



FLORIDA BUILDING CODE ENGINEERING EVALUATION REPORT

Issue Date | 2023-09-07
Report Number | 0082-2-3-5942
Client Name | Star Lumber Canada Ltd.
Address | P.O. Box 515, Sumas, WA 98295

Subject

Star Lumber, Green River, and Blackhawk Western Red Cedar Shakes and Shingles roof covering.

Evaluation Scope

This report is provided to assist registered design professionals and building officials in the United States with determining compliance to the performance objectives in the named building codes. The product(s) described herein have been evaluated to the 2023 Florida Building Code (FBC) and Residential Code (FBC-R).

CSI DIVISION: 07 00 00 THERMAL AND MOISTURE PROTECTION

SUBDIVISION: 07 31 29 Wood Shingles and Shakes

FBC CATEGORY: Roofing

SUB-CATEGORY: Wood Shingles and Shakes

CODE SECTIONS AND STANDARDS:

FBC Section	Description	Referenced Standard or Code Section	Year
1504.1	Wind Resistance of Roofs	FBC Ch 16	-
1507.8	Wood Shingles	RAS 130	2020
Table 1507.8.5	Wood Shingle Material Requirements	CSSB-97	1997
1507.9	Wood Shakes	RAS 130	2020
Table 1507.9.6	Wood Shake Material Requirements	CSSB-97	1997
1609.1.1	Determination of Wind Loads	ASCE 7	2022
Ch 35	National Design Specification for Wood Construction	ANSI/AWC NDS	2018

FBC-R Section	Description	Referenced Standard or Code Section	Year
R905.7	Wood Shingles	RAS 130	2020
Table R905.7.4	Wood Shingle Material Requirements	CSSB-97	1997
R905.8	Wood Shakes	RAS 130	2020
Table R905.8.5	Wood Shake Material Requirements	CSSB-97	1997
Ch 46	National Design Specification for Wood Construction	ANSI/AWC NDS	2018



COMPLIANCE STATEMENT:

Star Lumber, Green River, and Blackhawk Western Red Cedar Shakes and Shingles roof covering, installed as described in this report, have demonstrated compliance with the listed sections of the 2023 Florida Building Code (FBC) and Residential Code (FBC-R). Design and performance information can be found in the Product Evaluation section of this report.

This report has been prepared and reviewed on behalf of Boca Engineering Co. by:

Christopher Bowness, P.Eng., P.E.

2023-09-07

Issue Date

2026-12-31

Expiry Date



EVALUATION REPORT TERMS:

1. This report is a general evaluation of the building code section requirements as identified and applies only to the samples that were evaluated. It does not imply any endorsement or warranty, nor that the signatory Engineer is the Designer of Record of any construction project for which the information is used.

Rule 61G20-3 (17)(a) Definition: Evaluation report means a report based upon testing or comparative or rational analysis, or a combination thereof, from an approved product evaluation entity or a licensed Florida professional engineer or architect indicating that the product was evaluated to be in compliance with the Code or the intent of the Code and that the product complies with the Code or is, for the purpose intended, at least equivalent to that required by the Code.

2. This Evaluation Report expires Dec. 31, 2026, open to renewal. Up to the renewal date, the report is valid until such time as the named product(s) changes, the Quality Assurance Agency changes, or provisions of the Code that relate to the product change.

CERTIFICATION OF INDEPENDENCE:

1. Boca Engineering Co., its employees and shareholders, do not have, nor do they intend to or will acquire, a financial interest in any company manufacturing or distributing products that they evaluate.
2. Boca Engineering Co. is not owned, operated or controlled by any company manufacturing or distributing products that they evaluate.

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Product Evaluation

1.0 PRODUCT DESCRIPTION

- 1.0.1 Star Lumber, Green River, and Blackhawk Western Red Cedar Shakes and Shingles are naturally durable wood roofing shakes and shingles, manufactured in accordance with CSSB-97.
- 1.0.2 Shingles are 16, 18, and 24-inches length, 3 to 14-inches wide, minimum butt end thickness of 0.45-inches, and are CSSB grade 1, 2 or 3.
- 1.0.3 Shakes are 18 or 24-inches length, 4 to 14-inches wide, minimum butt end thickness of 0.45-inches, and are CSSB grade 1 or 2.

