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QUALITY EDGE, INC. 2712 Walkent Drive Walker, MI 49544 (888) 784-0878 www.quality-edge.com

QUALITY EDGE TRUCEDAR, VESTA, AND SHAKE SIDING PROFILES

CSI Sections:

07 42 13 Roofing and Siding Panels 07 46 19 Steel Siding

1.0 RECOGNITION

The Quality Edge TruCedar, VESTA, and Shake steel siding recognized in this report has been evaluated for use as an exterior covering. The wind load resistance, weather protection, durability, fire resistance, and surface burning properties of the metal siding comply with the intent of the provisions of the following codes and regulations:

- 2021, 2018, and 2015 International Building Code[®] (IBC)
- 2021, 2018, and 2015 International Residential Code[®] (IRC)
- 2022 California Building Code (CBC) attached Supplement
- 2022 California Residential Code (CRC) attached Supplement
- 2023 Florida Building Code, Building (FBC, Building)
 attached Supplement
- 2023 Florida Building Code, Residential (FBC, Residential) attached Supplement

2.0 LIMITATIONS

Use of the TruCedar, VESTA, and Shake metal siding recognized in this report is subject to the following limitations:

- **2.1** TruCedar, VESTA, and Shake metal siding shall be installed in accordance with the applicable code, the manufacturer's published installation instructions, and this report. Where there is a conflict, the most restrictive requirements shall govern.
- **2.2** Quality Edge TruCedar, VESTA, and Shake siding panels recognized in this report shall be manufactured in Walker, Michigan, and identified in accordance with this report.

3.0 PRODUCT USE

3.1 General: TruCedar, VESTA, and Shake siding panels are used as an exterior wall covering in accordance with Section

1403.5.1 of the IBC. TruCedar and Vesta siding panels have been evaluated for use in Types V construction.

- **3.2 Design:** TruCedar, VESTA, and Shake siding panels have been evaluated for allowable wind loads, minimum thickness requirements for exterior coverings, and surface burning characteristics. Design wind pressures shall be determined in accordance with Section 1609 of the IBC or R301.2.1 of the IRC, as applicable, and shall not exceed the allowable pressure tabulated in the report and provided to the building official for approval.
- **3.2.1 Minimum Thickness of Weather Coverings:** TruCedar, VESTA and Shake siding panels with minimum thickness requirements for steel siding in Table 1404.2 of the 2021 IBC and Table 1505.2 of the 2018 and 2015 IBC for an approved weathering covering.
- **3.2.2 Wind-load Resistance:** TruCedar, VESTA, and Shake siding panels, when installed in accordance with Section 3.3 of this report, shall have allowable negative and positive design pressures as defined in Tables 1, 2, and 3 of this report.
- **3.2.3 Surface Burning Characteristics:** TruCedar, VESTA, and Shake siding panels have a flame spread index of 25 or less and a smoke develop index of 450 or less when tested in accordance with ASTM E84.
- **3.2.4 Fire Resistance:** The TruCedar, VESTA, and Shake siding panels will not negatively impact the performance of an approved fire-restated rated wall assembly when the panels are installed as a component of the assembly and in accordance with this report.

3.3 Installation:

3.3.1 General: The manufacturer's published instructions and this report shall be strictly adhered to for installation. A copy of the instructions and this report shall be available on the job site during product installation.

The siding shall be installed using the fasteners specified in Sections 3.3.2 and 3.3.3. The fasteners shall be installed into the framing at 16 inches (406 mm) on center for horizontal siding installation. The fasteners may be installed into the sheathing material only for vertical siding installation. Tables 1 and 2 of this report describe the performance of each product with respect to the specific framing and fastener type as described in Sections 3.3.2 and 3.3.3 of this report. The framing to which the siding is attached shall be designed for the applicable loads and is outside the scope of this report.

3.3.2 Wood Frame Installation and Assembly: The wood studs to which the siding is attached shall be at minimum nominal a 2-by stud, have a minimum specific gravity of 0.42, and be spaced at a maximum of 16 inches (406 mm) on



The product described in this Uniform Evaluation Service (UES) Report has been evaluated as an alternative material, design or method of construction in order to satisfy and comply with the intent of the provision of the code, as noted in this report, and for at least equivalence to that prescribed in the code in quality, strength, effectiveness, fire resistance, durability and safety, as applicable, in accordance with IBC Section 104.11. This document shall only be reproduced in its entirety.

