip ZAM alloy coated steel, complying with ASTM A924. Mounting clips are secured with screws supplied by the manufacturer. Mounting clips come in standard and full length versions. The appropriate number, size and type of screw required for each mounting clip for a given assembly are described in Table 2.

3.2.3 Starter Bars: The panels must be installed with supplied vented galvanized steel starter bars having a minimum G90 galvanized coating. The vented starter bar is available in a standard length of 120 inches (3030 mm).

3.2.4 Water-resistive Barrier: A water-resistive barrier complying with 2021 and 2018 IBC Section 1403.2 (2015, 2012, 2009 and 2006 IBC Section 1404.2) or IRC Section R703.2 must be used in conjunction with the CERACLAD Rain Screen System.

4.0 DESIGN AND INSTALLATION

4.1 Design:

The framing and sheathing must be designed to resist loads in accordance with the applicable code. Wind load capacities are shown as strength design or LRFD in Table 2. These values are for CERACLAD Rain Screen Systems installed in accordance with Section 4.2 of this report.

4.2 Installation:

4.2.1 General: The CERACLAD Rain Screen System must be installed in accordance with the applicable code, this evaluation report (see Figure 1) and the manufacturer's published installation instructions.

4.2.2 Panel Attachment: Wood framing must be nominally 2 inches wide, minimum, with a minimum specific gravity of 0.42 and maximum spacing of 24 inches (610 mm) or minimum $3^{5}/_{8}$-inch-by-$1^{5}/_{8}$-inch (92 mm by 41 mm) 20 gage steel studs with a maximum spacing of 16 inches (406 mm).

The CERACLAD panels are installed over solid sheathing or framing in accordance with Table 2. A code-complying solid sheathing, when required, must be installed over the framing, and attached as required by the applicable code. A water-resistive barrier, as described in Section 3.2.4 of this report, must be installed over the sheathing.

4.2.2.1 Horizontal Application: CERACLAD panels must be installed by providing vented galvanized steel starter bars described in Section 3.2.3 of this report, at the base of the wall over the ground sill flashing for the first course of each floor assembly. The vented starter bars must be installed over intermediate flashing.

The CERACLAD panels must be installed horizontally over code-complying solid sheathing attached to wood or steel framing or directly over wood or steel framing. The mounting clips are fastened to the building structural framing assembly using No. 8, stainless steel wood screws at the middle of the clip. The mounting clips must be installed on every stud, and along the stud at 18 inches (457 mm) on center or at every panel width. Where installation of clips does not coincide with wall framing, such as at vertical panel joints over studs, clips may be fastened directly to minimum $^1/_2$-inch-thick wood sheathing, where applicable.

The leading edge of the panel, which is the edge with the concealed groove, should sit squarely on the lower lip of the vented starter bar. The top edge of the panel with the shiplap edge accepts the mounting clips for the next panel course. The mounting clips must be installed along the top edge of the panel with spacing described above. Working up the wall, the next panel course must be installed with V-groove profile panel edges squarely sitting into the upper section of the mounting clips. The next row of mounting clips must be mounted to the horizontal top edge (shiplap profiles) of the panel below, and installation continues until the remaining CERACLAD panels are installed. The vertical joints of the CERACLAD panels must be provided with a $^3/_8$-inch (10 mm) gap and must be caulked or capped.

When panels are to be butted next to trims, a $^3/_8$-inch (10 mm) gap is required, to allow for panel and/or trim movement. Panels must fit completely within the trim, with no exposed edges. Exposed field cuts must be end-sealed with the manufacturer's approved sealant.

4.2.2.2 Vertical Application: CERACLAD panels may be installed vertically over code-complying solid sheathing attached to wood or steel framing or directly over steel framing. Installation must be in accordance with Table 2. Starter bars must be fastened horizontally $1^9/_{16}$ inches (40 mm) above the groundsill flashing using 1-inch-long (25.4 mm), No. 8, stainless steel wood screws spaced a maximum of 16 inches (406 mm) on center horizontally. Vertical wood strips consisting of $^9/_{16}$-inch-by-4-inch (15 mm by 100 mm) pressure-treated wood furring strips are fastened to outside and inside corners in accordance with the manufacturer's installation instructions. CERACLAD panels are placed onto the starter bar with the long dimension spanning vertically. Panel clips are installed on the panel edges and fastened to sheathing using 1-inch-long (25 mm) or $2^3/_{16}$-inch-long (55 mm), as applicable, No. 8, stainless steel screws. Panel clips are spaced 16 inches (406 mm) on center vertically.