2.0 INSTALLATION

- 2.1 Star Lumber, Green River, and Blackhawk Western Red Cedar Shakes and Shingles shall be installed in accordance with the Florida Building Code and this report, subject to the Limitations in Section 3.
- 2.2 Prescriptive installation of wood shakes and shingles roof assemblies is detailed in Roofing Application Standard RAS 130.
- 2.3 Roof framing construction and roofing underlayment for which the wood shingles and shakes are to be installed over shall be designed and installed in accordance with the Florida Building Code.
- 2.4 ASSEMBLY INSTALLATION DETAILS WITH DESIGN UPLIFT PRESSURE
See attachments 1-2 of this report, Tables 1-2 and assembly diagrams.

3.0 CODE SECTIONS REVIEW

<u>FBC Section</u>	<u>Description</u>
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1504.3	Wind Resistance of Nonballasted Roofs
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The Wood Shingles and Shakes roofing systems as covered in this report follow installation instructions in accordance with Section 1507 and resist design wind load pressures in accordance with Section 1609. See ATTACHMENT 2: WIND PRESSURE AND WIND SPEED TABLES, Tables 1 – 2 of this report.

1507.8	Wood Shingles
---------------	----------------------

When installed in accordance with RAS130 and the details within this report, the roof covering system meets all the requirements of FBC 1507.8. Allowable uplift resistance is the allowable design pressure for each condition shown in Table 1 of this report.

Table 1507.8.5	Wood Shingle Material Requirements
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The wood shingles are manufactured in compliance with CSSB-97.

1507.9	Wood Shakes
---------------	--------------------

When installed in accordance with RAS130 and the details within this report, the roof covering system meets all the requirements of FBC 1507.9. Allowable uplift resistance is the allowable design pressure for each condition shown in Table 1 of this report.

Table 1507.9.6	Wood Shake Material Requirements
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The wood shakes are manufactured in compliance with CSSB-97.



1609.1.1	Determination of Wind Loads Wind load pressure (psf) applied to the cladding for use with the design values published in this report are determined in accordance with Chapter 30 of ASCE 7.
Ch 35	National Design Specification for Wood Construction Calculations to determine allowable uplift resistance are in accordance with NDS-2018.
<u>FBC-R Section</u>	<u>Description</u>
R905.7	Wood Shingles Same as this report commentary to FBC 1507.8.
Table R905.7.4	Wood Shingle Material Requirements Same as this report commentary to FBC Table 1507.8.5.
R905.8	Wood Shakes Same as this report commentary to FBC 1507.9.
Table R905.8.5	Wood Shake Material Requirements Same as this report commentary to FBC Table 1507.9.6.
Ch 46	National Design Specification for Wood Construction Same as this report commentary to FBC Ch 35.

4.0 LIMITATIONS:

- 4.1 This Evaluation is for the base code requirements of the building system as addressed in this report. In some building applications, additional performance objectives may be required by Code which must be addressed in the building design for those specific cases.
- 4.2 Design calculations, drawings, and special inspections are to be furnished for building projects by registered professionals as required by the respective jurisdictional authorities and Codes.
- 4.3 The roof covering is for use on wood roof decks only, as described in this report.
- 4.4 Preservative-treated shakes and shingles must be minimum Grade 1 in accordance with FBC Table 1507.9.6 and FBC-R Table R905.8.5.
- 4.5 Scope of evaluation does not include High Velocity Hurricane Zone sections of the Code.
- 4.6 Scope of evaluation does not include roofing applications where Fire Classification is required.
- 4.7 The conclusions of this report do not extend to wood shakes and shingles with fire-retardant chemical treatments.
- 4.8 The maximum roof height of installation is 33 ft as per RAS 130.

5.0 FIRE CLASSIFICATION:

Fire classification has not been evaluated.

6.0 QUALITY ASSURANCE ENTITY:

The products evaluated in this report are surveyed at the approved manufacturing locations with third-party quality assurance inspections and product certification labeling by QAI.



7.0 MANUFACTURING PLANTS:

Manufacturing and labeling location(s): Mission, BC, Canada .

8.0 LABELING:

Labeling shall be in accordance with the requirements of the FBC, and the Accredited Quality Assurance Agency.

