



5 ply / 5 layer, 11/16" MDO

Tables derived on: May 12, 2011
By: Benjamin Herzog, Staff Scientist, APA

Design Capacities			Along Panel			Across Panel		
MOE	MOR	F _s						
1,500,000	1,190	63						
	I	0.20						
	KS	0.53						
	lb/Q	6.38						
EI	F _s S	F _s lb/Q	EI	F _s S	F _s lb/Q			
301,707	835	402	104,643	389	221			

<-- Based on wet stresses, S-2 stress level, Form Y510

Panel Thickness (in.) 0.688
Duration of Load Factor 1.25
Experience Factor 1.30
Bending and Shear Deflection 2 Note: 1 = combined, 2 = separate

No. of Spans
SW = PDS [enter "PDS" or actual support width (in.)]
Spans = PDS [enter "PDS" or actual number of spans up to 3]
Panel length (in.) = 96
Panel width (in.) = 48

PDS note: For spans <48 in., SW assumed to be nominal 2x, for spans >= 48 in. nominal 4x assumed.
PDS note: When panel strength axis is across supports; spans <= 32 in., 3 spans are assumed, for spans >32 in. 2 spans are assumed. When panel strength axis is parallel supports; spans <= 16 in., 3 spans are assumed, for 16 in. >spans >=24 in. 2 spans are assumed, spans > 24 in., 1 span is assumed.

	4	8	12	16	19.2	24	30	32	36	40	48	60
Applied SW =	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	3.5	3.5
L ₁ (in.) =	4	8	12	16	19.2	24	30	32	36	40	48	60
L ₂ (in.) =	2.5	6.5	10.5	14.5	17.7	22.5	28.5	30.5	34.5	38.5	44.5	56.5
L ₃ (in.) =	3	7	11	15	18	23	29	31	35	39	45	57
SW Factor (in.) =	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.625	0.625
Applied Spans =	3	3	3	3	3	3	3	3	2	2	2	2

	4	8	12	16	19.2	24	30	32	36	40	48	60
Applied SW =	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	3.5	3.5
L ₁ (in.) =	4	8	12	16	19.2	24	30	32	36	40	48	60
L ₂ (in.) =	2.5	6.5	10.5	14.5	17.7	22.5	28.5	30.5	34.5	38.5	44.5	56.5
L ₃ (in.) =	3	7	11	15	18	23	29	31	35	39	45	57
SW Factor (in.) =	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.250	0.625	0.625
Applied Spans =	3	3	3	3	2	2	1	1	1	1	1	1

	4	8	12	16	19.2	24	30	32	36	40	48	60
L/360	10,850	2,260	845	395	235	125	65	55	45	35	25	10
L/270	14,465	3,010	1,130	525	315	165	85	70	60	45	30	15
Bending	7,735	1,935	860	485	335	215	140	120	75	60	45	30
Shear	5,225	2,010	1,245	900	740	580	460	430	365	325	280	220
Deflection*	0.01	0.02	0.03	0.05	0.08	0.12	0.18	0.20	0.16	0.20	0.27	0.45

	4	8	12	16	19.2	24	30	32	36	40	48	60
L/360	6,865	1,150	370	160	115	60	15	10	5	5	5	0
L/270	9,150	1,530	495	210	150	75	15	10	5	5	5	0
Bending	4,735	1,185	525	295	165	105	65	60	45	40	25	15
Shear	2,870	1,105	685	495	390	305	300	280	250	225	195	150
Deflection*	0.00	0.02	0.05	0.08	0.08	0.12	0.43	0.52	0.63	0.86	0.98	1.51

* Average deflection at maximum recommended load based on strength (in.)

The Following Is A Short Table Of Net Results From The Load-Span Table:
(Recommended loads less than 100 psf are not shown - English units only)

	4	8	12	16	19.2	24	30	32	36	40	48	60
L/360	5,225	1,935	845	395	235	125	---	---	---	---	---	---
L/270	5,225	1,935	860	485	315	165	---	---	---	---	---	---

	4	8	12	16	19.2	24	30	32	36	40	48	60
L/360	2,870	1,105	370	160	115	---	---	---	---	---	---	---
L/270	2,870	1,105	495	210	150	---	---	---	---	---	---	---