



3" Composite Floor Deck

STEEL SECTION PROPERTIES

Fy = 40 KSI

Deck Type	Design Thick.	Weight PSF	Ip in ⁴ /Ft	In in ⁴ /Ft	Sp in ³ /Ft	Sn in ³ /Ft
3VLI22	0.0295	1.77	0.746	0.745	0.429	0.442
3VLI21	0.0329	1.97	0.850	0.848	0.495	0.511
3VLI20	0.0358	2.14	0.938	0.937	0.553	0.572
3VLI19	0.0418	2.50	1.105	1.103	0.677	0.700
3VLI18	0.0474	2.84	1.251	1.251	0.795	0.803
3VLI17	0.0538	3.22	1.421	1.421	0.913	0.913
3VLI16	0.0598	3.58	1.580	1.580	1.013	1.013

(N=9) NORMAL WEIGHT CONCRETE (145 PCF)

Total Slab Depth	Deck Type	SDI Max. Unshored Clear Span			Superimposed Live Load, PSF														
		1 Span	2 Span	3 Span	Clear Span (ft.-in.)														
					7'-0	7'-6	8'-0	8'-6	9'-0	9'-6	10'-0	10'-6	11'-0	11'-6	12'-0	12'-6	13'-0	13'-6	14'-0
5"	3VLI22	7'-8	9'-7	9'-7	216	195	149	133	120	109	99	90	83	76	70	64	59	54	50
	3VLI21	8'-11	11'-3	11'-4	230	206	187	170	128	116	106	96	88	81	74	68	63	58	54
	3VLI20	9'-6	11'-11	12'-4	241	216	196	178	163	150	111	101	93	85	78	72	66	61	57
	3VLI19	10'-8	13'-2	13'-7	265	237	214	194	178	163	151	140	102	94	86	79	73	67	62
44 PSF	3VLI18	11'-8	14'-1	14'-6	289	261	238	218	201	186	173	161	151	142	106	98	92	86	80
	3VLI17	12'-7	14'-11	15'-5	309	278	253	231	212	196	182	170	159	150	141	133	97	91	85
	3VLI16	13'-4	15'-8	15'-11	327	294	267	243	223	206	191	178	167	156	147	139	132	96	89
	3VLI18	7'-0	8'-9	8'-9	247	190	170	152	137	124	113	103	94	87	80	73	67	62	57
5 1/2"	3VLI21	8'-4	10'-4	10'-4	262	235	213	162	146	133	120	110	101	92	85	78	72	66	61
	3VLI20	9'-0	11'-5	11'-9	275	247	223	203	186	140	127	116	106	97	89	82	76	70	65
	3VLI19	10'-1	12'-7	13'-0	302	270	244	222	203	186	172	128	117	107	98	90	83	77	71
	3VLI18	11'-1	13'-5	13'-11	330	298	271	248	229	212	197	184	173	130	121	112	105	98	92
50 PSF	3VLI17	11'-11	14'-3	14'-9	352	317	288	263	242	224	208	194	182	171	128	119	111	104	97
	3VLI16	12'-8	15'-0	15'-5	373	335	304	277	255	235	218	203	190	178	168	159	117	109	102
	3VLI22	6'-5	8'-1	8'-1	242	214	191	171	154	140	127	116	106	97	89	82	76	70	65
	3VLI21	7'-8	9'-7	9'-7	294	264	204	183	165	149	135	124	113	104	95	88	81	75	69
6"	3VLI20	8'-7	10'-11	10'-11	309	277	250	228	173	157	143	130	119	109	100	92	85	79	73
	3VLI19	9'-8	12'-1	12'-6	339	304	274	249	227	209	157	143	131	120	110	102	94	87	80
	3VLI18	10'-7	12'-11	13'-4	370	334	304	279	257	238	221	207	158	146	136	126	118	110	103
	3VLI17	11'-5	13'-9	14'-2	395	356	323	296	272	251	233	218	204	155	144	134	125	117	109
57 PSF	3VLI16	12'-0	14'-5	14'-11	400	376	341	311	286	264	245	228	213	200	189	141	132	123	115
	3VLI22	6'-0	7'-5	7'-5	268	237	212	190	171	155	141	129	118	108	99	91	84	78	72