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center. A minimum ⁷/₁₆-inch (11 mm) oriented strand board (OSB) or plywood sheathing shall be fastened to the framing using smooth shank nails at 6 inches (152 mm) on center on the perimeter and 12 inches (305 mm) on center in the field. The siding panels shall be attached using either No. 11 gauge by a minimum 1½-inch-long (38 mm) smooth shank roofing nails or No.8 by a minimum 1⁵/₈-inch-long (41mm) truss head lath sharp point screws installed through the nail hems, as applicable. Siding installed over sheathing thicker than ⁷/₁₆ inch (11 mm) shall be installed with nails with a minimum embedment of 1¹/₁₆-inch (27 mm) or screws with a minimum embedment of 1³/₁₆-inch (39 mm), as applicable, into studs.

3.3.3 Metal Frame Installation and Assembly: The metal framing to which the siding is attached shall be minimum No.18 gauge studs. The studs shall be spaced at a maximum of 16 inches (406 mm) on center in No. 18 gauge track. A minimum ⁷/₁₆-inch-thick (11 mm) OSB sheathing or plywood shall be fastened to the framing using No.8 by 1½-inch-long (31.8 mm) truss head lath self-drilling screws at 6 inches (152 mm) on center on the perimeter and 12 inches (305 mm) on center in the field. The siding panels shall be attached using No.8 by a minimum 1½-inch-long (32 mm) truss head lath self-drilling screws fastened through the nail hems. Siding installed over sheathing thicker than ⁷/₁₆ inch (11 mm) shall be installed with screws with a minimum embedment of ⁷/₈-inch (22 mm) into studs.

4.0 PRODUCT DESCRIPTION

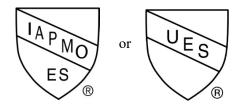
- **4.1 Quality Edge TruCedar Profiles:** The TruCedar steel siding panels are fabricated from 0.016-inch-thick (0.406 mm) galvanized ASTM A653 CS Type B steel, coating designation G90, with mechanical properties as described in the approved quality documentation. The board and batten profiles are produced in 10-feet (3048 mm) lengths and the Double 4" and Single 8" Dutch are produced in 12-feet and 6½ inches (3823 mm) lengths. TruCedar is fabricated in the following profiles: Board & Batten, 10" (horizontal and vertical), Board & Batten, 6" (vertical), Double 4" (horizontal), Single 6" (Horizontal), and Single 6" Dutch (horizontal). The performance characteristics of each TruCedar profile are included in Table 1 of this report.
- **4.2 Quality Edge Vesta Profile:** The Vesta steel siding panels are fabricated from 0.016-inch-thick (0.406 mm) galvanized ASTM A653 CS Type B steel, coating designation G90, with mechanical properties as described in the approved quality documentation. The profiles are available in 8-foot (2438 mm) and 12-foot (3658 mm) lengths. Vesta is fabricated in a single profile and can be installed vertically or horizontally. The performance characteristics of Vesta are included in Table 2 of this report.
- **4.3 Shake Profile:** The Shake steel siding panels are fabricated from 0.020-inch-thick (0.508 mm) galvanized ASTM A653 CS Type B steel, coating designation G90, with mechanical properties as described in the approved quality

documentation. The Shake profiles simulate wooden shakes with nominally 7-inch (178 mm) exposure. The overall panel size of the Shake panels is 48 inches (1219 mm) wide by 22 inches (559 mm) high, each simulating 3 course heights. The installed weight is approximately 0.9 lbf/ft² (43 N/m²). The performance characteristics of Shake profiles are included in Table 3 of this report.

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5.0 IDENTIFICATION

Quality Edge TruCedar, VESTA, and Shake steel siding wall panels shall be identified by a label affixed on product packaging. The label shall include the company name (Quality Edge, Inc), product name or code, and the IAPMO UES evaluation report number (ER-304). Either IAPMO Uniform Evaluation Service Mark of Conformity may also be used as shown below:



IAPMO UES ER-304

6.0 SUBSTANTIATING DATA

- **6.1** Data in accordance with IAPMO UES Evaluation Criteria for Single Skin Steel Roof and Wall Panels, EC 011, revised January 2022.
- **6.2** Reports of surface burning characteristics in accordance with ASTM E84.
- **6.3** Engineering analysis of installation over fire-resistance rated wall assemblies.
- **6.4** Test reports are from laboratories in compliance with ISO/IEC 17025.

