

12" Light Cross Section Elematic Hollow Core Plank

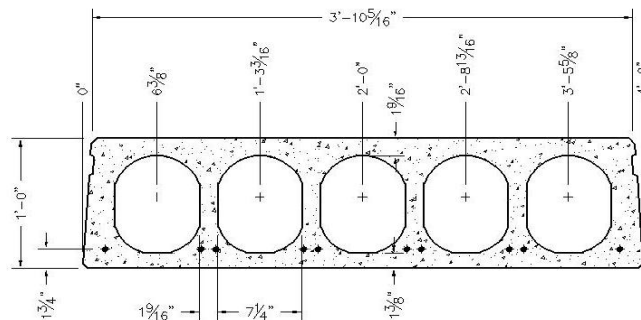
Load Table Maximum Uniformly Distributed Load (psf)

Strand Pattern	Strand Area(in ²)	Clear Span (Feet)											
		30	32	34	36	38	40	42	44	46	48	50	52
12S108-1.75	1.530	302	280	245	213	185	160	138	119	102	87	74	63
12S88-1.75	1.224	261	223	191	164	141	121	105	89	74	62	-	-
12S68-1.75	0.918	187	158	133	112	95	80	67	-	-	-	-	-
12S48-1.75	0.612	110	89	72	58	-	-	-	-	-	-	-	-

Estimated Camber at Time of Erection (inches)

Strand Pattern	Strand Area(in ²)	Clear Span (Feet)											
		30	32	34	36	38	40	42	44	46	48	50	52
12S108-1.75	1.530	1.01	1.07	1.12	1.15	1.16	1.14	1.08	1.00	0.87	0.69	0.46	0.18
12S88-1.75	1.224	0.71	0.73	0.74	0.72	0.68	0.61	0.50	0.36	0.17	-0.07	-	-
12S68-1.75	0.918	0.41	0.40	0.36	0.30	0.21	0.08	-0.08	-	-	-	-	-
12S48-1.75	0.612	0.12	0.06	-0.02	-0.13	-	-	-	-	-	-	-	-

$A_c = 281.2 \text{ in}^2$
 $b_w = 10.875 \text{ in}$
 $I_g = 5196 \text{ in}^4$
 $y_b = 6.09 \text{ in}$
 $w_t = 73 \text{ psf}$
 $f'_{ci} = 5000 \text{ psi}$
 $f'_c = 7000 \text{ psi}$
 $f_{pu} = 270 \text{ ksi}$



Notes:

1. Tabulated safe uniform distributed loads in this table are based on ACI 318-02/318R-02.
2. All calculated loads are considered as superimposed live load based on 1.2DL + 1.6LL.
3. Topping weight is not included in tabulated values. Size and location of openings may effect table capacity.
4. All prestressing strand is stressed to 70% of f_{pu} .
5. Tabulated loads in the shaded region have live load deflections greater than $L/360$.
6. Plank is 1 hour fire rated per IBC 2003. For higher ratings please contact KP.
7. For longer spans or conditions not covered by this table please contact KP.

Issue date: 8/10/07