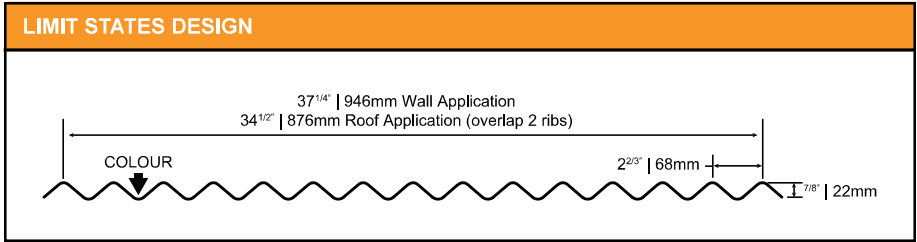


1. Based on ASTM A 653 structural steel.
2. Values in row "S" are based on strength.
3. Values in row "D" are based on deflection of 1/180th span.
4. Web crippling not included in strength calculation. See example.
5. Limit States Design principles were used in accordance with CSA Standard S136-12.



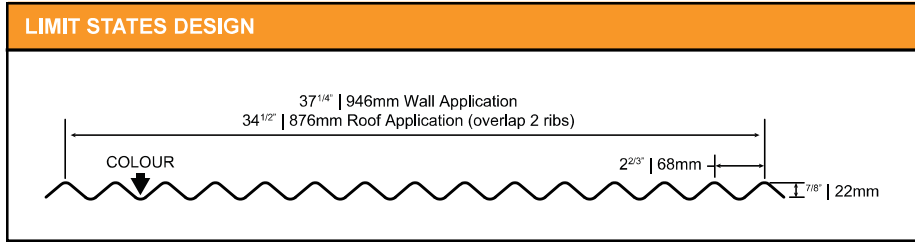
SECTION PROPERTIES Per Foot of Width									
Base Steel Thickness (inches)	Weight [G90] (psf)	Yield Stress (ksi)	Section Modulus		Deflection Moment of Inertia (in ⁴)	Specified Web Crippling Data			
			Midspan (in ³)	Support (in ³)		Pe1 End (lb)	Pe2 End (lb)	Pi1 Interior (lb)	Pi1 Interior (lb)
0.0135	0.74	80	0.0404	0.0404	0.0177				
0.0180	0.97	33	0.0531	0.0531	0.0232				
0.0180	0.97	50	0.0531	0.0531	0.0232				
0.0240	1.27	33	0.0697	0.0697	0.0305				
0.0300	1.58	33	0.0856	0.0856	0.0375				

LLF = 1.40; IMPF = 0.75; NORMAL OCCUPANCY = 1.0

LOAD TABLE Maximum Uniformly Distributed Specified Loads (psf).																
Span Length (ft)		1-Span Base Steel Thickness (inches)					2-Span Base Steel Thickness (inches)					3-Span Base Steel Thickness (inches)				
		0.0135	0.0180	0.0180	0.0240	0.0300	0.0135	0.0180	0.0180	0.0240	0.0300	0.0135	0.0180	0.0180	0.0240	0.0300
Y.S.* (ksi)		80	33	50	33	33	80	33	50	33	33	80	33	50	33	33
2.0	S	259	188	285	246	303	259	188	285	246	303	324	235	356	308	378
2.0	D	257	338	338	443	545	616	811	811	1064	1307	485	639	639	838	1029
2.5	S	166	120	182	158	194	166	120	182	158	194	208	150	228	197	242
2.5	D	131	173	173	227	279	315	415	415	545	669	248	327	327	429	527
3.0	S	115	84	127	109	135	115	84	127	109	135	144	104	158	137	168
3.0	D	76	100	100	131	161	183	240	240	315	387	144	189	189	248	305
3.5	S	85	61	93	80	99	85	61	93	80	99	106	77	116	101	124
3.5	D	48	63	63	83	102	115	151	151	198	244	91	119	119	156	192
4.0	S	65	47	71	62	76	65	47	71	62	76	81	59	89	77	95
4.0	D	32	42	42	55	68	77	101	101	133	163	61	80	80	105	129
4.5	S	51	37	56	49	60	51	37	56	49	60	64	46	70	61	75
4.5	D	23	30	30	39	48	54	71	71	93	115	43	56	56	74	90
5.0	S	42	30	46	39	48	42	30	46	39	48	52	38	57	49	61
5.0	D	16	22	22	28	35	39	52	52	68	84	31	41	41	54	66
5.5	S	34	25	38	33	40	34	25	38	33	40	43	31	47	41	50
5.5	D	12	16	16	21	26	30	39	39	51	63	23	31	31	40	49
6.0	S		21	32	27	34	29	21	32	27	34	36	26	40	34	42
6.0	D		13	13	16	20	23	30	30	39	48	18	24	24	31	38
6.5	S				23	29	25	18	27	23	29	31	22	34	29	36
6.5	D				13	16	18	24	24	31	38	14	19	19	24	30
7.0	S				20	25	21	15	23	20	25	26	19	29	25	31
7.0	D				10	13	14	19	19	25	30	11	15	15	20	24
7.5	S					22	18	13	20	18	22		17	25	22	27
7.5	D					10	12	15	15	20	25		12	12	16	20
8.0	S							12	18	15	19				19	24
8.0	D							13	13	17	20				13	16