7.0 STATEMENT OF RECOGNITION

This evaluation report describes the results of research completed by IAPMO Uniform Evaluation Service on Quality Edge TruCedar, VESTA, and Shake steel siding wall panels to assess conformance to the codes shown in Section 1.0 of this report and serves as documentation of the product certification. Products are manufactured at locations noted in Section 2.2 of this report under a quality control program with periodic inspection under the supervision of IAPMO UES.

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TABLE 1-TRUCEDAR STRUCTURAL PERFORMANCE BY UNIFORM STATIC AIR PRESSURE^{1,2}

TruCedar	Code	Framing	Fastener Type	Allowable Pressure (psf)	
Profile	Couc			Negative	Positive
	10BBS-H	Wood	Screw	47	55
Board & Batten, 10"		Steel	Screw	67	120
(Horizontal)		Wood	Nail	14	21
		Wood	Screw	75	77
Board & Batten, 10" (Vertical)	10BBS-V	Wood	Screw	26	36
Board & Batten, 6" (Vertical)	6BBS-V	Wood	Screw	26	36
	D4S-H	Wood	Nail	20	28
Double 4"		Wood	Screw	42	48
(Horizontal)		Wood	Nail	17	36
		Steel	Screw	73	120
	S6D-H	Wood	Nail	39	48
Single 6" Dutch		Wood	Screw	59	72
(Horizontal)		Wood	Nail	39	55
(Horizontal)		Wood	Screw	59	82
		Steel	Screw	73	120
	S6S-H	Wood	Nail	39	48
Single 6"		Wood	Screw	59	72
(Horizontal)		Wood	Nail	39	55
(Horizontal)		Wood	Screw	59	82
		Steel	Screw	73	120

For S.I.: 1 lbf=4.4 N; 1 inch =25.4 mm

¹ Section 3.3 of this report describes additional details on installation and assembly. The horizontal and vertical designation is the product orientation on the wall. Horizontal orientation is perpendicular to studs and vertical orientation is parallel to studs.

² The values in Table 1 are based on installation as specified in Section 3.3 of this report. The design of the framing in which the siding is attached is outside the scope of this report.

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TABLE 2-VESTA STRUCTURAL PERFORMANCE BY UNIFORM STATIC AIR PRESSURE^{1,2}

Vesta	Code	Framing	Fastener	Allowable Pressure (psf)	
Profile				Negative	Positive
Vesta Siding (Horizontal)	5PS-H	Wood	Nail	39	48
		Wood	Screw	42	48
		Steel	Screw	73	120
Vesta Siding (Vertical)	5PS-V	Wood	Nail	19	28
		Wood	Screw	42	48
		Steel	Screw	29	67

For S.I.: 1 lbf=4.4 N; 1 inch =25.4 mm

TABLE 3- SHAKE STRUCTURAL PERFORMANCE BY UNIFORM STATIC AIR PRESSURE^{1,2}

Vesta	Code	Framing	Fastener	Allowable Pressure (psf)	
Profile				Negative	Positive
Shake	SHK-H	Wood	Screw	34	48
		Wood	Screw	34	55
		Steel	Screw	41	86

For S.I.: 1 lbf=4.4 N; 1 inch =25.4 mm

¹ Section 3.3 of this report describes additional details on installation and assembly. Horizontal and Vertical designation is the product orientation. Horizontal orientation is perpendicular to studs and vertical orientation is parallel to studs.

² The values in Table ² are based on installation as specified in Section 3.3 of this report. The design of the framing in which the siding is attached is outside the scope of this report.

¹ Section 3.3 of this report describes additional details on installation and assembly. Horizontal and Vertical designation is the product orientation. Horizontal orientation is perpendicular to studs and vertical orientation is parallel to studs.

² The values in Table 3 are based on installation as specified in Section 3.3 of this report. The design of the framing in which the siding is attached is outside the scope of this report.