9.0 REFERENCE TESTING AND EVALUATION DOCUMENTS:

<u>Entity</u>	<u>Entity Accreditation</u> ¹	<u>Standards</u>	<u>Report Name</u>	<u>Issue Date</u>
QAI Laboratories	QUA7628	CSSB-97	STAR LUMBER CANADA LTD - QUALITY CONTROL MANUAL	2019-Sep-17
ICC-ES	CER10562	IBC Table 1507.9.6	ESR-1208	2023-Mar

1. Inspection, testing, and evaluation entities referenced have been verified to be an approved organization in accordance with Rule 61G20-3, in good standing on the date of the evaluation.

- END -

ATTACHMENTS

ATTACHMENT 1: WIND PRESSURE AND WIND SPEED TABLES

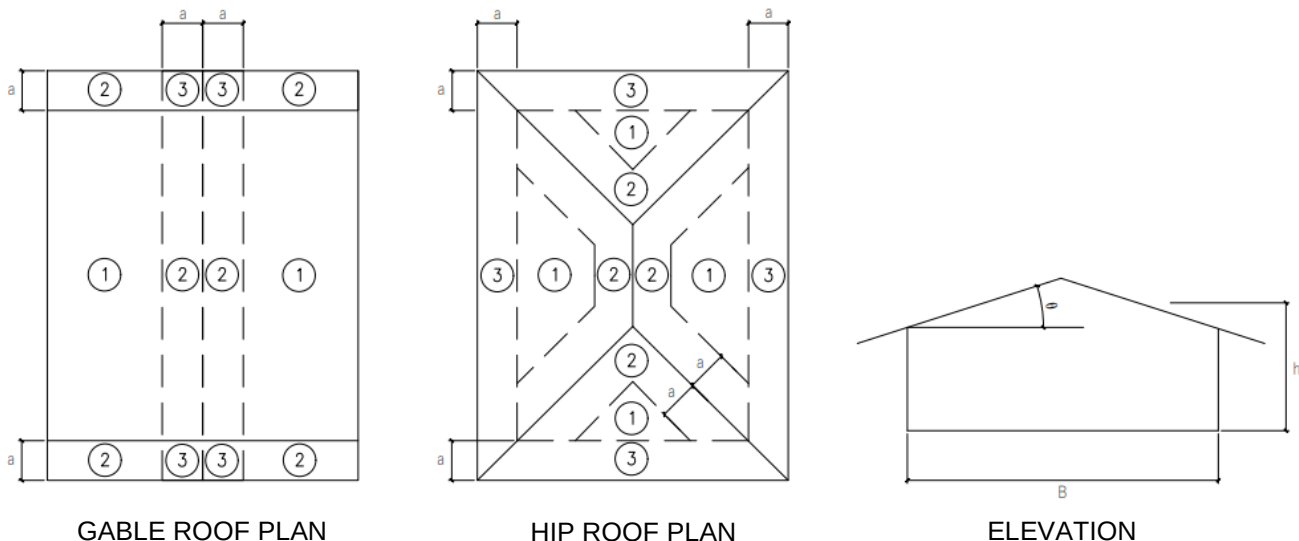
User's Guide to Wood Shingles and Shakes Wind Uplift Tables:

The Wood Shingles and Shakes wind uplift pressures and wind speed conversion tables have been developed to assist users in determining appropriate installation details for Wood Shingles and Shakes products, roof construction components, building dimension plans, and site and environmental conditions.

Wind speed conversion tables have been prepared following design methodology of ASCE7-22, Ch. 30.3, for low-rise enclosed buildings with maximum height of 60 ft, with topographic and elevation factors set to unity. These settings are typical of many installations, and consistent with the prescriptive approach used in FBC-R Table R301.2(2). All conditions and assembly details must be consistent with Tables 1 – 2 to be considered valid. If the actual site, building dimension or climatic conditions (including the given variables) differ from those prescribed, the allowable pressure values in Table 1 may be used to calculate adjusted wind speed limits.

For building heights over 60 ft, the Allowable Pressure (ASD) values listed in the wind uplift tables may be used by a licensed design professional to calculate ultimate wind speed and/or allowable height, for the given Wood Shingles and Shakes product installation detail and building project conditions.