	3VLI21	7'-1	8'-10	8'-10	326	254	226	203	183	165	150	137	126	115	106	97	90	83	77
	3VLI20	8'-1	10'-1	10'-1	343	307	278	214	192	174	158	144	132	121	111	103	95	87	81
63 PSF	3VLI19	9'-3	11'-7	12'-0	377	337	304	276	252	192	175	159	146	134	123	113	104	96	89
	3VLI18	10'-1	12'-5	12'-10	400	371	338	309	285	264	246	189	175	162	151	140	131	122	115
	3VLI17	10'-11	13'-3	13'-8	400	395	359	328	302	279	259	242	186	172	160	149	139	130	121
	3VLI16	11'-6	13'-11	14'-4	400	400	378	345	317	293	272	253	237	222	169	157	146	136	128
7"	3VLI22	5'-7	6'-11	6'-11	295	261	233	209	188	171	155	142	130	119	109	101	93	86	79
	3VLI21	6'-7	8'-3	8'-3	316	279	249	223	201	182	165	151	138	127	116	107	99	91	84
	3VLI20	7'-6	9'-5	9'-5	377	338	262	235	212	192	174	159	145	133	122	113	104	96	89
	3VLI19	8'-11	11'-3	11'-7	400	370	334	303	234	211	192	175	160	147	135	124	115	106	98
69 PSF	3VLI18	9'-9	12'-0	12'-5	400	400	371	340	313	290	226	208	192	178	166	154	144	135	126
	3VLI17	10'-6	12'-9	13'-2	400	400	394	360	331	306	285	265	204	189	176	164	153	143	134
	3VLI16	11'-1	13'-5	13'-10	400	400	400	379	348	322	298	278	260	200	185	172	161	150	140
	3VLI22	5'-2	6'-6	6'-6	321	285	254	228	205	186	169	154	141	130	119	110	101	93	86
7 1/2"	3VLI21	6'-2	7'-9	7'-9	344	304	271	243	219	198	180	164	150	138	127	117	108	100	92
	3VLI20	7'-1	8'-10	8'-10	400	321	286	256	231	209	190	173	158	145	134	123	114	105	97
	3VLI19	8'-7	10'-10	11'-2	400	400	364	331	255	231	209	191	175	160	147	136	125	116	107
	3VLI18	9'-4	11'-7	12'-0	400	400	400	370	341	269	246	227	210	195	181	168	157	147	138
75 PSF	3VLI17	10'-1	12'-4	12'-9	400	400	400	393	361	334	310	241	223	206	192	179	167	156	146
	3VLI16	10'-8	13'-0	13'-5	400	400	400	400	380	351	325	303	235	218	202	188	175	164	153

- Notes:
1. Minimum exterior bearing length required is 1.5 inches. Minimum interior bearing length required is 3.0 inches. If these minimum lengths are not provided, web crippling must be checked.
 2. Always contact Manufacturer when using loads in excess of 200 psf. Such loads often result from concentrated, dynamic, or long term load cases.
 3. All fire rated assemblies are subject to an upper live load limit of 250 psf.

SLAB INFORMATION

Total Slab Depth	Theo. Concrete Volume		Recommended Welded Wire Fabric
	Yds./ 100 Sq. Ft.	Cu. Ft./ Sq. Ft.	
5"	1.08	0.292	6x6-W1.4xW1.4
5 1/2"	1.23	0.333	6x6-W1.4xW1.4
6"	1.39	0.375	6x6-W1.4xW1.4
6 1/4"	1.47	0.396	6x6-W1.4xW1.4
6 1/2"	1.54	0.417	6x6-W2.1xW2.1
7"	1.70	0.458	6x6-W2.1xW2.1
7 1/4"	1.77	0.479	6x6-W2.1xW2.1
7 1/2"	1.85	0.500	6x6-W2.1xW2.1