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CALIFORNIA SUPPLEMENT

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QUALITY EDGE TRUCEDAR, VESTA, AND SHAKE SIDING PROFILES

CSI Sections:

07 42 13 Roofing and Siding Panels 07 46 19 Steel Siding

1.0 RECOGNITION

The Quality Edge TruCedar, VESTA, and Shake steel siding recognized in this report has been evaluated for use as an exterior covering. The wind load resistance, weather protection, durability, fire resistance, and surface burning properties of the metal siding comply with the intent of the provisions of the following codes and regulations:

- 2022 California Building Code (CBC)
- 2022 California Residential Code (CRC)

2.0 LIMITATIONS

Use of the Quality Edge TruCedar, VESTA, and Shake steel siding when installed and recognized in this report is subject to the limitations stated in Evaluation Report ER-304 and the following additional limitations:

- **2.1** The design, installation, limitations, and identification of the Quality Edge TruCedar, VESTA, and Shake steel siding shall be in accordance with the 2021 International Building Code or the 2021 International Residential Code, as applicable, as noted in ER-304.
- **2.2** The systems described in this report shall be used and installed in accordance with ER-304, Chapters 14 and 16 of the CBC, and Chapters 3 and 7 of the CRC, as applicable.
- **2.3** This supplement expires concurrently with ER-304.

3.0 Materials and Construction Methods for Exterior in Fire Hazard Severity Zone or any Wildfire Exposure

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- **3.1 Exterior Wall Covering:** The Quality Edge TruCedar, VESTA, and Shake steel siding has been evaluated in accordance with Chapter 7A and Section 707A.4 of the CBC and Section R337.7.4 of the CRC for use as an exterior wall assembly on buildings located in designated as Fire Hazard Severity Zones or Wildland-Urban Interface (WUI) Fire Areas. The steel siding complies with the performance criteria as detailed in the Quality Standard SFM Standard 12 7-A-1.
- **3.2 Wood Frame Installation and Assembly:** The wood studs to which the siding is attached shall be at minimum nominal a 2-by stud and be spaced at a maximum of 16 inches (406 mm) on center. The exterior face shall be sheathed with a ½-inch FlamePRO® FR plywood. Dupont Tyvek® HomeWrap® shall be installed over the plywood sheathing. The steel siding shall be installed over the Dupont Tyvek® Siding may be installed in both vertical and horizontal orientations as detailed in ER-304.

4.0 IDENTIFICATION

Quality Edge TruCedar, VESTA, and Shake steel siding wall panels shall be identified by a label affixed on product packaging as detailed in Section 5 of ER-304. Siding panels used in any Fire Hazard Severity Zone, or any Wildland-Urban Interface (WUI) Fire Area shall also include labels conforming to the requirements of CBC Section 703A.4, which include Contact and identification of information of the manufacturer, model number or identification of the product or material, and compliance standard SFM 12-7A-1.

5.0 SUBSTANTIATING DATA

- **5.1** Data in accordance with SFM 12-7A-1.
- **5.2** Engineering analysis of compliance with SFM Standard 12-7A-1.

For additional information about this evaluation report, please visit www.uniform-es.org or email us at info@uniform-es.org

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FLORIDA SUPPLEMENT

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QUALITY EDGE TRUCEDAR, VESTA, AND SHAKE SIDING PROFILES

CSI Sections:

07 42 13 Roofing and Siding Panels 07 46 19 Steel Siding

1.0 RECOGNITION

The Quality Edge TruCedar, VESTA, and Shake steel siding in IAPMO UES Evaluation Report ER-304 is a satisfactory alternative to the cladding systems prescribed in the following codes:

- 2023 Florida Building Code, Building (FBC, Building)
- 2023 Florida Building Code, Residential (FBC, Residential)

2.0 LIMITATIONS

Use of the Quality Edge TruCedar, VESTA, and Shake steel siding recognized in this report supplement is subject to the following limitations:

- **2.1** Design requirements shall be determined in accordance with the Florida Building Code, Building, or the Florida Building Code, Residential, as applicable.
- **2.2** Installation shall be in accordance with ER-304, the manufacturer's published installation instructions, and Section 1405 of the FBC, Building, or R703 of the FBC, Residential, as applicable. Flashing shall comply with Section 1405.4 of the FBC, Building.
- **2.3** Use of the Quality Edge TruCedar, VESTA, and Shake steel siding has not been evaluated for compliance with the high-velocity hurricane zone provisions of the FBC, Building, and FBC, Residential, and is outside the scope of this evaluation report.

2.4 For products falling under Section (5)(d) of Florida Rule 61G20-3.008, verification is required that the report holder's quality assurance program is audited by a quality assurance entity approved by the Florida Building Commission (or the building official when the report holder does not possess an approval by the Commission), to provide oversight and determine that the products are being manufactured as described in this evaluation report to establish continual product performance.

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2.5 This supplement expires concurrently with ER-304.

For additional information about this evaluation report, please visit www.uniform-es.org or email us at info@uniform-es.org