At any building height, when the Allowable Pressure (ASD) has been pre-determined by the designer or building official, the user only needs to check that the installation detail is shown as capable of that pressure or greater.



a = 10% of least horizontal dimension or $0.4h$, whichever is smaller, but not less than either 4% of least horizontal dimension or 3 ft (0.9 m). If an overhang exists, the edge distance shall be measured from the outside edge of the overhang. The horizontal dimensions used to compute the edge distance shall not include any overhang distances.

h = Mean roof height, in ft (m), except that eave height shall be used for $\theta \leq 10^\circ$.

B = Horizontal dimension of building measured normal to wind direction, in ft (m).

θ = Angle of plane of roof from horizontal, in degrees.

Figure 1: Wind Pressure Diagrams as Represented in ASCE7-22 for use in conjunction with Tables 3 – 5.



Table 1: Allowable Wind Uplift Pressure Values for Wood Shingles and Shakes Roofing Assemblies

System No.	Deck Sheathing ¹	Roofing Shingles	Exposure (inches)	Shingle Fastening ^{2,3,4}	No. Fasteners	Allowable Pressure (ASD) (psf) ^{5,6,7}
Wood Shingles - Non-HVHZ Assemblies						
1	Min. 15/32 4-ply D-fir exterior plywood	16 in. Wood Shingles	5	min. 0.12-in dia stainless steel ring shank, 3/8-in head. Length.	2	74
2	Min. 15/32 4-ply D-fir exterior plywood	18 in. Wood Shingles	5.5	min. 0.12-in dia stainless steel ring shank, 3/8-in head. Length.	2	74
3	Min. 15/32 4-ply D-fir exterior plywood	24 in. Wood Shingles	7.5	min. 0.12-in dia stainless steel ring shank, 3/8-in head. Length.	2	74
Wood Shakes - Non-HVHZ Assemblies						
4	Min. 15/32 4-ply D-fir exterior plywood	18 in. Wood Shakes	7.5	min. 0.12-in dia stainless steel ring shank, 3/8-in head. Length, see note 2.	2	56
5	Min. 15/32 4-ply D-fir exterior plywood	24 in. Wood Shakes	10	min. 0.12-in dia stainless steel ring shank, 3/8-in head. Length, see note 2.	2	56

1. Roof sheathing specified may be substituted with i) any plywood of equal or greater thickness and species of 0.5 SG or greater, and, ii) solid plank decking minimum nominal size of 1-in x 4-in and 0.5 SG or greater.
2. Fasteners must be of sufficient length to penetrate the roof sheathing by 3/16-in or greater, or 1-in into solid sheathing.
3. Nails installed 1 ½-inches up from exposure line. Correctly positioned nails must pass through at least two layers of shingles/shakes and through the roof deck sheathing.
4. Stainless steel grade 304 (316 in coastal areas), 6d box roofing nails in compliance with ASTM F1667.
5. To convert to Factored Design Resistance Pressure (psf) (LRFD), multiply Allowable Pressure (psf) (ASD) by 1.67.
6. Allowable pressure (ASD) per this table may be used in conjunction with FBC Residential table R301.2(2) to determine Ultimate Design Wind Speed (V_{ULT}).
7. Design pressure determined by calculation to NDS-2018 with the following adjustment factors: $C_D = 1.6$, $C_M = 1$, $C_t = 0.8$, and, an additional reduction factor of 0.8 applied for conservative design.

Table 2: Maximum Wind Speeds of Roof Cladding at Various Building Heights^{1,2} - 2023 FBC (Non-HVHZ)

GABLE ROOFS (SLOPE 3:12 - 4.4:12)																
System No. ⁴	Allowable Pressure (psf) (ASD) ³	Exposure Category ⁵	ZONE 2/3 (EDGE/CORNER) ⁶							ZONE 1 (FIELD) ⁶						
			Maximum Wind Speed V_{ult} (mph) ⁸							Maximum Wind Speed V_{ult} (mph) ⁸						
			Building Height (ft) ⁷							Building Height (ft) ⁷						
			15	20	25	30	40	50	60	15	20	25	30	40	50	60
1, 2, 3	74	B	162	156	151	146	142	138	134	210	205	198	193	187	181	177
		C	133	129	126	124	120	117	115	175	170	166	163	158	154	152
		D	121	118	116	114	111	109	107	159	155	152	150	146	143	141
4, 5	56	B	141	135	131	127	124	120	117	186	178	173	168	163	158	154
		C	116	112	110	108	NA	NA	NA	152	148	145	142	138	134	132
		D	NA	NA	NA	NA	NA	NA	NA	138	135	133	130	127	124	123



