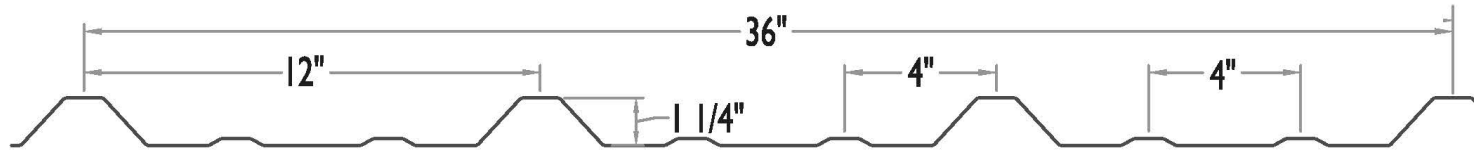




# R-PANEL WPRP



## 180 Deflection

SECTION PROPERTIES										ALLOWABLE UNIFORM LOADS, psf (single span) - for wall applications only For various fastener spacings (i.e. span values)															
Ga.	Width in.	Yield ksi	Weight psf	Top in Compression			Bottom in Compression			Inward Load								Outward Load							
				$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'
24	36	50	1.23	0.0910	0.0782	0.0620	0.0470	0.0598	0.0810	310.0	137.8	77.5	49.6	31.6	19.9	13.4	9.4	405.0	180.0	81.7	41.8	24.2	15.2	10.2	7.2
22	36	50	1.46	0.0830	0.0710	0.0660	0.0430	0.0550	0.0860	330.0	146.7	82.5	49.7	28.7	18.1	12.1	8.5	430.0	178.1	75.1	38.5	22.3	14.0	9.4	6.6

SECTION PROPERTIES										ALLOWABLE UNIFORM LOADS, psf (two equal spans) For various fastener spacings (i.e. span values)															
Ga.	Width in.	Yield ksi	Weight psf	Top in Compression			Bottom in Compression			Inward Load								Outward Load							
				$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'
24	36	50	1.23	0.0910	0.0782	0.0620	0.0470	0.0598	0.0810	310.0	137.8	77.5	49.6	34.4	25.3	19.4	15.3	405.0	180.0	101.3	64.8	45.0	33.1	24.6	17.3
22	36	50	1.46	0.0830	0.0710	0.0660	0.0430	0.0550	0.0860	330.0	146.7	82.5	52.8	36.7	26.9	20.6	16.3	430.0	191.1	107.5	68.8	47.8	33.8	22.6	15.9

SECTION PROPERTIES										ALLOWABLE UNIFORM LOADS, psf (three equal spans) For various fastener spacings (i.e. span values)															
Ga.	Width in.	Yield ksi	Weight psf	Top in Compression			Bottom in Compression			Inward Load								Outward Load							
				$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'
24	36	50	1.23	0.0910	0.0782	0.0620	0.0470	0.0598	0.0810	387.5	172.2	96.9	62.0	43.1	31.6	24.2	18.8	506.3	225.0	123.6	81.0	48.6	30.6	20.5	14.4
22	36	50	1.46	0.0830	0.0710	0.0660	0.0430	0.0550	0.0860	412.5	183.3	103.1	66.0	45.8	33.7	24.3	17.1	537.5	238.9	134.4	77.2	44.4	28.2	18.9	13.2



# R-PANEL WPRP

## 240 Deflection

SECTION PROPERTIES										ALLOWABLE UNIFORM LOADS, psf (single span) - for wall applications only For various fastener spacings (i.e. span values)															
Ga.	Width in.	Yield ksi	Weight psf	Top in Compression			Bottom in Compression			Inward Load							Outward Load								
				$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'
24	36	50	1.23	0.1000	0.1020	0.1220	0.1070	0.1050	0.1240	310.0	137.8	77.5	41.0	23.7	15.0	10.0	7.0	405.0	145.2	61.3	31.4	18.2	11.4	7.7	5.4
22	36	50	1.46	0.1270	0.1280	0.1510	0.1300	0.1290	0.1570	330.0	146.7	72.7	37.2	21.6	13.6	9.1	6.4	430.0	133.5	56.3	28.8	16.7	10.5	7.0	5.0

SECTION PROPERTIES										ALLOWABLE UNIFORM LOADS, psf (two equal spans) For various fastener spacings (i.e. span values)															
Ga.	Width in.	Yield ksi	Weight psf	Top in Compression			Bottom in Compression			Inward Load							Outward Load								
				$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'
24	36	50	1.23	0.1000	0.1020	0.1220	0.1070	0.1050	0.1240	310.0	137.8	77.5	49.6	34.4	25.3	19.4	15.3	405.0	180.0	101.3	64.8	43.7	27.5	18.4	13.0
22	36	50	1.46	0.1270	0.1280	0.1510	0.1300	0.1290	0.1570	330.0	146.7	82.5	52.8	36.7	26.9	20.6	15.4	430.0	191.1	107.5	68.8	40.2	25.3	17.0	11.9

SECTION PROPERTIES										ALLOWABLE UNIFORM LOADS, psf (three equal spans) For various fastener spacings (i.e. span values)															
Ga.	Width in.	Yield ksi	Weight psf	Top in Compression			Bottom in Compression			Inward Load							Outward Load								
				$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	$I_{xx}$ in <sup>4</sup> /ft.	$I_{xx}$ (eff) in <sup>4</sup> /ft.	$S_{xx}$ in <sup>3</sup> /ft.	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'	2.0'	3.0'	4.0'	5.0'	6.0'	7.0'	8.0'	9.0'
24	36	50	1.23	0.1000	0.1020	0.1220	0.1070	0.1050	0.1240	387.5	172.2	96.9	62.0	43.1	30.0	20.1	14.1	506.3	225.0	123.0	63.0	36.5	23.0	15.4	10.8
22	36	50	1.46	0.1270	0.1280	0.1510	0.1300	0.1290	0.1570	412.5	183.3	103.1	66.0	43.3	27.3	18.3	12.8	537.5	238.9	113.1	57.9	33.5	21.1	14.1	9.9

### NOTES:

- Theoretical section properties have been calculated per AISI 2012 North American Specification for the Design of Cold-Formed Steel Structural Member.  
 $I_{xx}$  and  $S_{xx}$  are effective section properties for deflection and bending.
- Allowable load is calculated in accordance with AISI 2012 specifications considering bending, shear, combined bending and shear and deflection. Allowable load considers a 3 or more equal span condition.
- Allowable load does not address web crippling, fasteners, connection strength or support material.
- Panel weight is not considered.
- Load/Span values are based on theoretical computations and not load testing.
- Deflection consideration is limited by a maximum deflection ratio of  $L/180$  or  $L/240$  of span.
- Allowable loads do not include a  $1/3$  stress increase for wind.