4.3 One-hour Fire-resistance-rated Wall Assembly:

The CERACLAD Rain Screen System may be used as a component of a one-hour fire-resistance-rated wall assembly as described in this evaluation report.

4.3.1 First Assembly:

4.3.1.1 Interior Face: One layer of minimum $^5/_8$-inch-thick (15.9 mm), Type X gypsum wallboard complying with ASTM C36 or ASTM C1396 is installed on the interior side of minimum nominally 2-by-4 Douglas fir wood studs spaced a maximum of 16 inches (406 mm) on center. The wallboard is attached with $1^5/_8$-inch-long (41 mm), No. 6 drywall screws located 6 inches (152 mm) on center at wallboard edge joints and 12 inches (305 mm) on center in the field of the wallboard. Wallboard joints must be backed by minimum nominally 2-by-4 wood framing, taped, and treated with joint compound in accordance with ASTM C840 or GA-216. Fastener heads must also be treated with joint compound in accordance with ASTM C840 or GA-216.

4.3.1.2 Exterior Face: One layer of $^1/_2$-inch-thick (12.7 mm) oriented strand board (OSB) sheathing complying with DOC Standard PS-2 is fastened on the exterior face of the wall using 2-inch-long (50.4 mm), minimum 6d common nails every 12 inches (305 mm) on center. The OSB is covered with one layer of $^5/_8$-inch-thick (15.9 mm), Type X, water-resistant core-treated gypsum sheathing, complying with ASTM C79 or ASTM C1396, fastened with 2-inch-long (50.4 mm) No. 6 drywall screws located at 6 inches (152 mm) on center at board edges and 12 inches (305 mm) on center in field areas of the board. Minimum No. 15, asphalt-saturated nonperforated felt complying as Type I, in accordance with ASTM D226 (IBC or IRC), is applied on the exterior side of the gypsum sheathing. CERACLAD panels are installed on the exterior side of the wall with vertical joints located over studs in accordance with this report.

4.3.1.3 Design Stresses: The design axial compressive stresses within the studs must be limited to the least of the following:

a. 419 psi.

b. 0.70 F'_c.

c. 0.70 F'_c, where F'_c is calculated assuming a slenderness ratio of 29.6.

4.3.2 Second Assembly:

4.3.2.1 Interior Face: One layer of minimum $^5/_8$-inch-thick (15.9 mm) Type X gypsum wallboard complying with ASTM C36 or ASTM C1396 is installed on the interior side of minimum nominally 2-by-4 Douglas fir wood studs spaced a maximum of 16 inches (406 mm) on center. The wallboard is attached with $1^5/_8$-inch-long (41 mm), No. 6 drywall screws located 6 inches (152 mm) on center at wallboard edge joints and 12 inches (305 mm) on center in the field of the wallboard. Wallboard joints must be backed by minimum nominally 2-by-4 wood framing, taped and treated with joint compound in accordance with ASTM C840 or GA-216. Fastener heads must also be treated with joint compound in accordance with ASTM C840 or GA-216.

4.3.2.2 Exterior Face: One layer of $^5/_8$-inch-thick (15.9 mm), Type X, water-resistant core-treated gypsum sheathing, complying with ASTM C79 or ASTM C1396, fastened with $1^5/_8$- inch-long (41 mm) No. 6 drywall screws located at 6 inches (152 mm) on center at board edges and 12 inches (305 mm) on center in field areas of the board. Minimum No. 15, asphalt-saturated nonperforated felt complying as Type I in accordance with ASTM D226 (IBC or IRC) is applied on the exterior side of the wall. CERACLAD panels are installed on the exterior side of the wall with vertical joints located over studs in accordance with this report.

4.3.2.3 Design Stresses: The design axial compressive stresses within the studs must be limited to the least of the following:

a. 229 psi.

b. 0.38 F'_c.

c. 0.38 F'_c, where F'_c is calculated assuming a slenderness ratio of 29.6.

4.4 Types I, II, III or IV Construction: When installed as described in this section, the CERACLAD panels may be used on the exterior face of exterior walls of buildings required to be of Types I, II, III or IV construction.