GABLE ROOFS (SLOPE 4.5:12 – 6.1:12)																		
System No. ⁴	Allowable Pressure (psf) (ASD) ³	Exposure Category ⁵		ZONE 2/3 (EDGE/CORNER) ⁶							ZONE 1 (FIELD) ⁶							
				Maximum Wind Speed V _{ult} (mph) ⁸							Maximum Wind Speed V _{ult} (mph) ⁸							
				Building Height (ft) ⁷							Building Height (ft) ⁷							
				15	20	25	30	40	50		60	15	20	25	30	40	50	60
1, 2, 3	74	B		177	170	164	160	155	150	147		210	210	210	210	210	207	202
		C		145	141	138	135	131	128	126		199	194	189	186	180	176	173
		D		132	128	126	124	121	118	117		181	177	174	171	166	163	160
4, 5	56	B		154	147	143	139	135	131	127		210	203	197	191	186	180	175
		C		126	122	120	117	114	111	109		173	168	165	161	157	153	150
		D		114	112	110	108	105	NA	NA		157	154	151	148	145	142	140
GABLE ROOFS (SLOPE 6.2:12 - 12:12)																		
System No. ⁴	Allowable Pressure (psf) (ASD) ³	Exposure Category ⁵		ZONE 2/3 (EDGE/CORNER) ⁶							ZONE 1 (FIELD) ⁶							
				Maximum Wind Speed V _{ult} (mph) ⁸							Maximum Wind Speed V _{ult} (mph) ⁸							
				Building Height (ft) ⁷							Building Height (ft) ⁷							
				15	20	25	30	40	50		60	15	20	25	30	40	50	60
1, 2, 3	74	B		177	170	164	160	155	150	147		210	210	210	210	210	207	202
		C		145	141	138	135	131	128	126		199	194	189	186	180	176	173
		D		132	128	126	124	121	118	117		181	177	174	171	166	163	160
4, 5	56	B		154	147	143	139	135	131	127		210	203	197	191	186	180	175
		C		126	122	120	117	114	111	109		173	168	165	161	157	153	150
		D		114	112	110	108	105	NA	NA		157	154	151	148	145	142	140
HIP ROOFS (SLOPE 3:12 - 4.4:12)																		
System No. ⁴	Allowable Pressure (psf) (ASD) ³	Exposure Category ⁵		ZONE 2/3 (EDGE/CORNER) ⁶							ZONE 1 (FIELD) ⁶							
				Maximum Wind Speed V _{ult} (mph) ⁸							Maximum Wind Speed V _{ult} (mph) ⁸							
				Building Height (ft) ⁷							Building Height (ft) ⁷							
				15	20	25	30	40	50		60	15	20	25	30	40	50	60
1, 2, 3	74	B		177	170	164	160	155	150	147		210	210	210	210	210	207	202
		C		145	141	138	135	131	128	126		199	194	189	186	180	176	173
		D		132	128	126	124	121	118	117		181	177	174	171	166	163	160
4, 5	56	B		154	147	143	139	135	131	127		210	203	197	191	186	180	175
		C		126	122	120	117	114	111	109		173	168	165	161	157	153	150
		D		114	112	110	108	105	NA	NA		157	154	151	148	145	142	140



HIP ROOFS (SLOPE 4.5:12 – 6.1:12)																
System No. ⁴	Allowable Pressure (psf) (ASD) ³	Exposure Category ⁵	ZONE 2/3 (EDGE/CORNER) ⁶							ZONE 1 (FIELD) ⁶						
			Maximum Wind Speed V_{ult} (mph) ⁸							Maximum Wind Speed V_{ult} (mph) ⁸						
			Building Height (ft) ⁷							Building Height (ft) ⁷						
			15	20	25	30	40	50	60	15	20	25	30	40	50	60
1, 2, 3	74	B	177	170	164	160	155	150	147	210	210	210	210	210	207	202
		C	145	141	138	135	131	128	126	199	194	189	186	180	176	173
		D	132	128	126	124	121	118	117	181	177	174	171	166	163	160
4, 5	56	B	154	147	143	139	135	131	127	210	203	197	191	186	180	175
		C	126	122	120	117	114	111	109	173	168	165	161	157	153	150
		D	114	112	110	108	105	NA	NA	157	154	151	148	145	142	140

