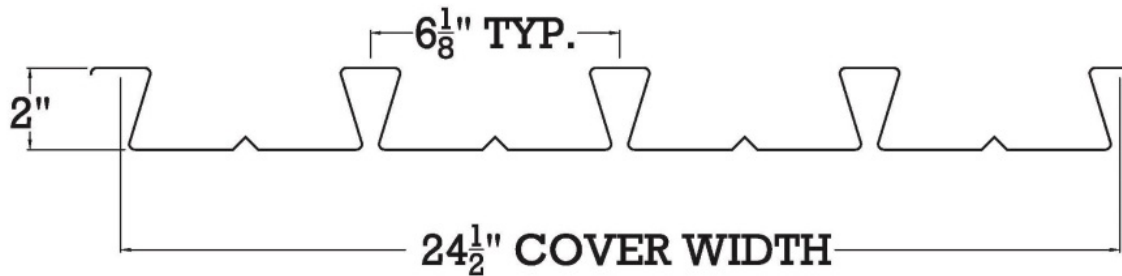


MARCORE-SR COMPOSITE DECK-22 GAUGE

(WITH STIFFENER RIBS)



SECTION PROPERTIES OF STEEL DECK

Fy=50 ksi

THICKNESS	in.	0.0295
WEIGHT	psf	2.3
AREA	in ²	0.68
MOMENT OF INERTIA (I _p)	in ⁴ /ft	0.40
MOMENT OF INERTIA (I _N)	in ⁴ /ft	0.35
SECTION MODULUS (S _p)	in ³ /ft	0.28
SECTION MODULUS (S _N)	in ³ /ft	0.29
MOMENT CAPACITY (M _p)	lb-in/ft	8530
MOMENT CAPACITY (M _N)	lb-in/ft	8797

GENERAL INFORMATION

CONCRETE THICKNESS	in	2.0	2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0
COMPOSITE DECK THICKNESS	in	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
CONCRETE - 145 lb. NWC	psf	44.3	50.3	56.3	62.2	68.5	74.5	80.4	86.4	91.4
SECTION MODULUS (S _p)	in ³ /ft	1.6	1.8	2.1	2.4	2.7	3.0	3.3	3.6	3.9
EFFECTIVE AREA (A)	in ²	38.0	42.8	47.5	52.3	57.0	61.8	66.5	71.3	76.0
AVG/ MOMENT OF INERTIA (I _{av})	in ⁴ /ft	6.2	8.6	11.5	14.9	19.0	23.7	29.2	35.4	42.4
TEMP. REINFORC. W.W. F. 6"X6"		w1.4xw1.4	w1.4xw1.4	w1.4xw1.4	w2xw2	w2xw2	w2.9xw2.9	w2.9xw2.9	w2.9xw2.9	w2.9xw2.9

SHORING RECOMONDATION

Span	Composite Slab Thickness, in.	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
MARCORE-SR										
Single	22 ga.	ft.	7.25	7.00	6.75	6.50	6.50	6.25	6.00	5.75
Double	22 ga.	ft.	8.25	7.75	7.50	7.25	7.00	6.75	6.50	6.25

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF.

MARCORE-SR COMPOSITE DECK-22 GAUGE

(WITH STIFFENER RIBS)

SUPERIMPOSED LIVE LOAD ON COMPOSITE DECK SIMPLE SPAN

22 GAUGE

COMPOSITE DECK THICKNESS	in.	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5
	MAXIMUM WORKING ALLOWABLE UNIFORM LIVE LOAD LL, LB/FT ²										
SPAN											
9	ft.	311	400	400	400	400	400	400	400	400	400
10	ft.	214	316	400	400	400	400	400	400	400	400
11	ft.	149	224	369	392	400	400	400	400	400	400
12	ft.	104	161	272	317	359	396	400	400	400	400
13	ft.	72	115	201	236	298	329	360	391	400	400
14	ft.	48	81	148	176	238	275	302	328	355	380
15	ft.	30	56	109	131	180	232	255	277	300	321
16	ft.	17	37	79	96	136	183	216	235	255	273
17	ft.		22	55	69	101	139	184	201	218	233
18	ft.		10	37	48	74	105	142	172	187	200
19	ft.			22	31	52	78	108	144	160	172
20	ft.			10	18	35	56	81	111	138	147
21	ft.					20	38	59	83	113	127
22	ft.						23	40	61	86	109
23	ft.						10	25	42	63	86
24	ft.							12	26	45	63
25	ft.								13	29	44
26	ft.									15	28
27											14

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF.

