



COLD FORMED C-SECTIONS

C3022.5

9.46 kg/m

Material: ASTM A653, Grade:50, EN-10147, S350, GD Z275, G90(Fy=350 N/mm2)

UNIFORMLY DISTRIBUTED LOADS(KN/m²), DUE TO DL+LL

**Total Uplift Loads,
DL+WL, KN**

Span L, m	Total Load KN	C-Purlin Center/Center Spacing, m												Allw. Defl. L/180, cm	No. of Anti-Sag Rods		
		1.0	1.2	1.4	1.5	1.6	1.8	2.0	2.2	2.4	2.5	2.8	3.0		0	1	2
5.0	46.16	9.23	7.69	6.59	6.15	5.77	5.13	4.62	4.20	3.85	3.69	3.30	3.08	2.78	30.70	-	-
5.5	41.96	7.63	6.36	5.45	5.09	4.77	4.24	3.81	3.47	3.18	3.05	2.72	2.54	3.06	27.90	-	-
6.0	38.47	6.41	5.34	4.58	4.27	4.01	3.56	3.21	2.91	2.67	2.56	2.29	2.14	3.33	-	25.58	-
6.5	35.51	5.46	4.55	3.90	3.64	3.41	3.03	2.73	2.48	2.28	2.19	1.95	1.82	3.61	-	23.61	-
7.0	32.97	4.71	3.93	3.36	3.14	2.94	2.62	2.36	2.14	1.96	1.88	1.68	1.57	3.89	-	21.93	-
7.5	30.77	4.10	3.42	2.93	2.74	2.56	2.28	2.05	1.86	1.71	1.64	1.47	1.37	4.17	-	20.46	-
8.0	28.85	3.61	3.01	2.58	2.40	2.25	2.00	1.80	1.64	1.50	1.44	1.29	1.20	4.44	-	19.18	-
8.5	27.15	3.19	2.66	2.28	2.13	2.00	1.77	1.60	1.45	1.33	1.28	1.14	1.06	4.72	-	-	18.06
9.0	25.64	2.85	2.37	2.04	1.90	1.78	1.58	1.42	1.30	1.19	1.14	1.02	0.95	5.00	-	-	17.05
9.5	24.29	2.56	2.13	1.83	1.70	1.60	1.42	1.28	1.16	1.07	1.02	0.91	0.85	5.28	-	-	16.16
10.0	23.08	2.31	1.92	1.65	1.54	1.44	1.28	1.15	1.05	0.96	0.92	0.82	0.77	5.56	-	-	15.35

C3023.0

11.30 kg/m

Material: ASTM A653, Grade:50, EN-10147, S350, GD Z275, G90(Fy=350 N/mm2)

UNIFORMLY DISTRIBUTED LOADS(KN/M²), DUE TO DL+LL

**Total Uplift Loads,
DL+WL, KN**

Span L m	Total Load KN	C-Purlin Center/Center Spacing, m												Allw. Defl. L/180, cm	No. of Anti-Sag Rods		
		1.0	1.2	1.4	1.5	1.6	1.8	2.0	2.2	2.4	2.5	2.8	3.0		0	1	2
5.0	58.63	11.73	9.77	8.38	7.82	7.33	6.51	5.86	5.33	4.89	4.69	4.19	3.91	2.78	38.99	-	-
5.5	53.30	9.69	8.08	6.92	6.46	6.06	5.38	4.85	4.40	4.04	3.88	3.46	3.23	3.06	35.44	-	-
6.0	48.86	8.14	6.79	5.82	5.43	5.09	4.52	4.07	3.70	3.39	3.26	2.91	2.71	3.33	-	32.49	-
6.5	45.10	6.94	5.78	4.96	4.63	4.34	3.85	3.47	3.15	2.89	2.78	2.48	2.31	3.61	-	29.99	-
7.0	41.88	5.98	4.99	4.27	3.99	3.74	3.32	2.99	2.72	2.49	2.39	2.14	1.99	3.89	-	27.85	-
7.5	39.09	5.21	4.34	3.72	3.47	3.26	2.90	2.61	2.37	2.17	2.08	1.86	1.74	4.17	-	25.99	-
8.0	36.64	4.58	3.82	3.27	3.05	2.86	2.54	2.29	2.08	1.91	1.83	1.64	1.53	4.44	-	24.37	-
8.5	34.49	4.06	3.38	2.90	2.70	2.54	2.25	2.03	1.84	1.69	1.62	1.45	1.35	4.72	-	-	22.93
9.0	32.57	3.62	3.02	2.59	2.41	2.26	2.01	1.81	1.65	1.51	1.45	1.29	1.21	5.00	-	-	21.66
9.5	30.86	3.25	2.71	2.32	2.17	2.03	1.80	1.62	1.48	1.35	1.30	1.16	1.08	5.28	-	-	20.52
10.0	29.31	2.93	2.44	2.09	1.95	1.83	1.63	1.47	1.33	1.22	1.17	1.05	0.98	5.56	-	-	19.49

BAGHLAF AL ZAFER METAL INDUSTRIES L.L.C

P. O. BOX: 21239, Industrial Area - 2, Sharjah, U. A. E.

Tel: +971-6-5326644, Fax: +971-6-5326611

Email: bazshj@emirates.net.ae, URL: <http://www.baz.co.ae>

Notes: 1. Design of C-Purlins is based on AISI-1999 (LRFD) or equi BS5950 P5.

15.03.10

2. These capacities are applicable for roof slopes of upto 3:10 only.

3. Capacities for uplift loads are increased by 33-1/3% as per AISI.

4. Sag rods shall be located at equal distances. 5. Check deflection as per actual loads.