HIP ROOFS (SLOPE 6.2:12 - 12:12)																
System No. ⁴	Allowable Pressure (psf) (ASD) ³	Exposure Category ⁵	ZONE 2/3 (EDGE/CORNER) ⁶							ZONE 1 (FIELD) ⁶						
			Maximum Wind Speed V_{ult} (mph) ⁸							Maximum Wind Speed V_{ult} (mph) ⁸						
			Building Height (ft) ⁷							Building Height (ft) ⁷						
			15	20	25	30	40	50	60	15	20	25	30	40	50	60
1, 2, 3	74	B	177	170	164	160	155	150	147	210	210	210	210	210	207	202
		C	145	141	138	135	131	128	126	199	194	189	186	180	176	173
		D	132	128	126	124	121	118	117	181	177	174	171	166	163	160
4, 5	56	B	154	147	143	139	135	131	127	210	203	197	191	186	180	175
		C	126	122	120	117	114	111	109	173	168	165	161	157	153	150
		D	114	112	110	108	105	NA	NA	157	154	151	148	145	142	140

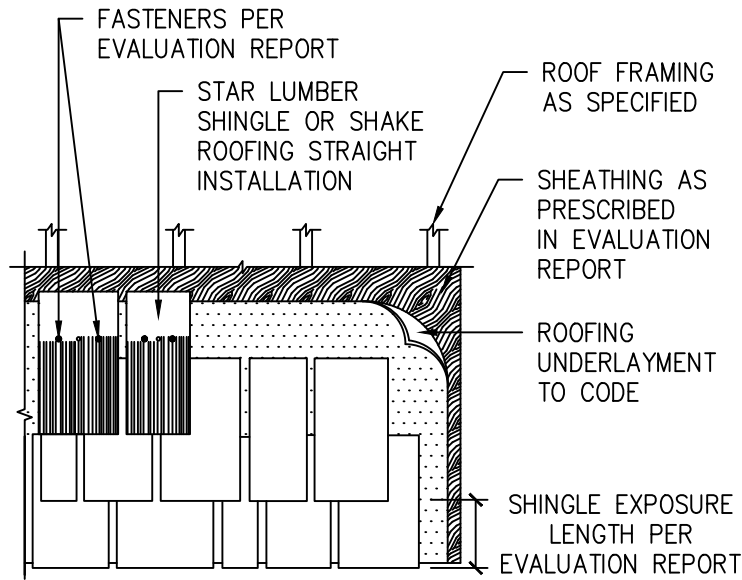
1. Table limiting heights and wind velocity values are for low-rise buildings of maximum 60 ft height, developed in accordance with ASCE7-22. Design input values: G_{Cp} = ASCE7-22 Figs 30.3-2(A-I), G_{Cpi} = 0.18, K_{zt} = 1, K_d = 0.85, K_e = 1, I_w = 1.0.
2. Wind speed conversion corresponds to the maximum Zone 1/2/3 pressure with effective area of 10 ft². Table wind speeds are only valid under the design conditions stated. For other site conditions and/or building dimensions, designers can use the published Allowable Pressure (psf) (ASD) to determine allowable wind speeds with FBC-R Table R301.2(2) or calculations to FBC Ch 16.
3. To convert to Factored Design Resistance Pressure (psf) (LRFD), multiply Allowable Pressure (psf) (ASD) by 1.67.
4. Wood Shingle and Shake System No. details as provided in Table 2 of this report.
5. Wind exposure categories as defined in ASCE7-22, section 26.7.
6. Per Figure 1 of this report, Zone 2/3 is the perimeter and corner locations and Zone 1 is the field of the roof. The zone numbers have been simplified for use with this table.
7. Interpolation not permitted. For heights in between those listed, use next highest height column.
8. NA indicates that the installation condition is not acceptable within the design limits of the table.