MARCORE-SR COMPOSITE DECK-22 GAUGE

(WITH STIFFENER RIBS)

SUPERIMPOSED LIVE LOAD ON COMPOSITE DECK DOUBLE & TRIPLE SPAN 22 GAUGE

COMPOSITE DECK THICKNESS	in	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5
MAXIMUM WORKING ALLOWABLE UNIFORM LIVE LOAD LL, LB/FT^2									
SPAN									
16	ft.	197	209	233	258	283	307	333	356
17	ft.	160	180	201	222	243	265	287	307
18	ft.	125	149	173	192	210	229	248	265
19	ft.	97	117	150	166	182	198	215	230
20	ft.	74	91	129	144	158	173	187	201
21	ft.	56	70	101	125	138	150	163	175
22	ft.	40	52	79	109	120	131	143	153
23	ft.	27	37	60	88	105	114	124	133
24	ft.	17	25	44	68	91	99	109	116
25	ft.		15	31	51	76	86	94	101
26	ft.			20	37	58	75	82	88
27	ft.			10	25	43	64	71	76
28	ft.				14	30	48	61	65
29	ft.					18	34	52	55
30	ft.						22	40	47
31	ft.						12	27	39
32	ft.							16	30
33	ft.								18

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF

MARCORE-SR COMPOSITE DECK-22 GAUGE

(WITH STIFFENER RIBS)

TWO SPAN COMPOSITE DECK 22 GAUGE

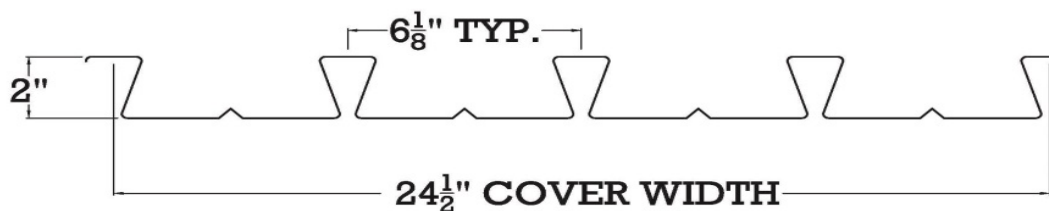
2 SPAN CONDITION REINFORCING OVER INTERMEDIATE SUPPORT

	COMPOSITE SLAB THICKNESS														
	4.0"			4.5"			5.0"			5.5"			6.0"		
	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100
SPAN															
13'-0"	#4@9	#4@8	#5@8	#4@9	#4@8	#5@9	#4@10	#4@9	#5@11	#4@11	#4@10	#4@7	#4@12	#4@11	#4@8
13'-6"	#4@8	#5@11	#5@7	#4@8	#4@7	#5@9	#4@9	#4@8	#5@10	#4@10	#4@9	#4@7	#4@11	#4@10	#4@7
14'-0"	#4@7	#5@10	#5@7	#4@8	#5@11	#5@8	#4@8	#4@8	#5@9	#4@9	#4@8	#5@10	#4@10	#4@9	#4@7
14'-6"	#5@10	#5@9	#5@6	#4@7	#5@10	#5@7	#4@8	#4@7	#5@8	#4@8	#4@8	#5@9	#4@9	#4@8	#5@10
15'-0"	#5@10	#5@8	#5@6	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8	#4@8	#4@7	#5@9	#4@8	#4@8	#5@10
15'-6"	#5@9	#5@8	#5@5	#5@9	#5@8	#5@6	#5@11	#5@10	#5@7	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9
16'-0"	#5@8	#5@7		#5@9	#5@8	#5@5	#5@10	#5@9	#5@7	#5@11	#5@10	#5@7	#4@7	#5@11	#5@8
16'-6"	#5@7	#5@6		#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8
17'-0"	#5@7	#5@6		#5@7	#5@7		#5@8	#5@8	#5@5	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7
17'-6"	#5@6			#5@7	#5@6		#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@9	#5@9	#5@7
18'-0"				#5@7	#5@5		#5@7	#5@7		#5@8	#5@7	#5@5	#5@9	#5@8	#5@5
18'-6"				#5@6	#5@5		#5@7	#5@6		#5@8	#5@7	#5@5	#5@8	#5@7	#5@5
19'-0"				#5@5			#5@6	#5@5		#5@7	#5@7		#5@8	#5@7	
19'-6"							#5@6	#5@5		#5@7	#5@6		#5@7	#5@7	
20'-0"							#5@5	#5@5		#5@6	#5@5		#5@7	#5@6	
20'-6"							#5@5			#5@6	#5@5		#5@7	#5@6	
21'-0"										#5@5	#5@5		#5@6	#5@5	
21'-6"										#5@5			#5@6	#5@5	
22'-0"										#5@5			#5@5	#5@5	
22'-6"													#5@5		
23'-0"													#5@5		
23'-6"															
24'-0"															

