



● Compliance with International Codes  
● Compliance with State Codes

# ICC-ES Evaluation Report

## ESR-2588

Reissued June 2022

Revised June 22, 2022

This report is subject to renewal June 2024.

### DIVISION: 07 00 00—THERMAL AND MOISTURE PROTECTION

#### Section: 07 46 00—Siding

#### REPORT HOLDER:

COLLINS PRODUCTS, LLC

#### EVALUATION SUBJECT:

TRUWOOD® LAP AND PANEL SIDING PRODUCTS

### 1.0 EVALUATION SCOPE

#### Compliance with the following codes:

- 2021, 2018, 2015, 2012, and 2009 *International Building Code*® (IBC)
- 2021, 2018, 2015, 2012, and 2009 *International Residential Code*® (IRC)
- Other Codes (see Section 8.0)

#### Properties evaluated:

- Exterior wall covering
- Wall bracing

### 2.0 USES

TruWood® lap and panel sidings are used as exterior wall covering materials for buildings permitted to be of Type V-B construction and for structures constructed in accordance with the IRC. The TruWood® lap and panel sidings are hardboard sidings complying with 2021 and 2018 IBC Sections 1403.3.2 and 2303.1.7, 2015 IBC Sections 1404.3.2 and 2303.1.7, 2012 and 2009 IBC Sections 1404.3.2 and 2303.1.6 and 2021 and 2018 IRC Table R703.3.2, 2015 IRC Table R703.3(1), 2012 and 2009 IRC Table R703.4. The panel siding is also used for conventional light-frame wood construction as braced wall panels within designated braced wall lines as defined in 2021 and 2018 and 2015 IBC Section 2308.6, 2012 and 2009 IBC Section 2308.3 and IRC Section R602.10.1.

### 3.0 DESCRIPTION

TruWood® lap and panel siding products are fibrous-felted hardboard panels made from either non-zinc borate treated wood fiber or zinc borate treated wood fiber that is

consolidated under heat and pressure to a uniform density. The product is manufactured in <sup>7</sup>/<sub>16</sub>-inch [0.400 inch (10.2 mm) actual] and <sup>1</sup>/<sub>2</sub>-inch [0.490 inch (12.5 mm) actual] thicknesses and has a factory-applied primer on one face. The product is produced in lap siding and panel configurations having a variety of smooth or embossed surface patterns. TruWood® lap siding products are machined to a variety of groove patterns, lengths, ranging from 48 inches to 192 inches (1219 to 4877 mm), and widths, ranging from 6 inches to 16 inches (152 to 406 mm). TruWood® panel siding products are machined to a variety of groove patterns, lengths, ranging from 48 inches to 192 inches (1219 to 4877 mm), and widths, ranging from 47 inches to 50 inches (1193 to 1270 mm). TruWood® siding complies with CPA/ANSI A135.6.

Lap siding is available with square or beveled edges, or with a self-aligning feature on the back of each piece to allow for alignment of subsequent courses. Premium lap siding has horizontal shiplap joints. Sure Lock Lap Siding with Concealed Nailing System has tongue-and-groove joints on each piece. Panel siding is available with squared edges on all four edges or with square horizontal edges and shiplap vertical edges.

### 4.0 DESIGN AND INSTALLATION

#### 4.1 General:

Installation of TruWood® siding must comply with this report and the manufacturer's published installation instructions. The manufacturer's published installation instructions must be available at the jobsite at all times during installation.

Except where otherwise noted in this report, installation must comply with 2021 and 2018 and 2015 IBC Table 2308.6.3(5), 2012 and 2009 IBC Table 2308.9.3(5), 2021 and 2018 IRC Table R703.3.2, 2015 IRC Table R703.3.(1), or 2012 and 2009 IRC Table R703.4, as applicable. A water-resistive barrier in accordance with IBC Section 1403.2 or IRC Section R703.2 must be applied directly beneath the siding. Vertical butt joints of the siding must occur over framing members. A <sup>3</sup>/<sub>16</sub>-inch (4.8 mm) gap must be provided at all joints and around all openings. Gaps and vertical end joints must be caulked with an approved sealant. A minimum 6-inch (152 mm) clearance is required from the bottom of the siding to adjacent grade. Siding must not be in direct contact with concrete. All exterior openings must be flashed in accordance with the

applicable code. Fasteners used to attach the siding material to pressure-preservative-treated wood must be zinc-coated in accordance with ASTM A153.

