

XBEAM. Span Table. #1



UNIFORMLY DISTRIBUTED DESIGN LOAD CAPACITY (KN/M) WITH SIMPLY SUPPORTED CONDITIONS + FULL LATERAL RESTRAINT.

Member	kg/m	Span in metres (m)																													
		0.5	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5	9.0	9.5	10.0	10.5	11.0	11.5	12.0	12.5	13.0	13.5	14.0	14.5	15.0
XB250.000	11.21	279	139	93.20	69.90	55.90	44.00	32.30	24.70	19.50	15.70	13.00	10.90	9.29	8.00	6.95	6.10	5.39	4.79	4.29	3.86	3.49	3.17	2.89	2.65	2.43	2.24	2.07	1.91	1.78	1.65
XB250.025	12.17	279	139	93.20	69.90	55.90	46.60	39.90	34.90	29.80	24.10	19.90	16.70	14.20	12.20	10.60	9.37	8.29	7.38	6.61	5.95	5.39	4.90	4.47	4.10	3.77	3.47	3.21	2.98	2.77	2.58
XB250.050	13.13	279	139	93.20	69.90	55.90	46.60	39.90	34.90	31.00	27.90	25.30	22.10	18.80	16.20	14.10	12.30	10.90	9.76	8.75	7.88	7.14	6.49	5.93	5.43	5.00	4.61	4.26	3.96	3.68	3.43
XB250.075	14.09	279	139	93.20	69.90	55.90	46.50	39.90	34.90	31.00	27.90	25.30	23.20	21.40	19.80	17.20	15.10	13.40	11.90	10.70	9.66	8.75	7.96	7.27	6.67	6.13	5.66	5.24	4.86	4.52	4.22
XB250.100	15.05	279	139	93.20	69.90	55.90	46.50	39.90	34.90	31.00	27.90	25.30	23.20	21.40	19.90	18.50	17.40	15.70	13.90	12.50	11.30	10.20	9.32	8.51	7.80	7.18	6.63	6.13	5.69	5.30	4.94
XB250.125	16.01	279	139	93.20	69.90	55.90	46.50	39.90	34.90	31.00	27.90	25.30	23.20	21.40	19.90	18.50	17.40	16.30	15.40	14.20	12.80	11.60	10.50	9.65	8.85	8.14	7.52	6.96	6.46	6.01	5.61
XB250.150	16.97	279	139	93.20	69.90	55.90	46.50	39.90	34.90	31.00	27.90	25.30	23.20	21.40	19.90	18.50	17.40	16.30	15.40	14.60	13.90	12.80	11.70	10.70	9.81	9.03	8.33	7.72	7.16	6.67	6.22
XB400.000	15.28	479	239	159	119	95.90	79.90	62.80	48.10	37.90	30.70	25.30	21.30	18.10	15.60	13.50	11.90	10.50	9.38	8.40	7.57	6.85	6.23	5.68	5.21	4.79	4.41	4.08	3.78	3.52	3.28
XB400.025	16.24	479	239	159	119	95.90	79.90	68.40	59.90	53.20	43.90	36.20	30.40	25.90	22.30	19.40	17.00	15.10	13.40	12.00	10.80	9.84	8.95	8.17	7.49	6.89	6.36	5.89	5.46	5.08	4.74
XB400.050	17.20	479	239	159	119	95.90	79.90	68.40	59.90	53.20	47.90	43.50	39.00	33.20	28.60	24.90	21.90	19.30	17.20	15.40	13.90	12.60	11.50	10.50	9.64	8.87	8.19	7.58	7.04	6.55	6.11
