

# Qualified OSB Facing Materials for Structural Insulated Panels

PR-N610 Revised August 22, 2024

Product: 7/16 OSB Panels Qualified for Use as Facing of Structural Insulated Panels

- 1. Basis of the product report:
  - 2024, 2021, 2018, and 2015 International Residential Code (IRC): Section R610 Structural Insulated Panel Wall Construction
  - DOC PS 2-18 and PS 2-10 recognized in the 2024 and 2021 IRC, and 2018 and 2015 IRC, respectively
  - ANSI/APA PRS 610.1-2023 and PRS 610.1-2018 recognized in the 2024 IRC, and 2021 and 2018 IRC, respectively
- 2. Product description:

OSB panels of 7/16 Performance Category produced by the manufacturers listed in this report have been qualified for use as facing of structural insulated panels (SIPs). In addition to the requirements for PS 2, the 7/16 Performance Category OSB panels from the listed manufacturers meet the minimum properties specified in Table 2 of ANSI/APA PRS 610.1 as referenced in the 2024, 2021, and 2018 IRC and Table R610.3.2 of the 2015 IRC. The panel properties are quality-controlled on an on-going basis.

3. Minimum panel properties:

The OSB panels from the listed manufacturers in this report meet the properties specified in Table 1 below.

| Thickness<br>(in.) | Flatwise Stiffness <sup>(b)</sup><br>(lbf-in.²/ft) |        | Flatwise Strength <sup>(c)</sup><br>(lbf-in./ft) |        | Tension <sup>(c)</sup><br>(lbf/ft) |        | Density <sup>(d)</sup><br>(pcf) |
|--------------------|--|--------|--|--------|------------------------------------|--------|---------------------------------|
|                    | Along  | Across | Along  | Across | Along                              | Across |                                 |
| 7/16               | 55,600   | 16,500 | 1,040  | 460    | 7,450                              | 5,800  | 34                              |

## Table 1. Minimum Properties for Facing Materials Used for SIPs (a)

For SI: 1 lbf-in.<sup>2</sup>/ft = 9.415 x 10<sup>-6</sup> kN-m<sup>2</sup>/m, 1 lbf-in./ft = 3.707 x 10<sup>-4</sup> kN-m/m, 1 lbf/ft = 0.0146 N/mm, 1 pcf = 16.018 kg/m<sup>3</sup>

<sup>(a)</sup> Tabulated values are test values, which are not intended for use in design.

<sup>(b)</sup> Mean test value shall be in accordance with Section 7.6 of PS 2.

<sup>(c)</sup> Characteristic test value (5<sup>th</sup> percentile with 75% confidence).

<sup>(d)</sup> Mean density value shall be based on oven-dry weight and oven-dry volume in accordance with Method A of ASTM D2395.

## 4. Limitations:

- a) The properties listed in Table 1 are minimum test values and relate only to the OSB facing of SIPs. Design values for SIPs shall be provided by the SIP manufacturer.
- b) OSB panels listed in this report are produced by manufacturing facilities (as shown in Table 2) under a quality assurance program audited by APA.
- c) This report is subject to re-examination in one year.
- 5. Identification:

OSB panels listed in this report are identified by a label bearing the manufacturer's name and/or trademark, the APA assigned plant number (as shown in Table 2), the product thickness, the Span Rating, the Exposure Rating, the APA logo, the report number PR-N610, and a means of identifying the date of manufacture.

| Manufacturer               | Location                    | Mill Number | APA Test Report                    |  |
|----------------------------|-----------------------------|-------------|------------------------------------|--|
| LP Corporation             | Thomasville, AL             | 520         | T2023P-40                          |  |
| Tolko Industries Ltd.      | High Prairie, AB,<br>Canada | 450         | T2018P-32                          |  |
| Tolko Industries Ltd.      | Meadow Lake, SK,<br>Canada  | 492         | T2008P-40A                         |  |
| Tolko Industries Ltd.      | Slave Lake, AB,<br>Canada   | 514         | T2008P-78A                         |  |
| West Fraser <sup>(a)</sup> | Barwick, ON<br>Canada       | 498         | T2009P-08, T2009P-09,<br>T2010P-44 |  |
| West Fraser                | Grand Prairie, AB<br>Canada | 454         | T2010P-30                          |  |
| West Fraser                | Guntown, MS                 | 502         | T2023P-48                          |  |
| West Fraser                | Lanett, AL                  | 503         | T2019P-26, T2020P-03               |  |

### Table 2. Qualified Manufacturers of 7/16-inch OSB Panels for Use as Facing of SIPs

<sup>(a)</sup> Products may be treated with *Borogard*<sup>®</sup>ZB (registered trademark of U.S. Borax; an EPA registered zinc borate preservative). See APA Product Report PR-N213.

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7011 So. 19<sup>th</sup> St. • Tacoma, Washington 98466 Phone: (253) 565-6600 • Fax: (253) 565-7265 • Internet Address: <u>www.apawood.org</u>

#### PRODUCT SUPPORT HELP DESK

(253) 620-7400 • E-mail Address: help@apawood.org

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