#### 4.2 Lap Siding:

All siding courses must be lapped a minimum of 1 inch (25.4 mm) unless self-aligning or tongue-and-groove joints are provided on the siding. Sixteen-inch-wide (406 mm) Premium lap siding requires three nails per lap siding board on all studs. Successive boards are nailed  $\frac{5}{8}$  to  $\frac{3}{4}$  inch (15.9 to 19.1 mm) up from the drip edge and in the center of the board. Sure Lock lap siding is nailed on the scribed top edge and locked into the siding piece below it.

#### 4.3 Panel Siding:

Vertical edges of siding with shiplap edges must occur over framing. Vertical edges of square edged siding must occur over framing and should be covered with batten strips.

#### 4.4 Panel Siding Used as Wall Bracing:

TruWood® panel siding with a minimum 48-inch (1219 mm) width as described in this report may be used as wall bracing in accordance with the HPS method in 2021 and 2018 and 2015 IBC Section 2308.6.4, the method number 8 in 2012 and 2009 IBC Section 2308.9.3, 2021 and 2018, 2015 and 2012 IRC Section R602.10.5.2, and 2009 IRC Section R602.10.3.

#### 4.5 Design:

The siding products are limited to use on structures of conventional light-frame wood construction under the 2021 and 2018, 2015 and 2012 IBC in areas where wind speeds (3-second gust),  $V_{asd}$ , do not exceed 100 miles per hour [44 m/s (80 miles per hour (36 m/s) fastest mile)], or under the 2009 IBC in areas where wind speeds (three-second gust) do not exceed 100 miles per hour [44 m/s (80 miles per hour (36 m/s) fastest mile)]. In areas utilizing the IRC, the siding products are limited to use on structures in areas where wind speeds (three-second gust) are less than 110 miles per hour [48.4 m/s (90 miles per hour (40 m/s) fastest mile)]. The panel siding products are limited to use in Seismic Design Categories A, B or C, when they are used to resist seismic loads.

#### 4.6 Finishing:

The primed siding must be cleaned, dried and finish-painted in accordance with the manufacturer's published installation instructions.

### 5.0 CONDITIONS OF USE

The TruWood® siding products described in this report comply with, or are suitable alternatives to what is specified in, those codes listed in Section 1.0 of this report, subject to the following conditions:

- 5.1 Installation must comply with this report, the manufacturer's published installation 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 All windows, doors and other exterior openings must be flashed in accordance with the applicable code. Horizontal joints between siding panels must be flashed and sealed in accordance with the manufacturer's instructions.
- 5.3 The siding products are limited to use on structures as described in Section 4.5.

- 5.4 The sidings must be installed over a water-resistive barrier in accordance with the applicable code.

- 5.5 TruWood® panel siding used to meet the bracing requirements of the HPS method in 2021 and 2018 and 2015 IBC Section 2308.6.4, the method number 8 in 2012 and 2009 IBC Section 2308.9.3, 2021 and 2018, 2015 and 2012 IRC Section R602.10.5.2, and 2009 IRC Section R602.10.3 must comply with Section 4.4.

- 5.6 TruWood® siding products are produced in Klamath Falls, Oregon, under a quality-control program with inspections by ICC-ES.

### 6.0 EVIDENCE SUBMITTED

- 6.1 Manufacturer's published installation instructions and product literature.
- 6.2 Reports of tests in accordance with CPA/ANSI A135.6.
- 6.3 Reports of racking resistance tests in accordance with ASTM E72.
- 6.4 Quality control documentation.

### 7.0 IDENTIFICATION

Each package containing the TruWood® siding products described in this report is identified by a stamp bearing the manufacturer's name (Collins Products, LLC), the product name, the address of the manufacturing plant, the date of manufacture and the evaluation report number (ESR-2588). Additionally, each package must bear a note indicating conformance to CPA/ANSI\_A135.6.