The base wall assembly must be framed with minimum 18 gage (1.02 mm) thick by $3^5/_8$-inch (92 mm) deep, C-channel steel studs at 16 inches (406 mm) on center. One layer of $^5/_8$-inch-thick (15.9 mm), Type X gypsum wallboard must be installed in a vertical orientation on the interior face of the studs. One layer of $^1/_2$-inch-thick-or-$^5/_8$-inch-thick (12.7 or 15.9 mm), glass mat gypsum substrate sheathing complying with ASTM C1177 must be installed, in a vertical orientation, on the exterior face of the studs. Both gypsum layers must be installed using $1^5/_8$-inch-long (41 mm mm), Type S, corrosion-resistant steel drywall screws spaced at 24 inches (610 mm) on center in the field and at 16 inches (406 mm) on center around the perimeter and joints. The interior wallboard joints and fastener heads were treated with tape and joint compound in accordance with ASTM C840 or GA216. Minimum 4-inch-thick (102 mm) mineral wool with a minimum 4-pound-per-cubic-foot (64 kg/m^3) density must be secured at each floor line within the stud cavity.

A layer of Tyvek® CommercialWrap® water-resistive barrier recognized in ESR-2375 was applied over the glass-mat gypsum sheathing. One-inch-thick (25.4 mm) 8 pcf (128 kg/m^3) density mineral wool boards were applied over water-resistive barrier. 18 gage (1.02 mm) thick, $^7/_8$-inch-deep (22.2 mm) steel hat channels spaced 17.875-inch (454 mm) were installed horizontally over the mineral wool board and fastened through the board and sheathing into the studs with two No. 10 self-tapping screws. CERACLAD panels complying with Section 3.2.1 must be installed in a vertical or horizontal orientation in accordance with Section 4.2 and as described in this section. The $^9/_{16}$-inch (15 mm) mounting clip spacing must not exceed 16 inches (406 mm) on center. At the ends of the wall, the CERACLAD panels are face-screwed over CERACLAD 15-mm Spacer Block with a No. 8 by 2-inch-long (51 mm) stainless steel screw spaced 16 inches on center. CERACLAD panel butt joints must be sealed with an approved silicone sealant or a steel flashing (J-trim). Window and door openings must be flashed with minimum 24 gage (0.51 mm) thick galvanized steel flashing. Jambs can be finished with a sealant joint or steel flashing (J-trim).

5.0 CONDITIONS OF USE:

The CERACLAD Rain Screen System described in this report complies with, or is a suitable alternative to what is specified in, those codes listed in Section 1.0 of this report, subject to the following conditions:

5.1 The products must be manufactured, identified, and installed in accordance with this report, the manufacturer's published instructions and the applicable code. In the event of a conflict between the manufacturer's published installation instructions and this report, this report governs.

5.2 A water-resistive barrier, as described in Section 3.2.4 of this report, must be installed over the sheathing assembly as required by the applicable code.

5.3 The CERACLAD Rain Screen System may be used in all types of construction. When installed in Types I, II, III or IV construction installation must comply with Section 4.4 of this report.

5.4 The allowable transverse loads must be as set forth in Table 2 and Section 4.1 of this report.

5.5 The CERACLAD Rain Screen System is manufactured by KMEW Co., Ltd., at their facilities in Iga Ueno, Mie, Japan; Ohama, Osaka, Japan; and Ashikaga, Tochigi, Japan, under a quality control program with inspections by ICC-ES.

6.0 EVIDENCE SUBMITTED

6.1 Data in accordance with the ICC-ES Acceptance Criteria for Fiber Cement Siding Used as Exterior Wall Siding (AC90), dated October 2020.

6.2 Reports of testing in accordance with ASTM E119.

6.3 Report of testing in accordance with NFPA 285.

7.0 IDENTIFICATION

7.1 The ICC-ES mark of conformity, electronic labeling, or the evaluation report number (ICC-ES ESR-1627) along with the name, registered trademark, or registered logo of the report holder must be included in the product label.

7.2 In addition, the CERACLAD Rain Screen System panels and boxes of accessories are labeled with the name and address of the manufacturer (KMEW Co., Ltd.); and the product name.