	COMPOSITE SLAB THICKNESS											
	6.5"			7.0"			7.5"			8.0"		
	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100
SPAN												
13'-0"	#4@12	#4@11	#4@9	#4@13	#4@12	#4@10	#4@14	#4@13	#4@10	#4@15	#4@14	#4@11
13'-6"	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9	#4@14	#4@13	#4@10
14'-0"	#4@10	#4@10	#4@7	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9
14'-6"	#4@10	#4@9	#4@7	#4@10	#4@9	#4@7	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9
15'-0"	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7	#4@10	#4@9	#4@7	#4@11	#4@10	#4@8
15'-6"	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7	#4@10	#4@9	#4@7
16'-0"	#4@8	#4@7	#5@9	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7
16'-6"	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10
17'-0"	#4@7	#5@10	#5@8	#4@7	#5@11	#5@8	#4@7	#4@7	#5@9	#4@8	#4@7	#5@10
17'-6"	#5@10	#5@9	#5@7	#5@11	#5@10	#5@8	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9
18'-0"	#5@10	#5@9	#5@7	#5@10	#5@9	#5@7	#5@11	#5@10	#5@8	#4@7	#5@11	#5@9
18'-6"	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8
19'-0"	#5@8	#5@8	#5@6	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#5@10	#5@10	#5@7
19'-6"	#5@8	#5@7	#5@5	#5@8	#5@8	#5@6	#5@9	#5@8	#5@7	#5@10	#5@9	#5@7
20'-0"	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@8	#5@8	#5@6	#5@9	#5@8	#5@7
20'-6"	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6
21'-0"	#5@7	#5@6		#5@7	#5@7		#5@7	#5@7	#5@5	#5@8	#5@7	#5@6
21'-6"	#5@6	#5@5		#5@7	#5@6		#5@7	#5@7		#5@8	#5@7	#5@5
22'-0"	#5@6	#5@5		#5@6	#5@6		#5@7	#5@6		#5@7	#5@7	#5@5
22'-6"	#5@5	#5@5		#5@6	#5@5		#5@6	#5@6		#5@7	#5@7	
23'-0"	#5@5			#5@5			#5@6	#5@5		#5@7	#5@6	
23'-6"	#5@5			#5@5			#5@6	#5@5		#5@6	#5@6	
24'-0"							#5@5			#5@6	#5@5	
24'-6"							#5@5			#5@5		
25'-0"										#5@5		

(*) allowable superimposed dead and live loads (lb/ft²)

MARCORE-SR COMPOSITE DECK-20 GAUGE (WITH STIFFENER RIBS)



SECTION PROPERTIES OF STEEL DECK, F_y=50 ksi

THICKNESS	in.	0.0358
WEIGHT	psf	2.8
AREA	in ²	0.82
MOMENT OF INERTIA (I _p)	in ⁴ /ft	0.50
MOMENT OF INERTIA (I _N)	in ⁴ /ft	0.45
SECTION MODULUS (S _p)	in ³ /ft	0.37
SECTION MODULUS (S _N)	in ³ /ft	0.36
MOMENT CAPACITY (M _p)	lb-in/ft	10951
MOMENT CAPACITY (M _N)	lb-in/ft	10878