XB400.075	18.16	479	239	159	119	95.90	79.90	68.40	59.90	53.20	47.90	43.50	39.90	36.80	34.10	30.10	26.40	23.40	20.80	18.70	16.80	15.20	13.90	12.70	11.60	10.70	9.90	9.17	8.51	7.93	7.39
XB400.100	19.12	479	239	159	119	95.90	79.90	68.40	59.90	53.20	47.90	43.50	39.90	36.80	34.10	31.90	29.90	27.20	24.20	21.70	19.60	17.70	16.10	14.70	13.50	12.40	11.50	10.60	9.91	9.22	8.61
XB400.125	20.08	479	239	159	119	95.90	79.90	68.40	59.90	53.20	47.90	43.50	39.90	36.80	34.10	31.90	29.90	28.10	26.50	24.60	22.10	20.10	18.20	16.70	15.30	14.10	13.00	12.00	11.20	10.40	9.74
XB400.150	21.04	479	239	159	119	95.80	79.80	68.40	59.80	53.20	47.80	43.50	39.80	36.80	34.10	31.80	29.80	28.10	26.50	25.10	23.80	22.20	20.20	18.50	17.00	15.60	14.40	13.40	12.40	11.50	10.80
XB550.000	19.35	719	359	239	179	143	119	102	79.89	63.09	51.06	42.17	35.40	30.14	25.96	22.59	19.83	17.54	15.63	14.01	12.62	11.43	10.40	9.50	8.71	8.01	7.39	6.84	6.35	5.90	5.50
XB550.025	20.31	719	359	239	179	143	119	102	89.90	79.90	68.92	56.92	47.80	40.70	35.06	30.52	26.80	23.72	21.13	18.95	17.08	15.47	14.08	12.87	11.80	10.86	10.03	9.28	8.62	8.02	7.48
XB550.050	21.27	719	359	239	179	143	119	102	89.80	79.80	71.80	65.30	59.54	50.70	43.69	38.03	33.40	29.56	26.35	23.62	21.30	19.30	17.57	16.06	14.73	13.56	12.52	11.59	10.77	10.02	9.35
XB550.075	22.23	719	359	239	179	143	119	102	89.80	79.80	71.80	65.30	59.80	55.20	51.30	45.16	39.66	35.11	31.29	28.06	25.31	22.93	20.88	19.08	17.51	16.12	14.89	13.79	12.80	11.92	11.13
XB550.100	23.19	719	359	239	179	143	119	102	89.80	79.80	71.80	65.30	59.80	55.20	51.30	47.80	44.80	40.38	35.99	32.28	29.11	26.38	24.02	21.95	20.14	18.55	17.13	15.87	14.74	13.73	12.81
XB550.125	24.15	719	359	239	179	143	119	102	89.80	79.80	71.80	65.30	59.80	55.20	51.30	47.80	44.80	42.20	39.80	36.28	32.72	29.65	27.00	24.68	22.65	20.85	19.26	17.84	16.58	15.44	14.41
XB550.150	25.11	719	359	239	179	143	119	102	89.80	79.80	71.80	65.30	59.80	55.20	51.30	47.80	44.80	42.20	39.80	37.70	35.80	32.76	29.82	27.27	25.02	23.04	21.28	19.72	18.32	17.06	15.93