7.3 The report holder's contact information is the following:

KMEW CO., LTD.
13F CRYSTAL TOWER
1-2-27 SHIROMI, CHUO-KU
OSAKA, 540-6013
JAPAN

TABLE 1—CERACLAD PANEL DIMENSIONS

	CERACLAD N (EXTRUSION-HOLLOW CORE)				CERACLAD E (FILTRATION-SOLID CORE)				CERACLAD F (EXTRUSION-SOLID CORE)			
	Thickness	Length	Height	Weight (lbs)	Thickness	Length	Height	Weight (lbs)	Thickness	Length	Height	Weight (lbs)
Caulking Joint	5/8″, 23/32″	9′ - 11 1/4″	18″	42-55	5/8″	9′ - 11 1/4″	18″	60	5/8″	9′ - 11 1/4″	18″	53-60

For **SI:** 1 inch = 25.4 mm, 1 foot = 305 mm, 1 lbs = 0.4536 kg.

TABLE 2—STRENGTH DESIGN VALUES FOR TRANSVERSE LOADS[1,2]

CERACLAD PANEL TYPES E (FILTRATION-SOLID CORE)		
Wall Assembly	**CERACLAD Assembly**	**Strength Design for Positive and Negative Transverse Loads[3]**
2x4 wood studs spaced 24″ o.c. no sheathing	Horizontal application 1″ No. 8 screw per clip, clip placed 24″ o.c. directly to wood stud	38 psf
CERACLAD PANEL TYPES N (EXTRUSION-HOLLOW CORE) AND F (EXTRUSION SOLID CORE)		
Wall Assembly	**CERACLAD Assembly**	**Strength Design for Positive and Negative Transverse Loads[3]**
2x4 wood stud framing spaced 16″ o.c. with 1/2″ plywood sheathing	Horizontal application-one(1) 1-inch No. 8 stainless steel wood screws per clip, clip placed 16″ o.c. attached through plywood sheathing to wood stud	32psf
2x6 wood stud framing spaced 16” o.c. with ½” plywood	Horizontal application- one (1) 1 3/8-inch long No. 8 stainless steel wood screws per clip placed 16” o.c. attached through plywood sheathing to wood stud	47 psf
2x4 wood stud framing spaced 16″ o.c. with 1/2″ plywood sheathing, and 5/8″ Densglass Gold over plywood	Horizontal application- one (1) 2 3/16″ No. 8 stainless steel wood screw per clip, clip placed 16″ o.c. attached through plywood and DensGlass Gold sheathing to wood stud	40 psf
3 5/8" x 1 5/8″ 20GA steel stud spaced 16″o.c., min yield strength 33 ksi, 5/8″ DensGlass Gold Sheathing, 1/2″ plywood furring strips attached to steel studs	Horizontal application- two (2) 1″ No. 8 stainless steel sheet metal screws per clip, clip placed 16″ o.c. attached to plywood furring	32 psf
Horizontally installed hat channel steel framing 18 GA thick, minimum yield strength 33 ksi, spaced maximum 17.875 inches on center attached to supporting structure. Hat channel and attachment of hat channel to supporting structure must be designed by registered design professional.	Horizontal application- two (2) No. 8 stainless steel sheet metal screw per clip to attach to hat channel, clips spaced 16” o.c. along hat channel	41 psf
3 5/8" x 1 5/8″ 18GA steel studs spaced 16″o.c., min yield strength 33 ksi, 5/8″ DensGlass Gold Sheathing	Horizontal application- Full length clip attached to steel studs with one (1) No. 8 stainless steel sheet metal screw placed every 16 inches (maximum) on center.	67 psf

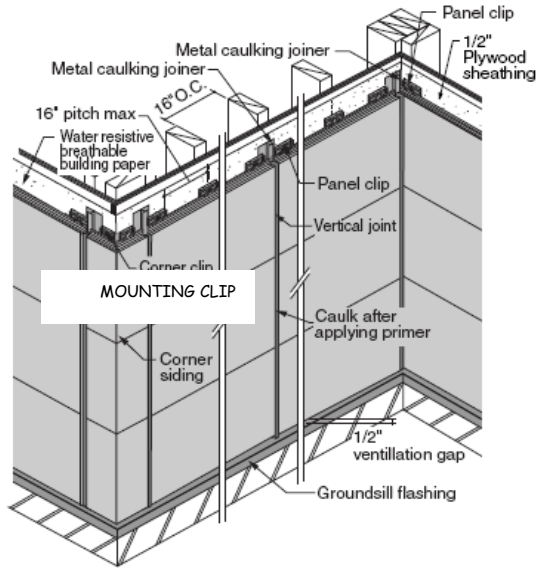
(Continued)

