



EXPOSED FASTENING SYSTEMS

PBR PANEL

Features and Benefits

Numerous UL 580 ratings are available, as well as UL 790, Class A for external fire, roof assembly for UL 263 for internal fire and the UL 2218 Class 4 impact rating.

PBR carries Florida approval, Dade county ratings and FM 4471 approval standard for Class 1 panel roofs.

Product Specifications:

Applications: Roof and Wall

Coverage Widths: 36"

Rib Spacing: 12" on center

Rib Height: 1-1/4"

Minimum Slope: 1/2:12

Panel Attachment: Exposed Fastening System

Gauges: 26 (Standard); 29, 24, 22 (Optional)

Finishes: Smooth (standard); Embossed (optional)

Coatings: Galvalume Plus®, Signature® 200, Signature® 300

The PBR panel is commonly used for a wide variety of architectural, agricultural, commercial and industrial applications. PBR is a structural panel and an exposed fastener panel that can be used for both roof and wall applications. The minimum roof slope for PBR is 1/2:12.



PBR Panel Properties

ALLOWABLE USABLE LOADS IN POUNDS PER SQUARE FOOT

Span Type	Gauge	Load Type	1.00	2.00	3.00	4.00	5.00	6.00	
Single	29	Negative Wind	814.0	203.5	90.4	50.9	32.6	22.6	16.6
		Pos. Wind/ Live Load/ (L/180)	559.8	139.9	62.2	33.2	17.0	9.8	6.2
		Pos. Wind/ Live Load/ (L/120)	559.8	139.9	62.2	35.0	22.4	13.2	8.3
	26	Negative Wind	1097.1	274.3	121.9	68.6	43.9	30.5	22.4
		Pos. Wind/ Live Load/ (L/180)	931.3	413.9	126.3	53.3	27.3	15.8	9.9
		Pos. Wind/ Live Load/ (L/120)	931.3	413.9	147.3	62.1	31.8	18.4	11.6
	24	Negative Wind	1190.4	297.6	132.3	74.4	47.6	33.1	24.3
		Pos. Wind/ Live Load/ (L/180)	1154.0	288.5	128.2	72.1	39.6	22.9	14.4
		Pos. Wind/ Live Load/ (L/120)	1154.0	288.5	128.2	72.1	44.1	25.5	16.1
	22	Negative Wind	1544.4	386.1	171.6	96.5	61.8	42.9	31.5
		Pos. Wind/ Live Load/ (L/180)	1677.8	419.4	186.4	104.9	55.9	32.4	20.4
		Pos. Wind/ Live Load/ (L/120)	1677.8	419.4	186.4	104.9	59.4	34.4	21.7
2-Span	29	Negative Wind	341.9	117.4	57.1	33.3	21.7	15.2	11.2
		Pos. Wind/ Live Load/ (L/180)	381.5	148.1	76.6	46.0	30.5	21.6	14.9
		Pos. Wind/ Live Load/ (L/120)	381.5	148.1	76.6	46.0	30.5	21.6	16.0
	26	Negative Wind	683.6	211.3	98.9	56.7	36.6	25.6	18.8
		Pos. Wind/ Live Load/ (L/180)	741.7	240.8	114.6	66.2	42.9	30.0	22.1
		Pos. Wind/ Live Load/ (L/120)	741.7	240.8	114.6	66.2	42.9	30.0	22.1
	24	Negative Wind	956.8	273.4	125.1	71.1	45.7	31.9	23.4
		Pos. Wind/ Live Load/ (L/180)	977.3	281.1	128.8	73.3	47.2	32.8	24.2
		Pos. Wind/ Live Load/ (L/120)	977.3	281.1	128.8	73.3	47.2	32.8	24.2
	22	Negative Wind	1420.2	400.1	182.4	103.6	66.6	46.3	34.1
		Pos. Wind/ Live Load/ (L/180)	1336.6	370.9	168.5	95.5	61.4	42.7	31.4
		Pos. Wind/ Live Load/ (L/120)	1336.6	370.9	168.5	95.5	61.4	42.7	31.4
3-Span	29	Negative Wind	378.4	138.1	69.0	40.8	26.7	18.8	13.9