*Bold line indicates difference between shear and bending failure mode.

XBEAM. Span Table. #2



UNIFORMLY DISTRIBUTED DESIGN LOAD CAPACITY(KN/M) FOR L/250 DEFLECTION. SIMPLY SUPPORTED CONDITIONS + FULL LATERAL RESTRAINT.

Member	kg/m	Span in metres (m)																											
		2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5	9.0	9.5	10.0	10.5	11.0	11.5	12.0	12.5	13.0	13.5	14.0	14.5	15.0		
XB250.000	11.21	41.68	24.12	15.19	10.18	7.15	5.21	3.91	3.02	2.37	1.90	1.54	1.27	1.06	0.89	0.76	0.65	0.58	0.49	0.43	0.38	0.33	0.30	0.26	0.24	0.21	0.19		
XB250.025	12.17		37.77	23.79	15.94	11.19	8.16	6.13	4.72	3.71	2.97	2.42	1.99	1.66	1.40	1.19	1.02	0.88	0.77	0.67	0.59	0.52	0.46	0.41	0.37	0.33	0.30		
XB250.050	13.13			32.10	21.50	15.10	11.01	8.27	6.37	5.01	4.01	3.26	2.69	2.24	1.89	1.61	1.38	1.19	1.03	0.90	0.80	0.70	0.63	0.56	0.50	0.45	0.41		
XB250.075	14.09				26.83	18.84	13.74	10.32	7.95	6.25	5.01	4.07	3.35	2.80	2.36	2.00	1.72	1.48	1.29	1.13	0.99	0.88	0.78	0.70	0.63	0.56	0.51		
XB250.100	15.05					31.92	22.42	16.34	12.28	9.46	7.44	5.96	4.84	3.99	3.33	2.80	2.38	2.04	1.76	1.53	1.34	1.18	1.05	0.93	0.83	0.74	0.67	0.61	
XB250.125	16.01						25.86	18.85	14.16	10.91	8.58	6.87	5.59	4.60	3.84	3.23	2.75	2.36	2.04	1.77	1.55	1.36	1.21	1.07	0.96	0.86	0.77	0.70	
XB250.150	16.97							29.13	21.23	15.95	12.29	9.66	7.74	6.29	5.18	4.32	3.64	3.10	2.65	2.29	1.99	1.75	1.54	1.36	1.21	1.08	0.97	0.87	0.79
XB400.000	15.28		78.51	49.44	33.12	23.26	16.96	12.74	9.81	7.72	6.18	5.02	4.14	3.45	2.91	2.47	2.12	1.83	1.59	1.39	1.23	1.09	0.96	0.86	0.77	0.70	0.63		
XB400.025	16.24			48.48	34.05	24.82	18.85	14.36	11.30	9.05	7.35	6.06	5.05	4.26	3.62	3.10	2.68	2.33	2.04	1.80	1.59	1.41	1.26	1.13	1.02	0.92			
XB400.050	17.20				44.50	32.44	24.37	18.77	14.77	11.82	9.61	7.92	6.60	5.56	4.73	4.06	3.50	3.05	2.67	2.35	2.08	1.85	1.65	1.48	1.33	1.20			
XB400.075	18.16					39.81	29.91	23.04	18.12	14.51	11.80	9.72	8.10	6.83	5.80	4.98	4.30	3.74	3.27	2.88	2.55	2.27	2.02	1.81	1.63	1.47			
XB400.100	19.12						46.94	35.27	27.16	21.37	17.11	13.91	11.46	9.55	8.05	6.84	5.87	5.07	4.41	3.86	3.40	3.00	2.67	2.38	2.14	1.92	1.74		
XB400.125	20.08							40.82	31.29	24.61	19.70	16.02	13.20	11.00	9.27	7.88	6.76	5.84	5.08	4.44	3.91	3.46	3.08	2.75	2.46	2.22	2.00		
XB400.150	21.04								35.27	27.74	22.21	18.06	14.88	12.41	10.45	8.89	7.62	6.58	5.72	5.01	4.41	3.90	3.47	3.10	2.78	2.50	2.26		
XB550.000	19.35			75.84	53.26	38.83	29.17	22.47	17.67	14.15	11.51	9.48	7.90	6.66	5.66	4.85	4.19	3.65	3.19	2.81	2.49	2.21	1.97	1.77	1.59	1.44			
XB550.025	20.31				73.83	53.82	40.44	31.15	24.50	19.61	15.95	13.14	10.95	9.23	7.85	6.73	5.81	5.05	4.42	3.89	3.44	3.06	2.73	2.45	2.21	1.99			
XB550.050	21.27					68.57	51.52	39.68	31.21	24.99	20.32	16.74	13.96	11.76	10.00	8.57	7.40	6.44	5.64	4.96	4.39	3.90	3.48	3.12	2.81	2.54			
XB550.075	22.23						62.22	47.93	37.70	30.18	24.54	20.22	16.86	14.20	12.07	10.35	8.94	7.78	6.81	5.99	5.30	4.71	4.21	3.77	3.40	3.07			
XB550.100	23.19							56.18	44.19	35.38	28.76	23.70	19.76	16.65	14.15	12.13	10.48	9.12	7.98	7.02	6.21	5.52	4.93	4.42	3.98	3.60			
XB550.125	24.15								50.45	40.39	32.84	27.06	22.56	19.01	16.16	13.85	11.97	10.41	9.11	8.02	7.09	6.31	5.63	5.05	4.54	4.11			
XB550.150	25.11									45.41	36.92	30.42	25.36	21.36	18.17	15.58	13.45	11.70	10.24	9.01	7.97	7.09	6.33	5.68	5.11	4.61			

*Values under bold line do not reach deflection limit prior to shear/bending failure.

XBEAM.

Span Table. #3



UNIFORMLY DISTRIBUTED DESIGN LOAD CAPACITY(KN/M) FOR L/300 DEFLECTION. SIMPLY SUPPORTED CONDITIONS + FULL LATERAL RESTRAINT.