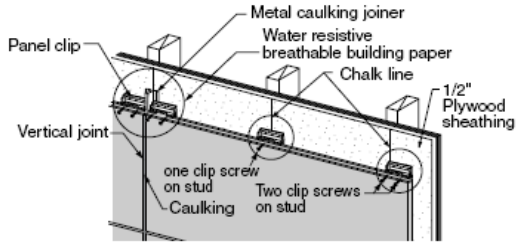
$3^5/_8$" x $1^5/_8$" 18GA steel studs spaced 16"o.c., min yield strength 33 ksi, $^5/_8$" DensGlass Gold Sheathing	Horizontal application- One (1) No. 8 stainless steel sheet metal screw per standard clip, clip placed 16" o.c. attached to steel studs. Additional No. 8 stainless steel sheet metal face screw attached through center of panel at 32 inches on center along panel length into steel studs.	61 psf
2x4 wood stud framing spaced 16"o.c. with $^1/_2$" plywood sheathing	Vertical application 1" No. 8 screws 2 per clip attached into plywood sheathing	36 psf
2x6 wood stud framing spaced 16" o.c. with ½" plywood	Vertical application- two (2) No. 8 x $1^3/_8$-inch-long stainless steel wood screw per clip placed 16" o.c. fastened through plywood sheathing into wood framing	40 psf
2x4 wood stud framing spaced 16" o.c. with $^1/_2$" plywood sheathing and $^5/_8$" Densglass Gold over plywood	Vertical application $2^3/_{16}$" No. 8 screws 2 per clip attached into plywood sheathing through DensGlass Gold	36 psf
Horizontally installed hat channel steel framing 18 GA thick, minimum yield strength 33 ksi, spaced maximum 16" o.c. attached to supporting structure. Hat channel and attachment of hat channel to supporting structure must be designed by registered design professional.	Vertical application- two (2) No. 8 stainless steel sheet metal screw per clip to attach to hat channel, clips spaced 17.875" o.c. horizontally along hat channel and vertically along the panel edge every 16" to match the hat channel spacing.	38 psf
Horizontally installed hat channel steel framing 18 GA thick, minimum yield strength 33 ksi, spaced maximum 16" o.c. attached to supporting structure. Hat channel and attachment of hat channel to supporting structure must be designed by registered design professional.	Vertical application- two (2) No. 8 stainless steel sheet metal screw per standard clip to attach to hat channel, clips spaced 17.875" o.c. horizontally along hat channel and vertically along the panel edge every 16" to match the hat channel spacing. Additional No. 8 stainless sheet metal face screws attached through center of panel width at 32 inches on center along panel height and at wall end at 16 inches on center when no clips are used.	56 psf
Horizontally installed hat channel steel framing 18 GA thick, minimum yield strength 33 ksi, spaced maximum 16" o.c. attached to supporting structure. Hat channel and attachment of hat channel to supporting structure must be designed by registered design professional.	Vertical application- Full length panel clips attached to hat channel with one (1) No. 8 stainless steel sheet metal screw placed 16 inches on center, long panel clips spaced 17.875" o.c. Additional No. 8 stainless sheet metal face screws attached at wall perimeter at 16 inches on center, where clip is not used.	67 psf

For **SI:** 1 inch = 25.4 mm, 1 foot = 305 mm, 1 psf = 47.88 Pa, 1 ksi= 6.9 MPa.

[1]Fastener must penetrate minimum 1 inch into wood framing.
[2]Installation of CERACLAD panels must comply with Section 4.2 of this report.
[3] To calculate the allowable transverse wind loads; divide the tabulated values by the ASD safety factor of 1.8.

1





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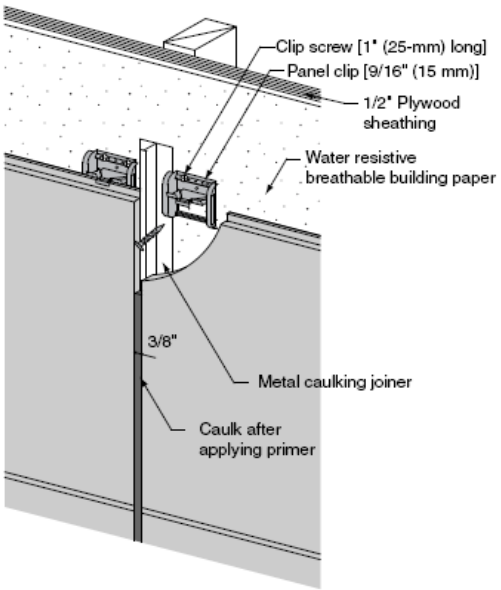