GENERAL INFORMATION

CONCRETE THICKNESS	in	2.0	2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0
COMPOSITE DECK THICKNESS	in	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
CONCRETE - 145 lb. NWC	psf	44.3	50.3	56.3	62.2	68.5	74.5	80.4	86.4	91.4
SECTION MODULUS (S _p)	in ³ /ft	1.8	2.1	2.5	2.8	3.1	3.5	3.8	4.2	4.6
EFFECTIVE AREA (A)	in ²	38.0	42.8	47.5	52.3	57.0	61.8	66.5	71.3	76.0
AVG/ MOMENT OF INERTIA (I _{av})	in ⁴ /ft	6.6	9.1	12.1	15.8	20.1	25.0	30.7	37.2	44.6
TEMP. REINFORC. W.W. F. 6"X6"		w1.4xw1.4	w1.4xw1.4	w1.4xw1.4	w2xw2	w2xw2	w2.9xw2.9	w2.9xw2.9	w2.9xw2.9	w2.9xw2.9

SHORING RECOMONDATION

Span	Composite Slab Thickness, in.	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
MARCORE-SR										
Single	20 ga.	ft.	8.00	7.75	7.50	7.25	7.00	6.75	6.50	6.25
Double	20 ga.	ft.	9.25	8.75	8.50	8.25	8.00	7.50	7.25	7.00

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF.

MARCORE-SR COMPOSITE DECK-20 GAUGE

(WITH STIFFENER RIBS)

SUPERIMPOSED LIVE LOAD ON COMPOSIT DECK, SIMPLE SPAN
20 GAUGE

COMPOSITE DECK THICKNESS	in.	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5
	MAXIMUM WORKING ALLOWABLE UNIFORM LIVE LOAD LL, LB/FT ²										
SPAN											
9	ft.	323	400	400	400	400	400	400	400	400	400
10	ft.	223	330	400	400	400	400	400	400	400	400
11	ft.	155	235	390	400	400	400	400	400	400	400
12	ft.	109	169	286	334	400	400	400	400	400	400
13	ft.	75	121	212	249	332	400	400	400	400	400
14	ft.	51	86	157	186	251	329	370	400	400	400
15	ft.	32	60	116	139	191	253	314	342	371	397
16	ft.	18	40	85	103	145	195	253	292	317	340
17	ft.		25	60	75	109	149	197	251	273	292
18	ft.		12	41	53	80	113	153	198	236	252
19	ft.			25	35	58	85	117	155	199	219
20	ft.			13	21	39	62	88	120	157	190
21	ft.					24	43	65	91	122	156
22	ft.					11	27	46	68	94	122
23	ft.						14	30	48	71	94
24	ft.							16	31	51	71
25	ft.								18	34	51
26	ft.									20	34
27	ft.										19

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF.

MARCORE-SR COMPOSITE DECK-20 GAUGE

(WITH STIFFENER RIBS)

SUPERIMPOSED LIVE LOAD ON COMPOSITE DECK, DOUBLE & TRIPLE SPAN

20 GAUGE

COMPOSITE DECK THICKNESS	in	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5
	MAXIMUM WORKING ALLOWABLE UNIFORM LIVE LOAD LL, LB/FT ²								
SPAN									
16	ft.	215	239	273	307	341	376	400	400
17	ft.	169	200	236	265	295	325	354	380
18	ft.	132	158	204	230	257	283	308	331
19	ft.	103	124	172	201	224	247	270	289
20	ft.	80	97	137	176	196	216	236	253
21	ft.	60	75	109	149	172	190	208	223
22	ft.	44	57	85	120	151	167	183	196
23	ft.	31	42	66	95	130	147	161	173
24	ft.	20	29	49	74	104	130	142	152
25	ft.	10	18	35	57	83	113	126	135
26	ft.			23	42	64	90	111	119
27	ft.			13	29	48	71	98	104
28	ft.				18	35	54	78	92
29	ft.					23	40	61	80
30	ft.					13	27	46	65
31	ft.						16	33	49
32	ft.							21	35
33	ft.							11	23
34	ft.								13

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF

MARCORE-SR COMPOSITE DECK-20 GAUGE

(WITH STIFFENER RIBS)