ATTACHMENT 2: ASSEMBLY DIAGRAMS

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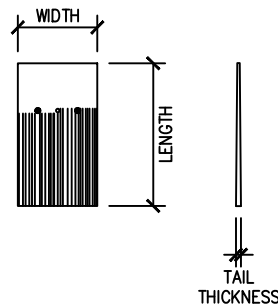


STAR LUMBER SHINGLE AND SHAKE ROOFING DETAILS OF 2023 FBC WIND LOAD RESISTANCE ASSEMBLIES



A
1
STAR LUMBER SHAKE ROOFING INSTALLATION
PLAN VIEW
NOT-TO-SCALE

STAR LUMBER ROOFING SHINGLE AND SHAKE DIMENSIONS			
PRODUCT	LENGTHS (IN.)	WIDTH (IN.)	MIN. THICKNESS (IN.)
			TAIL
WOOD SHINGLE	16, 18, 24	3 – 14	0.450
WOOD SHAKE	18, 24, 0	4 – 14	0.450



DRAWING FOR STAR LUMBER
ROOFING ENGINEERING
EVALUATION REPORT – NOT
FOR USE AS CONSTRUCTION
DESIGN DOCUMENTS

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CLIENT: STAR LUMBER CANADA LTD.	PROJECT: STAR LUMBER WOOD SHAKES AND SHINGLES	TITLE: TYPICAL SHAKE AND SHINGLE INSTALLATION DETAILS	DRAWING NO.	DES	CB
			0082-2-3-5942	DRN	TH
			SEPTEMBER 7, 2023	CHK	CB

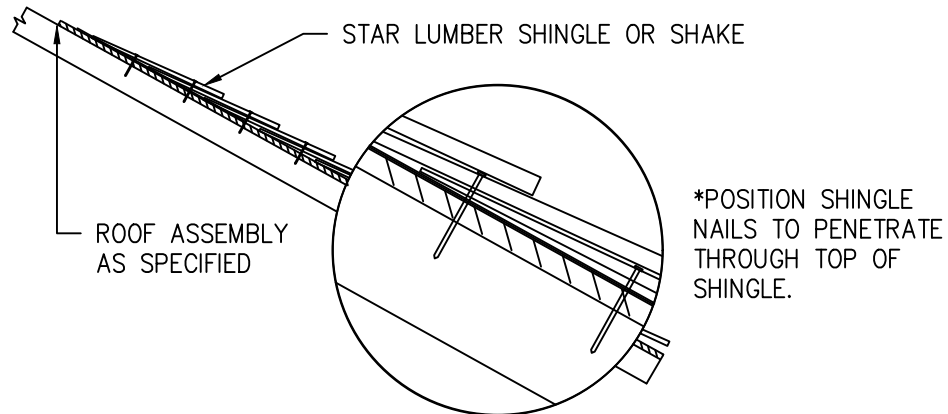
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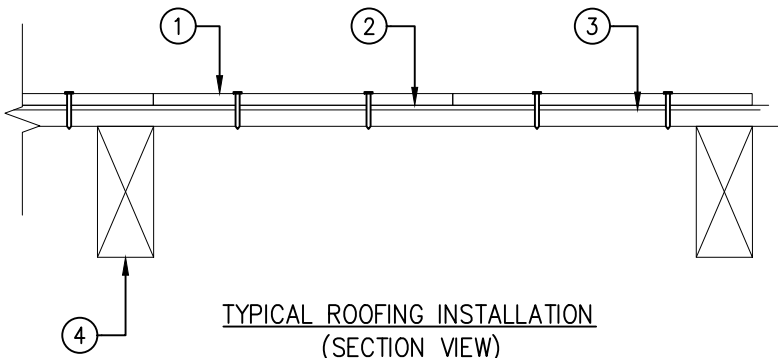
STAR LUMBER SHINGLE AND SHAKE ROOFING DETAILS OF 2023 FBC WIND LOAD RESISTANCE ASSEMBLIES



A
2
STAR LUMBER ROOFING TYPICAL INSTALLATION
SECTION VIEW
NOT-TO-SCALE

ROOF FRAMING & WOOD-BASE SHEATHING ASSEMBLY EXTERIOR TO INTERIOR

1	STAR LUMBER SHAKES OR SHINGLES. FASTENING PER ENGINEERING EVALUATION REPORT
2	ROOFING UNDERLAYMENT, TO CODE
3	WOOD-BASED SHEATHING FASTENED TO FRAMING PER CODE, SEE ENGINEERING EVALUATION REPORT
4	ROOF FRAMING PER PLANS, TO CODE



TYPICAL ROOFING INSTALLATION
(SECTION VIEW)