		Pos. Wind/ Live Load/ (L/180)	411.4	168.5	90.3	55.4	32.1	18.6	11.7
		Pos. Wind/ Live Load/ (L/120)	411.4	168.5	90.3	55.4	37.1	24.8	15.6
	26	Negative Wind	779.1	254.5	121.3	70.1	45.5	31.8	23.5
		Pos. Wind/ Live Load/ (L/180)	832.9	286.9	139.7	81.5	51.5	29.8	18.8
		Pos. Wind/ Live Load/ (L/120)	832.9	286.9	139.7	81.5	53.1	34.7	21.9
	24	Negative Wind	1121.4	334.3	154.7	88.4	57.0	39.7	29.2
		Pos. Wind/ Live Load/ (L/180)	1142.4	343.3	159.3	91.0	58.7	40.9	27.3
		Pos. Wind/ Live Load/ (L/120)	1142.4	343.3	159.3	91.0	58.7	40.9	30.2
	22	Negative Wind	1674.0	490.5	226.0	128.8	82.9	57.8	42.6
		Pos. Wind/ Live Load/ (L/180)	1585.5	455.9	209.0	118.9	76.5	53.3	38.5
		Pos. Wind/ Live Load/ (L/120)	1585.5	455.9	209.0	118.9	76.5	53.3	39.2
4-Span	29	Negative Wind	367.6	131.6	65.2	38.3	25.1	17.6	13.0
		Pos. Wind/ Live Load/ (L/180)	402.7	162.3	86.0	52.4	34.1	19.7	12.4
		Pos. Wind/ Live Load/ (L/120)	402.7	162.3	86.0	52.4	34.9	24.9	17.6
	26	Negative Wind	750.1	240.7	114.0	65.7	42.6	29.7	21.9
		Pos. Wind/ Live Load/ (L/180)	805.6	272.3	131.6	76.5	49.7	31.6	19.9
		Pos. Wind/ Live Load/ (L/120)	805.6	272.3	131.6	76.5	49.7	34.8	25.7
	24	Negative Wind	1070.1	314.5	145.0	82.7	53.3	37.1	27.3
		Pos. Wind/ Live Load/ (L/180)	1091.1	323.1	149.3	85.2	54.9	38.3	28.2
		Pos. Wind/ Live Load/ (L/120)	1091.1	323.1	149.3	85.2	54.9	38.3	28.2
	22	Negative Wind	1594.5	461.1	211.7	120.5	77.5	54.0	39.8
		Pos. Wind/ Live Load/ (L/180)	1507.0	428.2	195.7	111.2	71.5	49.8	36.6
		Pos. Wind/ Live Load/ (L/120)	1507.0	428.2	195.7	111.2	71.5	49.8	36.6

NOTES:

1. Allowable loads are based on uniform span lengths.
2. Live Load or Positive Wind is limited by bending, shear, and/or combined shear & bending, which ever controls.
3. Negative Wind Load does not consider fastener pullout or pullover.
4. Panel weight has not been deducted from allowable loads.
5. Web crippling has not been checked and must be verified by the design professional for exterior and interior supports.
6. This material is subject to change without notice. Please contact GWB for most current data.

The Engineering data contained herein is for the expressed use of customers and design professionals. Along with this data, it is recommended that the design professional have a copy of the most current version of the North American Specification for the Design of Cold-Formed Steel Structural Members published by the American Iron and Steel Institute to facilitate design. The Specification contains the design criteria for the cold-formed steel components. Along with the Specification, the designer should reference the most current building code applicable to the project jobsite in order to determine environmental loads. If the information or guidance regarding cold-formed design practice is desired, please contact the manufacturer.