TWO SPAN COMPOSITE DECK 20 GAUGE

2 SPAN CONDITION REINFORCING OVER INTERMEDIATE SUPPORT

	COMPOSITE SLAB THICKNESS														
	4.0"			4.5"			5.0"			5.5"			6.0"		
	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100
SPAN															
13'-0"	#4@9	#4@8	#5@8	#4@9	#4@8	#5@9	#4@10	#4@9	#5@11	#4@11	#4@10	#4@7	#4@12	#4@11	#4@8
13'-6"	#4@8	#5@11	#5@7	#4@8	#4@7	#5@9	#4@9	#4@8	#5@10	#4@10	#4@9	#4@7	#4@11	#4@10	#4@7
14'-0"	#5@11	#5@10	#5@7	#4@8	#5@11	#5@8	#4@8	#4@8	#5@9	#4@9	#4@8	#5@10	#4@10	#4@9	#4@7
14'-6"	#5@10	#5@9	#5@6	#4@7	#5@10	#5@7	#4@8	#4@7	#5@8	#4@8	#4@7	#5@9	#4@9	#4@8	#5@10
15'-0"	#5@9	#5@8	#5@5	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8	#4@8	#4@7	#5@9	#4@8	#4@7	#5@10
15'-6"	#5@9	#5@8	#5@5	#5@9	#5@8	#5@6	#5@11	#5@9	#5@7	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9
16'-0"	#5@8	#5@7	#5@5	#5@9	#5@8	#5@5	#5@10	#5@9	#5@7	#5@11	#5@10	#5@7	#4@7	#5@11	#5@8
16'-6"	#5@7	#5@6	#5@4	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#5@11	#5@10	#5@7
17'-0"	#5@7	#5@6		#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7
17'-6"	#5@6	#5@5		#5@7	#5@6	#5@4	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@9	#5@9	#5@7
18'-0"	#5@5			#5@6	#5@5	#5@4	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6
18'-6"				#5@6	#5@5		#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5
19'-0"				#5@5	#5@5		#5@6	#5@5	#5@4	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5
19'-6"				#5@5			#5@6	#5@5		#5@7	#5@6	#5@5	#5@7	#5@7	#5@5
20'-0"							#5@5	#5@5		#5@6	#5@5	#5@4	#5@7	#5@6	#5@5
20'-6"							#5@5	#5@5		#5@6	#5@5		#5@7	#5@6	#5@4
21'-0"							#5@5			#5@5	#5@5		#5@6	#5@5	#5@4
21'-6"										#5@5	#5@5		#5@5	#5@5	
22'-0"										#5@5	#5@4		#5@5	#5@5	
22'-6"										#5@5			#5@5	#5@5	
23'-0"													#5@5	#5@4	
23'-6"													#5@5	#5@4	
24'-0"													#5@4		

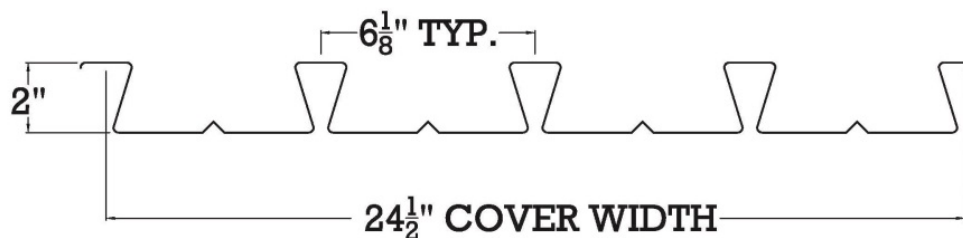
	COMPOSITE SLAB THICKNESS											
	6.5"			7.0"			7.5"			8.0"		
	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100
SPAN												
13'-0"	#4@12	#4@11	#4@9	#4@13	#4@12	#4@10	#4@14	#4@13	#4@10	#4@15	#4@14	#4@11
13'-6"	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9	#4@14	#4@13	#4@10
14'-0"	#4@10	#4@10	#4@7	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9
14'-6"	#4@10	#4@9	#4@7	#4@10	#4@9	#4@7	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9
15'-0"	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7	#4@10	#4@9	#4@7	#4@11	#4@10	#4@8
15'-6"	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7	#4@10	#4@9	#4@7
16'-0"	#4@8	#4@7	#5@9	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7
16'-6"	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10
17'-0"	#4@7	#5@10	#5@8	#4@7	#5@11	#5@8	#4@7	#4@7	#5@9	#4@8	#4@7	#5@10
17'-6"	#5@10	#5@9	#5@7	#5@11	#5@10	#5@8	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9
18'-0"	#5@10	#5@9	#5@7	#5@10	#5@9	#5@7	#5@11	#5@10	#5@8	#4@7	#5@11	#5@8
18'-6"	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8
19'-0"	#5@8	#5@8	#5@6	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#5@10	#5@10	#5@7
19'-6"	#5@8	#5@7	#5@5	#5@8	#5@8	#5@6	#5@9	#5@8	#5@7	#5@10	#5@9	#5@7
20'-0"	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@8	#5@8	#5@6	#5@9	#5@8	#5@7
20'-6"	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6
21'-0"	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@6
21'-6"	#5@6	#5@5	#5@4	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5
22'-0"	#5@6	#5@5	#5@4	#5@6	#5@6	#5@4	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5
22'-6"	#5@5	#5@5		#5@6	#5@5		#5@6	#5@6	#5@5	#5@7	#5@6	#5@5
23'-0"	#5@5	#5@5		#5@5	#5@5		#5@6	#5@5	#5@4	#5@7	#5@6	#5@5
23'-6"	#5@5	#5@5		#5@5	#5@5		#5@5	#5@5		#5@6	#5@6	#5@5
24'-0"	#5@5	#5@4		#5@5	#5@5		#5@5	#5@5		#5@6	#5@5	
24'-6"	#5@5	#5@4		#5@5	#5@4		#5@5	#5@5		#5@5	#5@5	
25'-0"	#5@4			#5@5			#5@5	#5@5		#5@5	#5@5	

