

ANALYSIS OF VALMONT INDUSTRIES LIGHTING STRUCTURE  
 IN ACCORDANCE WITH AASHTO-2009 RQMTS. (FINAL DEFLECTED POSITION)  
 BY BNS 5/12/2014 VERSION Fuse 1.10.0.540 32-bit

SUBJECT: VERMONT, 34' & 31' MAST ARMS W/12' LUM ARM

FOLDER: VTTRAF FILE: 3431L12

ANALYSIS OF POLE: STRESSES

SECTION HEIGHT* (FT)	GROUP LOAD NO.	COMB. STR. RATIO	APPLIED STRESS (KSI)			ALLOW. STRESS (KSI)		
			AXIAL	BEND.	SHEAR	AXIAL	BEND	SHEAR
26.50	1	0.00	0.02	0.03	0.17	33.00	36.30	18.15
26.50	2	0.00	0.02	0.15	0.41	33.00	48.28	24.14
26.50	3	0.00	0.04	0.14	0.47	33.00	48.28	24.14
20.00	1	0.45	0.27	15.89	0.01	33.00	36.30	18.15
20.00	2	0.52	0.26	15.71	10.49	33.00	48.28	24.14
20.00	3	0.75	0.47	32.20	6.54	33.00	48.28	24.14
0.00	1	0.28	0.27	9.89	0.00	33.00	36.30	18.15
0.00	2	0.62	0.27	25.79	6.52	33.00	48.28	24.14
0.00	3	0.65	0.46	29.42	4.07	33.00	48.28	24.14

\* THESE HEIGHTS ARE ABOVE THE POLE BASE PLATE.