Member	kg/m	Span in metres (m)																									
		2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5	9.0	9.5	10.0	10.5	11.0	11.5	12.0	12.5	13.0	13.5	14.0	14.5	15.0
XB250.000	11.21	34.7	20.1	12.7	8.48	5.96	4.34	3.26	2.51	1.98	1.58	1.29	1.06	0.884	0.744	0.633	1.543	0.469	0.408	0.357	0.314	0.278	0.247	0.221	0.198	0.178	0.161
XB250.025	12.17	54.4	31.5	19.8	13.3	9.33	6.80	5.11	3.93	3.09	2.48	2.01	1.66	1.38	1.17	0.991	0.850	0.734	0.639	0.559	0.492	0.435	2.387	0.345	0.310	0.279	0.252
XB250.050	13.13		42.5	26.7	17.9	12.6	9.18	6.89	5.31	4.18	3.34	2.72	2.24	1.87	1.57	1.34	1.15	0.991	0.862	0.754	0.664	0.587	0.522	0.466	0.418	0.376	0.340
XB250.075	14.09			33.4	22.4	15.7	11.4	8.60	6.63	5.21	4.17	3.39	2.80	2.33	1.96	1.67	1.43	1.24	1.08	0.941	0.828	0.733	0.654	0.582	0.522	0.469	0.424
XB250.100	15.05			39.7	26.6	18.7	13.6	10.2	7.88	6.20	4.96	4.04	3.33	2.77	2.34	1.99	1.70	1.47	1.28	1.12	0.985	0.872	0.775	0.692	0.620	0.558	0.504
XB250.125	16.01				30.7	21.5	15.7	11.8	9.09	7.15	5.72	4.65	3.84	3.20	2.69	2.29	1.96	1.70	1.48	1.29	1.14	1.01	0.894	0.798	0.716	0.644	0.582
XB250.150	16.97				34.6	24.3	17.7	13.3	10.2	8.05	6.45	5.24	4.32	3.60	3.03	2.58	2.21	1.91	1.66	1.45	1.28	1.13	1.01	0.899	0.806	0.726	0.655
XB400.000	15.28		65.4	41.2	27.6	19.4	14.1	10.6	8.18	6.43	5.15	4.19	3.45	2.88	2.42	2.06	1.77	1.53	1.33	1.16	1.02	0.904	0.804	0.718	0.644	0.579	0.523
XB400.025	16.24			60.3	40.4	28.4	20.7	15.5	12.0	9.42	7.54	6.13	5.05	4.21	3.55	3.02	2.59	2.23	1.94	1.70	1.50	1.32	1.18	1.05	0.942	0.848	0.766
XB400.050	17.20				52.8	37.1	27.0	20.3	15.6	12.3	9.85	8.01	6.60	5.50	4.64	3.94	3.38	2.92	2.54	2.22	1.96	1.73	1.54	1.37	1.23	1.11	1.00
XB400.075	18.16					45.5	33.2	24.9	19.2	15.1	12.1	9.83	8.10	6.75	5.69	4.84	4.15	3.58	3.12	2.73	2.40	2.12	1.89	1.69	1.51	1.36	1.23
XB400.100	19.12						39.1	29.4	22.6	17.8	14.3	11.6	9.55	7.96	6.71	5.70	4.89	4.22	3.67	3.21	2.83	2.50	2.23	1.99	1.78	1.60	1.45
XB400.125	20.08						45.1	33.9	26.1	20.5	16.4	13.3	11.0	9.17	7.73	6.57	5.63	4.87	4.23	3.70	3.26	2.88	2.56	2.29	2.05	1.85	1.67
XB400.150	21.04							38.2	29.4	23.1	18.5	15.0	12.4	10.3	8.71	7.40	6.35	5.48	4.77	4.17	3.67	3.25	2.89	2.58	2.31	2.08	1.88
XB550.000	19.35			94.3	63.2	44.4	32.4	24.3	18.7	14.7	11.8	9.59	7.90	6.59	5.55	4.72	4.04	3.49	3.04	2.66	2.34	2.07	1.84	1.64	1.47	1.33	1.20
XB550.025	20.31				87.6	61.5	44.9	33.7	26.0	20.4	16.3	13.3	11.0	9.13	7.69	6.54	5.61	4.84	4.21	3.69	3.24	2.87	2.55	2.28	2.04	1.84	1.66
XB550.050	21.27					78.4	57.1	42.9	33.1	26.0	20.8	16.9	14.0	11.6	9.80	8.33	7.14	6.17	5.37	4.70	4.13	3.66	3.25	2.90	2.60	2.34	2.12
XB550.075	22.23						69.0	51.9	39.9	31.4	25.2	20.4	16.9	14.0	11.8	10.1	8.63	7.45	6.48	5.67	4.99	4.42	3.93	3.51	3.14	2.83	2.56
XB550.100	23.19							60.8	48.8	36.8	29.5	24.0	19.8	16.5	13.9	11.8	10.1	8.74	7.60	6.65	5.85	5.18	4.60	4.11	3.69	3.32	3.00
XB550.125	24.15								53.5	42.0	33.7	27.4	22.6	18.8	15.8	13.5	11.5	9.97	8.67	7.59	6.68	5.91	5.26	4.69	4.21	3.79	3.42
XB550.150	25.11									47.3	37.8	30.8	25.4	21.1	17.8	15.1	13.0	11.2	9.75	8.53	7.51	6.65	5.91	5.28	4.73	4.26	3.85

*Values under bold line do not reach deflection limit prior to shear/bending failure.