(*) allowable superimposed dead and live loads (lb/ft²)

Please visit our website at www.marlynsteel.com

MARCORE-SR COMPOSITE DECK-18 GAUGE

(WITH STIFFENER RIBS)



SECTION PROPERTIES OF STEEL DECK Fy=40 ksi

THICKNESS	in.	0.0474
WEIGHT	psf	3.7
AREA	in ²	1.08
MOMENT OF INERTIA (I _p)	in ⁴ /ft	0.67
MOMENT OF INERTIA (I _N)	in ⁴ /ft	0.67
SECTION MODULUS (S _p)	in ³ /ft	0.49
SECTION MODULUS (S _N)	in ³ /ft	0.49
MOMENT CAPACITY (M _p)	lb-in/ft	11244
MOMENT CAPACITY (M _N)	lb-in/ft	11244

GENERAL INFORMATION

CONCRETE THICKNESS	in	2.0	2.5	3.0	3.5	4.0	4.5	5.0	5.5	6.0
COMPOSITE DECK THICKNESS	in	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
CONCRETE - 145lb.NWC	psf	44.5	50.5	56.7	63.3	68.6	74.6	80.6	86.5	92.6
SECTION MODULUS (S _p)	in ³ /ft	2.2	2.6	3.1	3.5	3.9	4.4	4.8	5.3	5.7
EFFECTIVE AREA (A)	in ²	38.0	42.8	47.5	52.3	57.0	61.8	66.5	71.3	76.0
AVG/MOMENT OF INERTIA (I _{av})	in ⁴ /ft	7.3	10.1	13.4	17.4	22.0	27.4	33.7	40.7	48.6
TEMP. REINFORC. W.W.F. 6" X 6"		w1.4xw1.4	w1.4xw1.4	w1.4xw1.4	w2xw2	w2xw2	w2.9xw2.9	w2.9xw2.9	w2.9xw2.9	w2.9xw2.9

SHORING RECOMMENDATION

Span	Composite Slab Thickness, in.	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0
MARCORE-SR										
Single	18 ga.	ft.	8.75	8.50	8.00	7.75	7.75	7.50	7.25	7.00
Double	18 ga.	ft.	9.50	9.00	8.75	8.75	8.25	8.00	7.75	7.50

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250PSF.

MARCORE-SR COMPOSITE DECK-18 GAUGE

(WITH STIFFENER RIBS)