B
2
STAR LUMBER ROOFING ON WOOD SHEATHING
SECTION VIEW
NOT-TO-SCALE

DRAWING FOR STAR LUMBER
ROOFING ENGINEERING
EVALUATION REPORT – NOT
FOR USE AS CONSTRUCTION
DESIGN DOCUMENTS

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CLIENT:	PROJECT:	TITLE:
STAR LUMBER CANADA LTD.	STAR LUMBER WOOD SHAKES AND SHINGLES	TYPICAL SHAKE AND SHINGLE INSTALLATION DETAILS

0	2023/09/07	FOR PUBLICATION		CB
REV	DATE	ISSUE		APP
DRAWING NO. 0082-2-3-5942			DES	CB
			DRN	TH
SEPTEMBER 7, 2023			CHK	CB

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STAR LUMBER SHINGLE AND SHAKE ROOFING NOTES FOR WIND LOAD RESISTANCE ASSEMBLIES

LEGEND AND SYMBOLS



— DETAIL NUMBER
— SHEET DRAWN



— SECTION NUMBER
— SHEET DRAWN

TESTING AND CODE COMPLIANCE

1. THE ROOFING PRODUCT ASSEMBLY SHOWN IS DESIGNED TO COMPLY WITH THE 8TH EDITION (2023) FLORIDA BUILDING CODE (FBC).
2. THE STRUCTURAL FRAMING AND SHEATHING SHALL BE DESIGNED AND ANCHORED TO PROVIDE LATERAL BRACING TO NOT EXCEED DEFLECTION LIMITS, AND PROPERLY TRANSFER ALL LOADS TO THE STRUCTURE. FRAMING DESIGN AND INSTALLATION IS THE RESPONSIBILITY OF THE ENGINEER OR ARCHITECT OF RECORD FOR THE PROJECT OF INSTALLATION.
3. THESE DRAWINGS APPLY TO THE TESTING ASSEMBLY ONLY AND DO NOT IMPLY THAT THE SIGNATORY ENGINEER IS THE DESIGNER OF RECORD FOR ANY FUTURE CONSTRUCTION ON WHICH THEY ARE USED.
4. SOME NON-STRUCTURAL COMPONENTS NOT SHOWN AND DO NOT IMPACT STRENGTH FOR ATTACHMENT. TO BE INSTALLED PER CODE AND MAY INCLUDE: FLASHING, INTERIOR INSULATION, INTERIOR FINISH.

INSTALLATION

THE INSTALLATION DETAILS DESCRIBED ARE OF THE EVALUATED ASSEMBLY AND MAY NOT REFLECT ACTUAL CONDITIONS FOR A SPECIFIC SITE. IF SITE CONDITIONS DEVIATE FROM THE REQUIREMENTS DETAILED HEREIN, THE LICENSED ENGINEER OR ARCHITECT PREPARED SITE-SPECIFIC DOCUMENTS SHALL BE USED.

SHEATHING

1. WOOD-BASED STRUCTURAL SHEATHING:
 - 1.1. PLYWOOD – US DOC PS1-19 OR PS2-18 U.N.O.
 - 1.2. OSB – US DOC PS2-18 U.N.O.

FASTENERS

1. NAILS TO CONFORM TO ASTM F1667.
2. ALL FASTENERS WITH CORROSION-RESISTANT GALVANIZED COATING.

SHAKES AND SHINGLES

1. CONFORM TO CSSB-97.

HIP & RIDGE

REFER TO MANUFACTURER'S INSTRUCTIONS.

VALLEYS

REFER TO MANUFACTURER'S INSTRUCTIONS.

DRAWING FOR STAR LUMBER
ROOFING ENGINEERING
EVALUATION REPORT – NOT
FOR USE AS CONSTRUCTION
DESIGN DOCUMENTS

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CLIENT:	PROJECT:	TITLE:	0	2023/09/07	FOR PUBLICATION	CB
STAR LUMBER CANADA LTD.	STAR LUMBER WOOD SHAKES AND SHINGLES	TYPICAL SHAKE AND SHINGLE INSTALLATION DETAILS	REV	DATE	ISSUE	APP
			DRAWING NO.		DES	CB
			0082-2-3-5942		DRN	TH
			SEPTEMBER 7, 2023		CHK	CB

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