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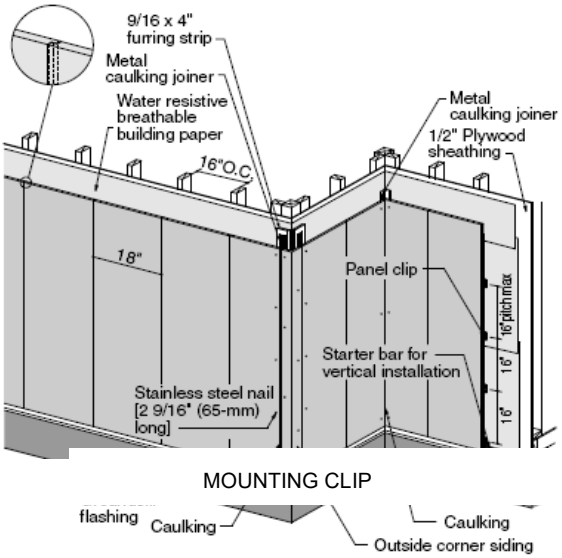

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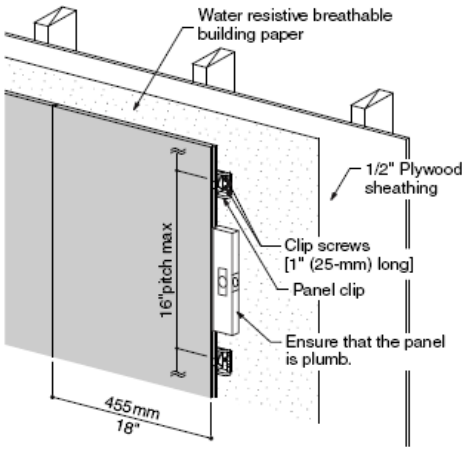

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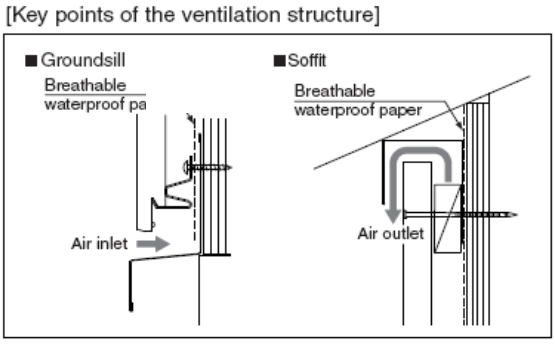

FIGURE 1—PANEL INSTALLATION

DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION
Section: 07 46 46—Fiber-Cement Siding

REPORT HOLDER:

KMEW CO., LTD.

EVALUATION SUBJECT:

CERACLAD RAIN SCREEN SYSTEM: FIBER-REINFORCED CEMENT EXTERIOR WALL PANEL SYSTEM

1.0 REPORT PURPOSE AND SCOPE

Purpose:

The purpose of this evaluation report supplement is to indicate that Ceraclad Rain Screen System: Fiber-reinforced Cement Exterior Wall Panel System, described in ICC-ES evaluation report ESR-1627, has also been evaluated for compliance with the codes noted below, as adopted by the Los Angeles Department of Building and Safety (LADBS).

Applicable code editions:

- 2020 *City of Los Angeles Building Code* (LABC)
- 2020 *City of Los Angeles Residential Code* (LARC)

2.0 CONCLUSIONS

The Ceraclad Rain Screen System, described in Sections 2.0 through 7.0 of the evaluation report ESR-1627, complies with the LABC Chapters 7, 8 and 14, and the LARC Chapter R7, and are subjected to the conditions of use described in this supplement.

