

ALUMINUM DATA SHEET

Section Properties (per meter of coverage width)											
Thickness	Weight	Area		Top in Compression			Bottom in Compression				Shear
mm	Kg/m ²	cm ²	1xcm ⁴	5x top cm ³	5x bottom cm ³	Ma KN-m	1x cm ⁴	5x top cm ³	5x bottom cm ³	Ma KN-m	Va KN
0.50	1.65	6.90	8.85	3.60	8.24	0.39	8.25	4.66	4.68	0.50	5.10
0.60	1.98	7.31	11.68	4.95	9.90	0.53	10.25	5.64	5.64	0.61	8.80
0.70	2.31	8.53	14.56	6.36	11.59	0.69	12.30	6.62	6.62	0.71	12.81
0.80	2.65	9.75	17.12	7.56	13.28	0.81	14.41	7.61	7.61	0.82	14.88
0.90	2.98	10.97	19.71	8.79	14.95	0.95	16.57	8.59	8.59	0.93	16.64
1.00	3.31	12.19	11.29	10.02	16.62	1.08	18.77	9.57	9.57	1.03	18.38

Allowable Uniform Load Capacities (KN/m2)											
Thickness	No.s	Case	Span in Meters								
			1.00	1.25	1.50	1.75	2.00	2.25	2.50	2.75	3.00
0.50	Upto 2 spams	D+L	3.11	1.99	1.38	1.01	0.78	0.61	0.49	0.37	0.28
		Uplift	4.02	2.57	1.78	1.31	1.00	0.79	0.64	0.52	0.40
	3 or more spams	D+L	3.88	2.48	1.73	1.27	0.97	0.77	0.62	0.51	0.43
		Uplift	5.02	3.21	2.23	1.64	1.26	0.99	0.80	0.66	0.56
0.60	Upto 2 spams	D+L	4.26	2.73	1.90	1.39	1.07	0.84	0.65	0.49	0.38
		Uplift	4.86	3.11	2.16	1.59	1.22	0.96	0.78	0.64	0.49
	3 or more spams	D+L	5.33	3.41	2.37	1.74	1.33	1.05	0.85	0.70	0.59
		Uplift	6.08	3.89	2.70	1.99	1.52	1.20	0.97	0.80	0.68
0.70	Upto 2 spams	D+L	5A8	3.51	2.44	1.79	1.17	1.08	0.81	0.61	0.48
		Uplift	5.71	3.66	2.54	1.87	1.13	1.13	0.91	0.76	0.59
	3 or more spams	D+L	6.85	4.38	3.04	2.24	1.71	1.35	1.10	0.91	0.76
		Uplift	7.14	4.57	3.17	2.33	1.79	1.41	1.14	0.94	0.79
0.80	Upto 2 spams	D+L	6.51	4.17	2.89	2.13	1.63	1.29	0.95	0.71	0.55
		Uplift	6.56	4.20	2.92	2.14	1.64	1.30	1.05	0.87	0.69
	3 or more spams	D+L	8.14	5.21	3.62	2.66	2.04	1.61	1.30	1.08	0.90
		Uplift	8.20	5.25	3.64	2.68	2.05	1.62	1.31	1.08	0.91
0.90	Upto 2 spams	D+L	7.58	4.85	3.37	2.48	1.90	1.50	1.09	0.82	0.63
		Uplift	7.41	4.74	3.29	2.42	1.15	1.46	1.19	0.98	0.80
	3 or more spams	D+L	9.48	6.07	4.21	3.10	1.37	1.87	1.52	1.25	1.05
		Uplift	9.26	5.93	4.12	3.02	2.32	1.83	1.48	1.22	1.03
1.00	Upto 2 spams	D+L	8.63	5.52	3.84	2.82	2.16	1.70	1.24	0.93	0.72
		Uplift	8.26	5.28	3.67	2.70	2.06	1.63	1.32	1.09	0.91
	3 or more spams	D+L	10.79	6.91	4.80	3.52	2.70	2.13	1.73	1.43	1.20
		Uplift	10.32	6.60	4.59	3.37	2.58	2.04	1.65	1.36	1.15

Notes: 1. Design of Sheeting is based on equations of AISI -2001 (ASD - Allowable Stress design).

2. D+L = Dead + Live Load (Deflection Limitation: Span / 180)

3. Wind Uplift (Deflection Limitation : Span / 120)