SUPERIMPOSED LIVE LOAD ON COMPOSITE DECK, SIMPLE SPAN

18 GAUGE

COMPOSITE DECK THICKNESS	in	4.0	4.5	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5
	MAXIMUM WORKING ALLOWABLE UNIFORM LIVE LOAD LL , LB/FT ²										
SPAN											
9	ft.	358	400	400	400	400	400	400	400	400	400
10	ft.	248	369	398	400	400	400	400	400	400	400
11	ft.	174	264	321	400	400	400	400	400	400	400
12	ft.	123	190	263	375	400	400	400	400	400	400
13	ft.	186	138	217	281	375	400	400	400	400	400
14	ft.	59	100	181	211	285	356	390	400	400	400
15	ft.	39	71	152	159	218	287	332	361	391	400
16	ft.	24	49	128	119	167	223	284	309	335	360
17	ft.	12	32	72	88	127	173	226	266	288	310
18	ft.		18	51	64	96	133	177	227	249	268
19	ft.			34	44	71	101	138	180	216	233
20	ft.			20	28	50	76	106	141	181	203
21	ft.				15	33	55	80	109	143	177
22	ft.					20	37	58	83	112	144
23	ft.						23	41	62	86	113
24	ft.						11	26	43	64	87
25	ft.							13	28	45	66
26	ft.								15	30	47
27	ft.									16	31
28	ft.										17

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF.

MARCORE-SR COMPOSITE DECK-18 GAUGE

(WITH STIFFENER RIBS)

SUPERIMPOSED LIVE LOAD ON COMPOSITE DECK, DOUBLE & TRIPLE SPAN

18 GAUGE

COMPOSITE DECK THICKNESS	in	5.0	5.5	6.0	6.5	7.0	7.5	8.0	8.5
		MAXIMUM WORKING ALLOWABLE UNIFORM LIVE LOAD LL, LB/FT ²							
SPAN									
16	ft.	221	238	272	307	341	375	400	400
17	ft.	190	205	235	265	294	324	354	384
18	ft.	152	177	204	230	256	282	308	334
19	ft.	120	143	177	200	223	246	269	292
20	ft.	94	113	155	175	195	215	236	256
21	ft.	72	88	128	153	171	189	207	225
22	ft.	55	68	101	134	150	166	182	198
23	ft.	40	51	80	113	132	146	160	175
24	ft.	27	37	61	90	116	129	141	154
25	ft.	17	25	46	71	99	113	125	136
26	ft.		15	33	54	79	10	110	120
27	ft.			21	40	61	87	96	105
28	ft.			12	28	46	69	85	93
29	ft.				17	33	53	74	81
30	ft.					22	39	58	71
31	ft.					12	27	44	61
32	ft.						16	31	49
33	ft.							20	35
34	ft.							10	23
35	ft.								13

*Normal Weight Concrete 145 pcf

UNDERWRITERS LABORATORIES, INC. FIRE RATED FLOOR DESIGN ASSEMBLY LIVE LOAD LIMIT FOR COMPOSITE DECK SLABS IS 250 PSF

MARCORE-SR COMPOSITE DECK-18 GAUGE

(WITH STIFFENER RIBS)

TWO SPAN COMPOSITE DECK 18 GAUGE

2 SPAN CONDITION REINFORCING OVER INTERMEDIATE SUPPORT

	COMPOSITE SLAB THICKNESS														
	4.0"			4.5"			5.0"			5.5"			6.0"		
	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100
SPAN															
13'-0"	#4@8	#4@7	#5@8	#4@9	#4@8	#5@9	#4@10	#4@9	#5@11	#4@11	#4@10	#4@7	#4@12	#4@11	#4@8
13'-6"	#4@8	#5@11	#5@7	#4@8	#4@7	#5@9	#4@9	#4@8	#5@10	#4@10	#4@9	#4@7	#4@11	#4@10	#4@7
14'-0"	#5@11	#5@10	#5@7	#4@8	#5@11	#5@8	#4@8	#4@7	#5@9	#4@9	#4@8	#5@10	#4@10	#4@9	#4@7
14'-6"	#5@10	#5@9	#5@6	#5@11	#5@10	#5@7	#4@8	#4@7	#5@8	#4@8	#4@7	#5@9	#4@9	#4@8	#5@10
15'-0"	#5@9	#5@8	#5@5	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8	#4@8	#4@7	#5@9	#4@8	#4@7	#5@9
15'-6"	#5@9	#5@8	#5@5	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8	#4@8	#4@7	#5@9
16'-0"	#5@8	#5@7		#5@9	#5@8	#5@5	#5@10	#5@9	#5@7	#5@11	#5@10	#5@7	#4@7	#5@11	#5@8
16'-6"	#5@7	#5@6		#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@10	#5@9	#5@7	#5@11	#5@10	#5@7
17'-0"	#5@7	#5@6		#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@11	#5@9	#5@7
17'-6"	#5@6	#5@5		#5@7	#5@6		#5@8	#5@7	#5@5	#5@9	#5@8	#5@6	#5@9	#5@9	#5@7
18'-0"	#5@5			#5@6	#5@5		#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6
18'-6"	#5@5			#5@6	#5@5		#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5
19'-0"				#5@5	#5@5		#5@6	#5@5		#5@7	#5@6	#5@5	#5@8	#5@7	#5@5
19'-6"				#5@5			#5@6	#5@5		#5@7	#5@6	#5@5	#5@7	#5@7	#5@5
20'-0"				#5@5			#5@5	#5@5		#5@6	#5@5		#5@7	#5@6	#5@5
20'-6"							#5@5	#5@5		#5@6	#5@5		#5@6	#5@6	#5@4
21'-0"							#5@5			#5@5	#5@5		#5@6	#5@5	
21'-6"							#5@5			#5@5	#5@5		#5@5	#5@5	
22'-0"										#5@5	#5@4		#5@5	#5@5	
22'-6"										#5@5			#5@5	#5@5	
23'-0"										#5@4			#5@5	#5@4	
23'-6"													#5@5		
24'-0"													#5@4		