3.0 CONDITIONS OF USE

The Ceraclad Rain Screen System described in this evaluation report must comply with all of the following conditions:

- All applicable sections in the evaluation report ESR-1627.
- The design, installation, conditions of use and identification of the panels are in accordance with the 2018 *International Building Code®* (IBC) and 2018 *International Residential Code®* (IRC) provisions noted in the evaluation report ESR-1627.
- The design, installation and inspection are in accordance with additional requirements of the LABC Chapters 16 and 17, as applicable.
- The Ceraclad Rain Screen System has not been evaluated under the LABC Chapter 7A or the LARC Section R337 for use in the exterior design and construction of new buildings located in any Fire Hazard Severity Zone within State Responsibility Areas or any Wildland—Urban Interface Area.

This supplement expires concurrently with the evaluation report, reissued December 2023.

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DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION
Section: 07 46 46—Fiber-Cement Siding

REPORT HOLDER:

KMEW CO., LTD.

EVALUATION SUBJECT:

CERACLAD RAIN SCREEN SYSTEM: FIBER-REINFORCED CEMENT EXTERIOR WALL PANEL SYSTEM

1.0 REPORT PURPOSE AND SCOPE

Purpose:

The purpose of this evaluation report supplement is to indicate that Ceraclad Rain Screen System: Fiber-reinforced Cement Exterior Wall Panel System, described in ICC-ES evaluation report ESR-1627, has also been evaluated for compliance with the code*(s)* noted below.

Applicable code editions:

- 2019 *California Building Code* (CBC)

For evaluation of applicable chapters adopted by the California Office of Statewide Health Planning and Development (OSHPD) AKA: California Department of Health Care Access and Information (HCAI) and the Division of State Architect (DSA), see Sections 2.1.1 and 2.1.2 below.

- 2019 *California Residential Code* (CRC)

2.0 CONCLUSIONS

2.1 CBC:

The Ceraclad Rain Screen System: Fiber-reinforced Cement Exterior Wall Panel System, described in Sections 2.0 through 7.0 of the evaluation report ESR-1627, complies with CBC Chapters 7, 8 and 14, provided the design and installation are in accordance with the 2018 *International Building Code*® (IBC) provisions noted in the evaluation report and the additional requirements of CBC Chapters 16 and 17, as applicable.

2.1.1 OSHPD:

The applicable OSHPD Sections of the CBC are beyond the scope of this supplement.

2.1.2 DSA:

The applicable DSA Sections of the CBC are beyond the scope of this supplement.

2.2 CRC:

The Ceraclad Rain Screen System: Fiber-reinforced Cement Exterior Wall Panel System, described in Sections 2.0 through 7.0 of the evaluation report ESR-1627, complies with CRC Chapter 7, provided the design and installation are in accordance with the 2018 *International Residential Code*® (IRC) provisions noted in the evaluation report.

This supplement expires concurrently with the evaluation report, reissued December 2023.

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DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION
Section: 07 46 46—Fiber-Cement Siding

REPORT HOLDER:

KMEW CO., LTD.

EVALUATION SUBJECT:

CERACLAD RAIN SCREEN SYSTEM: FIBER-REINFORCED CEMENT EXTERIOR WALL PANEL SYSTEM

1.0 REPORT PURPOSE AND SCOPE

Purpose:

The purpose of this evaluation report supplement is to indicate that the Ceraclad Rain Screen System, described in ICC-ES evaluation report ESR-1627, has also been evaluated for compliance with the codes noted below.

Applicable code editions:

- 2020 *Florida Building Code—Building*
- 2020 *Florida Building Code—Residential*

2.0 CONCLUSIONS

The Ceraclad Rain Screen System, described in Sections 2.0 through 7.0 of the ICC-ES evaluation report ESR-1627, complies with the *Florida Building Code—Building* and *Florida Building Code—Residential*, provided the design requirements are determined in accordance with the *Florida Building Code—Building* and *Florida Building Code—Residential*, as applicable. The installation requirements noted in ICC-ES evaluation report ESR-1627 for the 2018 *International Building Code®* (IBC) and 2018 International *Residential Code®* (IRC) meet the requirements of the *Florida Building Code—Building* and *Florida Building Code—Residential* , as applicable.

Use of the Ceraclad Rain Screen System for compliance with the High-Velocity Hurricane Zone provisions of the *Florida Building Code*—Building and *Florida Building Code*—Residential has not been evaluated and is outside the scope of this supplemental report.

For products falling under Florida Rule 61G20-3, verification that the report holder's quality assurance program is audited by a quality assurance entity approved by the Florida Building Commission for the type of inspections being conducted is the responsibility of an approved validation entity (or the code official when the report holder does not possess an approval by the Commission).

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