XBEAM.

Span Table. #4



DESIGN MOMENT CAPACITY (KN/M) WITHOUT LATERAL RESTRAINT.

Member	kg/m	φM	Effective unbraced length in metres (m)														
			0.5	1.0	1.5	2.0	2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5
XB250.000	11.21	49.69	46.31	42.92	39.53	36.13	32.74	29.35	21.48	16.45	13.00	10.53	8.70	7.31	6.23	5.37	4.68
XB250.025	12.17	75.98	71.19	66.42	61.65	56.88	52.12	47.35	38.83	29.73	23.49	19.03	15.73	13.21	11.26	9.71	8.46
XB250.050	13.13	100.20	94.16	88.21	82.27	76.32	70.37	64.43	57.16	43.76	34.58	28.01	23.15	19.45	16.57	14.29	12.45
XB250.075	14.09	122.58	115.40	108.43	101.46	94.49	87.52	80.55	73.58	58.16	45.95	37.22	30.76	25.85	22.03	18.99	16.54
XB250.100	15.05	143.23	135.00	127.13	119.26	111.39	103.52	95.65	87.78	72.80	57.37	46.47	38.40	32.27	27.50	23.71	20.65
XB250.125	16.01	162.24	153.06	144.39	135.73	127.06	118.40	109.74	101.07	86.89	68.66	55.61	45.96	38.62	32.91	28.37	24.72
XB250.150	16.97	179.69	169.62	160.26	150.90	141.54	132.18	122.81	113.45	100.89	79.72	64.57	53.36	44.84	38.21	32.94	28.70
XB400.000	15.28	96.53	88.92	81.52	74.12	66.71	59.31	44.71	32.85	25.15	19.87	16.09	13.30	11.18	9.52	8.21	7.15
XB400.025	16.24	137.84	127.84	118.21	108.59	98.96	89.34	76.87	56.48	43.24	34.17	27.67	22.87	19.22	16.38	14.12	12.30
XB400.050	17.20	176.62	164.50	152.98	141.46	129.94	118.42	106.90	82.77	63.37	50.07	40.56	33.52	28.16	24.00	20.69	18.02
XB400.075	18.16	213.10	199.06	185.87	172.68	159.50	146.31	133.12	110.75	84.79	67.00	54.27	44.85	37.69	32.11	27.69	24.12
XB400.100	19.12	247.44	231.61	216.94	202.27	187.60	172.93	158.25	139.79	107.03	84.57	68.50	56.61	47.57	40.53	34.95	30.44
XB400.125	20.08	279.75	262.24	246.24	230.24	214.23	198.23	182.23	166.23	129.73	102.50	83.03	68.62	57.66	49.13	42.36	36.90
XB400.150	21.04	310.09	291.02	273.82	256.62	239.42	222.22	205.03	187.83	152.65	120.62	97.70	80.74	67.85	57.81	49.85	43.42
XB550.000	19.35	160.16	146.29	132.97	119.64	106.32	90.46	62.82	46.15	35.34	27.92	22.62	18.69	15.71	13.38	11.54	10.05
XB550.025	20.31	215.99	198.82	182.53	166.24	149.96	133.67	102.87	75.58	57.86	45.72	37.03	30.61	25.72	21.91	18.89	16.46
XB550.050	21.27	268.87	248.75	229.91	211.07	192.22	173.38	147.94	108.69	83.21	65.75	53.26	44.01	36.98	31.51	27.17	23.67
XB550.075	22.23	319.05	296.24	275.13	254.02	232.91	211.80	190.69	144.46	110.60	87.39	70.79	58.50	49.16	41.89	36.12	31.46
XB550.100	23.19	366.70	341.36	318.22	295.08	271.94	248.80	225.66	182.16	139.47	110.20	89.26	73.77	61.99	52.82	45.54	39.67
XB550.125	24.15	411.92	384.22	359.24	334.27	309.29	284.32	259.34	221.24	169.39	133.84	108.41	89.59	75.28	64.15	55.31	48.18
XB550.150	25.11	454.82	424.88	398.24	371.60	344.96	318.32	291.69	261.28	200.04	158.06	128.03	105.81	88.91	75.76	65.32	56.90