



MSR Panel

(Bare Galvalume & Painted Galvalume)



SECTION PROPERTIES						TOP IN COMPRESSION			BOTTOM IN COMPRESSION		
GAUGE	FY (KSI)	WEIGHT (PSF)	V _a kip/ft.	P _{a_end} lbs/ft.	P _{a_int} lbs/ft.	I _x (in. ⁴ /ft.)	S _e (in. ³ /ft.)	M _a kip-in./ft.	I _x (in. ⁴ /ft.)	S _e (in. ³ /ft.)	M _a kip-in./ft.
22	50.0	1.99	1.2410	324.20	540.10	0.5240	0.2475	7.4120	0.4020	0.3080	7.1000

1. Section properties are calculated in accordance with the 2007 AISI North American Specification for the Design of Cold-Formed Steel Structural Members.
2. V_a is the allowable shear.
3. P_a is the allowable load for web crippling on end & interior supports.
4. I_x is for deflection determination.
5. S_e is for bending.
6. M_a is the allowable bending moment.
7. All values are for one foot of panel width.

Allowable Uniform Loads (PSF)

Span Type	Load Type	Span in Feet															
		4.50	5.00	5.50	6.00	6.50	7.00	7.50	8.00	8.50	9.00	9.50	10.00	10.50	11.00	11.50	12.00
Single	Positive Wind	244	197	163	137	116	100	87	77	68	61	54	49	44	40	37	34
	Negative Wind	233	189	156	131	112	96	84	73	65	58	52	47	42	39	35	32
	Live	244	197	163	137	116	100	87	77	68	61	54	49	44	40	37	34
	Deflection (L/180)	500	366	275	212	166	133	108	89	74	62	53	45	39	34	30	26
	Deflection (L/240)	376	274	206	159	125	100	81	67	55	47	40	34	29	25	22	19
2 Span	Positive Wind	206	170	143	122	105	91	80	70	63	56	50	46	41	38	35	32
	Negative Wind	213	176	148	126	109	95	83	73	65	58	52	47	43	39	36	33
	Live	206	170	143	122	105	91	80	70	63	56	50	46	41	38	35	32
	Deflection (L/180)	500	500	500	451	354	284	231	190	158	133	113	97	84	73	64	56
	Deflection (L/240)	500	500	439	338	266	213	173	142	119	100	85	73	63	54	48	42
3 Span	Positive Wind	246	205	173	148	128	111	98	87	77	69	62	56	51	47	43	39
	Negative Wind	254	212	179	153	132	115	102	90	80	72	65	59	53	49	45	41
	Live	246	205	173	148	128	111	98	87	77	69	62	56	51	47	43	39
	Deflection (L/180)	500	500	459	353	278	222	181	149	124	104	89	76	65	57	50	44
	Deflection (L/240)	500	458	344	265	208	166	135	111	93	78	66	57	49	43	37	33
4 Span	Positive Wind	233	194	163	139	120	105	92	81	72	65	58	53	48	44	40	37
	Negative Wind	241	200	169	144	125	109	95	84	75	67	61	55	50	46	42	38
	Live	233	194	163	139	120	105	92	81	72	65	58	53	48	44	40	37
	Deflection (L/180)	500	500	487	375	295	236	192	158	132	111	94	81	70	60	53	46
	Deflection (L/240)	500	486	365	281	221	177	144	118	99	83	70	60	52	45	39	35

Notes:

1. Allowable uniform loads are based upon equal span lengths.
2. Positive Wind is wind pressure and is **NOT** increased by 33 1/3 %.
3. Negative Wind is wind suction or uplift and is **NOT** increased by 33 1/3%.
4. Live is the allowable live or snow load.
5. Deflection (L/180) is the allowable load that limits the panel's deflection to L/180 while under positive or live load.
6. Deflection (L/240) is the allowable load that limits the panel's deflection to L/240 while under positive or live load.
7. The weight of the panel has **NOT** been deducted from the allowable loads.
8. Positive Wind, Negative Wind, and Live Load values are limited to combined shear & bending using Eq. C3.3.1-1 of the AISI Specification.
9. Load Tables are limited to a maximum allowable load of 500 psf.
10. Web crippling is not applicable.