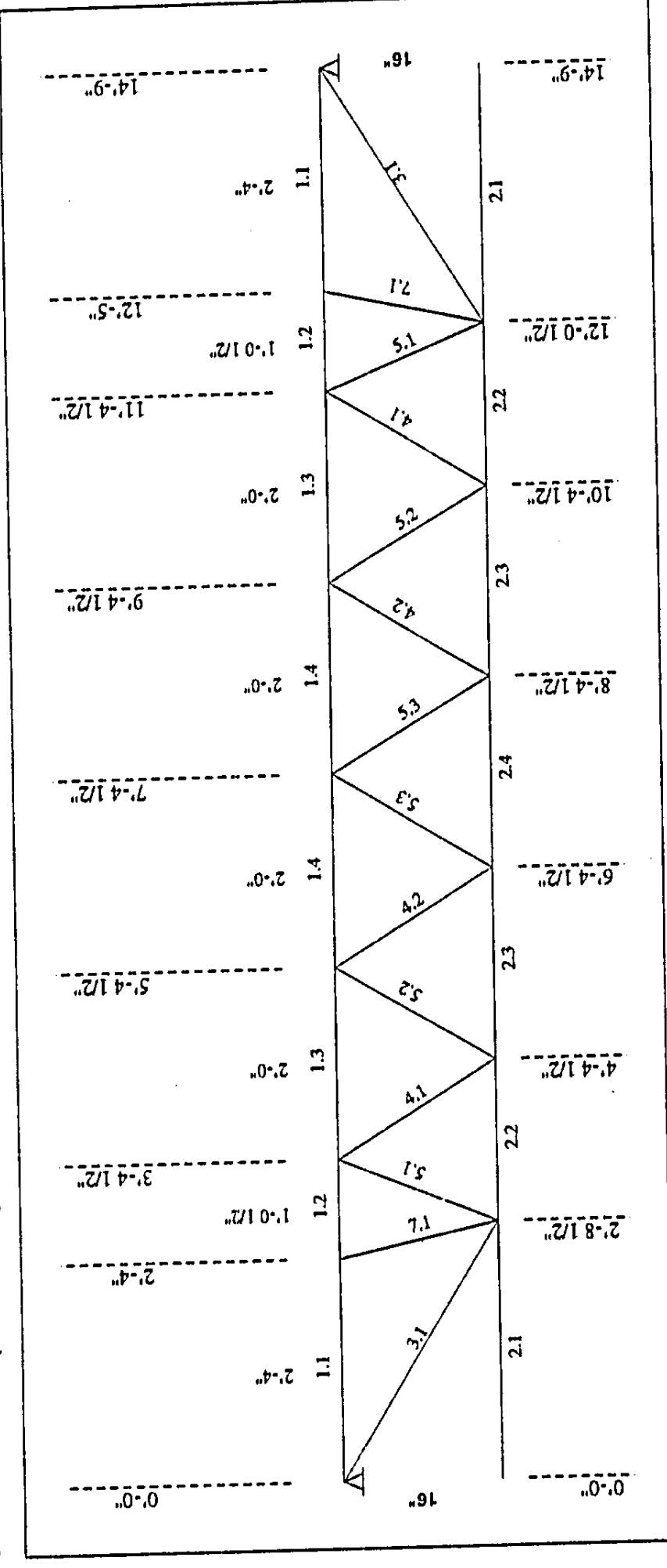




Mark: J16
Project: WEST MIAMI SIX MODEL B
01/24/05 1749730

Project: WEST MIAMI SIX MODEL B
JOIST CALCULATION ACCORDING TO HAMBRO SPECIFICATIONS

Mark: J16 (Hambro, Symmetrical, Parallel, Free ends)



LOADING CONDITIONS (THE SHOWN VALUES ARE REAL)			
TOTAL LOAD ...:	430.94 lb/ft	H16	LIVE LOAD ...: 164.17 lb/ft
	105.00 lb/ft ² x 4'-1 1/4"		40.00 lb/ft ² x 4'-1 1/4"
HAMBRO			
Total Thickness of the Slab.....	=	3.00 in	
Perimeter Joist.....	=	0.00 in	
Length of the Extension of the Slab.....	=	145.00 lb/ft ³	
Compression Resistance (f'c).....	=	3.00 ksi	
Composite Inertia.....	=	186.00 in ⁴	
Composite Maximum Capacity.....	=	458.45 PLF	
Non-Composite Maximum Capacity.....	=	DL = 41.24 PSF	
Horizontal Shear at the Interface. (Formula 2003).....	=	95.31 lb/in	
Utilization of 'high-chair'.....	=	0.37	
Presence of 'high-chair'.....	=	N	
Type of Hambro (presence of reinforcing).....	=		
DEFLECTION			
Allowed deflection under live load.....	=	0.48 in (L/ 360)	
Actual deflection under service live load.....	=	0.04 in (L/ 4165)	
MB Hambro Deflection: Beam Formula * 1.3 with Composite Inertia - 15 * Steel Inertia	=	73.51 in ⁴	
Joist inertia.....	=	0.14 in	
Required camber.....	=		