	COMPOSITE SLAB THICKNESS											
	6.5"			7.0"			7.5"			8.0"		
	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100	25+40	25+50	5+100
SPAN												
13'-0"	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9	#4@14	#4@13	#4@10	#4@15	#4@14	#4@11
13'-6"	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9	#4@14	#4@13	#4@10
14'-0"	#4@10	#4@10	#4@7	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9	#4@13	#4@12	#4@9
14'-6"	#4@10	#4@9	#4@7	#4@10	#4@9	#4@7	#4@11	#4@10	#4@8	#4@12	#4@11	#4@9
15'-0"	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7	#4@10	#4@9	#4@7	#4@11	#4@10	#4@8
15'-6"	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7	#4@10	#4@9	#4@7
16'-0"	#4@8	#4@7	#5@9	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10	#4@9	#4@9	#4@7
16'-6"	#4@7	#5@11	#5@8	#4@7	#4@7	#5@9	#4@8	#4@7	#5@10	#4@9	#4@8	#5@10
17'-0"	#5@11	#5@10	#5@8	#4@7	#5@11	#5@8	#4@7	#4@7	#5@9	#4@8	#4@7	#5@10
17'-6"	#5@10	#5@9	#5@7	#5@11	#5@10	#5@8	#4@7	#5@11	#5@8	#4@8	#4@7	#5@9
18'-0"	#5@9	#5@9	#5@7	#5@10	#5@9	#5@7	#5@11	#5@10	#5@8	#4@7	#5@11	#5@8
18'-6"	#5@9	#5@8	#5@6	#5@9	#5@9	#5@7	#5@10	#5@9	#5@7	#4@7	#5@10	#5@8
19'-0"	#5@8	#5@8	#5@6	#5@9	#5@8	#5@6	#5@9	#5@9	#5@7	#5@10	#5@9	#5@7
19'-6"	#5@8	#5@7	#5@5	#5@8	#5@8	#5@6	#5@9	#5@8	#5@7	#5@10	#5@9	#5@7
20'-0"	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@8	#5@8	#5@6	#5@9	#5@8	#5@7
20'-6"	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5	#5@9	#5@8	#5@6
21'-0"	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@6
21'-6"	#5@6	#5@5	#5@4	#5@7	#5@6	#5@5	#5@7	#5@7	#5@5	#5@8	#5@7	#5@5
22'-0"	#5@6	#5@5		#5@6	#5@5		#5@7	#5@6	#5@5	#5@7	#5@7	#5@5
22'-6"	#5@5	#5@5		#5@6	#5@5		#5@6	#5@6	#5@5	#5@7	#5@6	#5@5
23'-0"	#5@5	#5@5		#5@5	#5@5		#5@6	#5@5		#5@7	#5@6	#5@5
23'-6"	#5@5	#5@5		#5@5	#5@5		#5@5	#5@5		#5@6	#5@5	#5@5
24'-0"	#5@5	#5@4		#5@5	#5@5		#5@5	#5@5		#5@6	#5@5	
24'-6"	#5@5			#5@5			#5@5	#5@5		#5@5	#5@5	
25'-0"	#5@4			#5@5			#5@5	#5@5		#5@5	#5@5	

(*) allowable superimposed dead and live loads (lb/ft²)