*Y.S. = Yield Strength

1. Based on ASTM A 653 structural steel.
2. Values in row "S" are based on strength.
3. Values in row "D" are based on deflection of 1/180th span.
4. Web crippling not included in strength calculation. See example.
5. Limit States Design principles were used in accordance with CSA Standard S136-12.



SECTION PROPERTIES Per Metre of Width									
Base Steel Thickness (mm)	Mass [Z275] (kg/m ²)	Yield Stress (MPa)	Section Modulus		Deflection Moment of Inertia (x10 ⁶ mm ⁴)	Specified Web Crippling Data			
			Midspan (x10 ³ mm ³)	Support (x10 ³ mm ³)		Pe1 End (kN)	Pe2 End (kN)	Pi1 Interior (kN)	Pi1 Interior (kN)
0.343	3.61	550	2.17	2.17	0.0241				
0.457	4.72	230	2.86	2.86	0.0317				
0.457	4.72	345	2.86	2.86	0.0317				
0.610	6.21	230	3.75	3.75	0.0416				
0.762	7.69	230	4.60	4.60	0.0512				

LLF = 1.40; IMPF = 0.75; NORMAL OCCUPANCY = 1.0

LOAD TABLE Maximum Uniformly Distributed Specified Loads (kPa).																
Span Length (m)		1-Span Base Steel Thickness (mm)					2-Span Base Steel Thickness (mm)					3-Span Base Steel Thickness (mm)				
		0.343	0.457	0.457	0.610	0.762	0.343	0.457	0.457	0.610	0.762	0.343	0.457	0.457	0.610	0.762
Y.S.* (MPa)		550	230	345	230	230	550	230	345	230	230	550	230	345	230	230
1.0	S	4.60	3.38	5.07	4.43	5.45	4.60	3.38	5.07	4.43	5.45	5.75	4.22	6.34	5.54	6.81
1.0	D	2.78	3.67	3.67	4.81	5.91	6.68	8.80	8.80	11.5	14.2	5.26	6.93	6.93	9.09	11.2
1.2	S	3.20	2.35	3.52	3.08	3.78	3.20	2.35	3.52	3.08	3.78	4.00	2.93	4.40	3.85	4.73
1.2	D	1.61	2.12	2.12	2.78	3.42	3.87	5.09	5.09	6.68	8.21	3.05	4.01	4.01	5.26	6.46
1.4	S	2.35	1.72	2.59	2.26	2.78	2.35	1.72	2.59	2.26	2.78	2.94	2.16	3.23	2.83	3.47
1.4	D	1.01	1.34	1.34	1.75	2.15	2.44	3.21	3.21	4.20	5.17	1.92	2.53	2.53	3.31	4.07
1.6	S	1.80	1.32	1.98	1.73	2.13	1.80	1.32	1.98	1.73	2.13	2.25	1.65	2.48	2.16	2.66
1.6	D	0.68	0.90	0.90	1.17	1.44	1.63	2.15	2.15	2.82	3.46	1.28	1.69	1.69	2.22	2.73
1.8	S		1.04	1.56	1.37	1.68	1.42	1.04	1.56	1.37	1.68	1.78	1.30	1.96	1.71	2.10
1.8	D		0.63	0.63	0.82	1.01	1.15	1.51	1.51	1.98	2.43	0.90	1.19	1.19	1.56	1.91
2.0	S				1.11	1.36	1.15	0.84	1.27	1.11	1.36	1.44	1.06	1.58	1.38	1.70
2.0	D				0.60	0.74	0.84	1.10	1.10	1.44	1.77	0.66	0.87	0.87	1.14	1.40
2.2	S					1.13	0.95	0.70	1.05	0.92	1.13		0.87	1.31	1.14	1.41
2.2	D					0.55	0.63	0.83	0.83	1.08	1.33		0.65	0.65	0.85	1.05
2.4	S							0.59	0.88	0.77	0.95		0.73	1.10	0.96	1.18
2.4	D							0.64	0.64	0.83	1.03		0.50	0.50	0.66	0.81
2.6	S								0.75	0.66	0.81				0.82	1.01
2.6	D								0.50	0.66	0.81				0.52	0.64
2.8	S									0.57	0.69					0.87
2.8	D									0.53	0.65					0.51

*Y.S. = Yield Strength