- 7.1 The report holder's contact information is the following:

**COLLINS PRODUCTS, LLC**  
**6410 HIGHWAY 66**  
**KLAMATH FALLS, OREGON 97601**  
**(541) 885-3303**  
<http://TruWoodSiding.com>  
[icronin@collinsco.com](mailto:icronin@collinsco.com)

### 8.0 OTHER CODES

#### 8.1 Evaluation Scope:

The products in this report were also evaluated for compliance with the requirements of the 1997 *Uniform Building Code*™ (UBC).

#### 8.2 Uses:

See Section 2.0, except TruWood® siding is for buildings permitted to be of Type V-N construction. Use of the shiplap panels for shear resistance is as noted in Section 8.4.

#### 8.3 Description:

See Section 3.0.

#### 8.4 Installation and Design:

See Section 4.0, except for the following:

TruWood® panel siding with a minimum 48-inch (1219 mm) width as described in this report may be used as wall bracing in accordance with method number 8 in UBC Section 2320.11.3. TruWood® siding products are limited to use on structures of conventional light-frame wood construction in areas where the basic wind speed (fastest mile) does not exceed 80 miles per hour (161 km/h). When TruWood® Shiplap Panel siding is installed in accordance with UBC Section 2310.6 and Table 23-II-C, the allowable racking shear design values must be as given in the following table.

PANEL THICKNESS (inch)	DESIGN LOAD (lb./ft.) <sup>1</sup>
$\frac{7}{16}$	155
$\frac{1}{2}$	202

For SI: 1 inch = 25.4 mm, 1 lb./ft. = 14.59 N/m.

<sup>1</sup>Values obtained on aged samples at  $\frac{1}{8}$ -inch deflection.

**8.5 Conditions of Use:**

See Section 5.0, except for the following:

TruWood® siding panels used to meet the bracing requirements of method number 8 in UBC Section 2320.11.3 must comply with Section 8.4.

**8.6 Evidence Submitted:**

See Section 6.0.

**8.7 Identification:**

See Section 7.0

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## 1.0 REPORT PURPOSE AND SCOPE

## Purpose:

The purpose of this evaluation report supplement is to indicate that TruWood™ lap and panel sidings, described in ICC-ES evaluation report ESR-2588, have also been evaluated for compliance with the codes 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) and Division of the 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 TruWood™ lap and panel sidings, described in Sections 2.0 through 7.0 of the evaluation report ESR-2588, comply with CBC Chapters 14 and 23, provided the design and installation are in accordance with the 2018 *International Building Code*® (IBC) provisions noted in the evaluation report ESR-2588 and the additional requirements of CBC Chapters 14 and 23, as applicable.

The TruWood™ lap and panel sidings has not been evaluated under CBC Chapter 7A for use in construction of exterior walls of new buildings located in any Fire Hazard Severity Zone within State Responsibility Areas or any Wildland–Urban Interface Area.

## 2.1.1 OSHPD:

The applicable OSHPD Sections and Chapters of the CBC are beyond the scope of this evaluation report supplement.

## 2.1.2 DSA:

The applicable DSA Sections and Chapters of the CBC are beyond the scope of this evaluation report supplement.

## 2.2 CRC:

The TruWood™ lap and panel sidings, described in Sections 2.0 through 7.0 of the evaluation report ESR-2588 comply with CRC Sections R602 and R703, provided the design and installation are in accordance with the 2018 *International Residential Code*® (IRC) provisions noted in the evaluation report ESR-2588 and the applicable provisions of the CRC.

The TruWood™ lap and panel sidings, described in this evaluation report supplement, has not been evaluated under CRC Section R337 for use in construction of exterior walls of new buildings located in any Fire Hazard Severity Zone within State Responsibility Areas or any Wildland–Urban Interface Area.

The TruWood™ lap and panel sidings described in this evaluation report supplement have not been evaluated for compliance with the *International Wildland–Urban Interface Code*®.

This evaluation report supplement expires concurrently with the evaluation report ESR-2588 reissued June 2022 and revised June 22, 2022.