

April 1, 2024

Melanie A. Bachman, Esq.  
Executive Director/Staff Attorney  
Connecticut Siting Council  
10 Franklin Square  
New Britain, CT 06051

Re: **Notice of Exempt Modification – Facility Modification  
Plainville Municipal Center  
11-21 East Main Street, Plainville, Connecticut**

Dear Attorney Bachman:

Cellco Partnership d/b/a Verizon Wireless (“Cellco”) currently maintains an existing wireless telecommunications facility at the Plainville Municipal Center at 11-21 East Main Street in Plainville (the “Property”). The existing Cellco facility consists of antennas and remote radio heads attached to a telecommunications tower and associated equipment on the ground near the base of the tower. The tower was approved by the Town of Plainville (“Town”) and is used for municipal and emergency service communications purposes. The tower and Property are owned by the Town.

Cellco’s real estate consultants spoke with Town staff in an effort to obtain a copy of the original local tower approval. Zoning staff indicated that because the tower is Town-owned it was exempt from local zoning requirements. The Town’s building department also searched its records for a copy of a building permit, but was unable to locate one. Cellco’s shared use of the tower was approved by the Council in August 2004 (TS-VER-110-040729). A copy of Cellco’s tower share approval is included in [Attachment 1](#).

Cellco’s proposed modification involves the installation of two (2) interference mitigation filters (“Filters”) on its existing antenna mounting assembly. The specification sheet for the Filters is included in [Attachment 2](#).

Please accept this letter as notification pursuant to R.C.S.A. § 16-50j-73, for construction that constitutes an exempt modification pursuant to R.C.S.A. § 16-50j-72(b)(2). In accordance with R.C.S.A. § 16-50j-73, a copy of this letter is being sent to Plainville’s Town Manger and Land Use Officer.

29230094-v1

Melanie A. Bachman, Esq.  
April 1, 2024  
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The planned modifications to the facility fall squarely within those activities explicitly provided for in R.C.S.A. § 16-50j-72(b)(2).

1. The proposed modifications will not result in an increase in the height of the existing tower. The Filters will be installed on Cellco's existing antenna mounting structure.
2. The proposed modifications will not involve any change to ground-mounted equipment and, therefore, will not require the extension of the site boundary.
3. The proposed modifications will not increase noise levels at the facility by six decibels or more, or to levels that exceed state and local criteria.
4. The installation of Cellco's Filters will not result in a change to radio frequency (RF) emissions from the facility. Therefore, no new RF emissions information is included in this filing.
5. The proposed modifications will not cause a change or alteration in the physical or environmental characteristics of the site.
6. According to the attached Structural Analysis Report ("SA") and Antenna Mount Analysis Report ("MA"), the existing tower, foundation, antenna platform and mounting assembly can support Cellco's proposed modifications. A copy of the SA and MA are included in Attachment 3.

A copy of the parcel map and Property owner information is included in Attachment 4. A Certificate of Mailing verifying that this filing was sent to municipal officials is included in Attachment 5.

For the foregoing reasons, Cellco respectfully submits that the proposed modifications to the above-referenced telecommunications facility constitutes an exempt modification under R.C.S.A. § 16-50j-72(b)(2).

Sincerely,



Kenneth C. Baldwin

Enclosures

Copy to:

Michael Paulhus, Town Manger  
Mark DeVoe, Town Planner  
Aleksy Tyurin, Verizon Wireless

# **ATTACHMENT 1**

August 13, 2004

Kenneth C. Baldwin, Esq.  
Robinson & Cole LLP  
280 Trumbull Street  
Hartford, CT 06103-3597

RE: **TS-VER-110-040729** – Cellco Partnership d/b/a Verizon Wireless request for an order to approve tower sharing at an existing telecommunications facility located at 21-35 East Main Street, Plainville, Connecticut.

Dear Attorney Baldwin:

At a public meeting held August 12, 2004, the Connecticut Siting Council (Council) ruled that the shared use of this existing tower site is technically, legally, environmentally, and economically feasible and meets public safety concerns, and therefore, in compliance with General Statutes § 16-50aa, the Council has ordered the shared use of this facility to avoid the unnecessary proliferation of tower structures. This facility has also been carefully modeled to ensure that radio frequency emissions are conservatively below State and federal standards applicable to the frequencies now used on this tower.

This decision is under the exclusive jurisdiction of the Council. Any additional change to this facility may require an explicit request to this agency pursuant to General Statutes § 16-50aa or notice pursuant to Regulations of Connecticut State Agencies Section 16-50j-73, as applicable. Such request or notice shall include all relevant information regarding the proposed change with cumulative worst-case modeling of radio frequency exposure at the closest point of uncontrolled access to the tower base, consistent with Federal Communications Commission, Office of Engineering and Technology, Bulletin 65. Any deviation from this format may result in the Council implementing enforcement proceedings pursuant to General Statutes § 16-50u including, without limitation, imposition of expenses resulting from such failure and of civil penalties in an amount not less than one thousand dollars per day for each day of construction or operation in material violation.

This decision applies only to this request for tower sharing and is not applicable to any other request or construction.

The proposed shared use is to be implemented as specified in your letter dated July 29, 2004, including the placement of all necessary equipment and shelters within the tower compound.

Thank you for your attention and cooperation.

Very truly yours,

Pamela B. Katz, P.E.  
Chairman

PBK/cm

c: Honorable Helen Bergenty, Town Council Chairman, Town of Plainville  
Len Tunderman, Town Planner, Town of Plainville

# **ATTACHMENT 2**

# KA-6030

## TWIN BANDSTOP 900MHZ INTERFERENCE MITIGATION FILTER

The KA-6030 is ideal for co-located 700, 850 and 900 networks. Utilising a 2.6MHz guardband the KA-6030 provides rejection of the 900 UL band while passing 700/850 UL and DL bands. Capable of being used in an outdoor environment the KA-6030 contains two identical bandstop filters, suitable for 2x2 MIMO configuration, offering excellent insertion loss, group delay and rejection.



### FEATURES

- Passes full 700 and 850 bands
- Low insertion loss
- Rejection of 900MHz uplink
- DC/AISG pass
- Twin unit
- Dual twin mounting available

### TECHNICAL SPECIFICATIONS

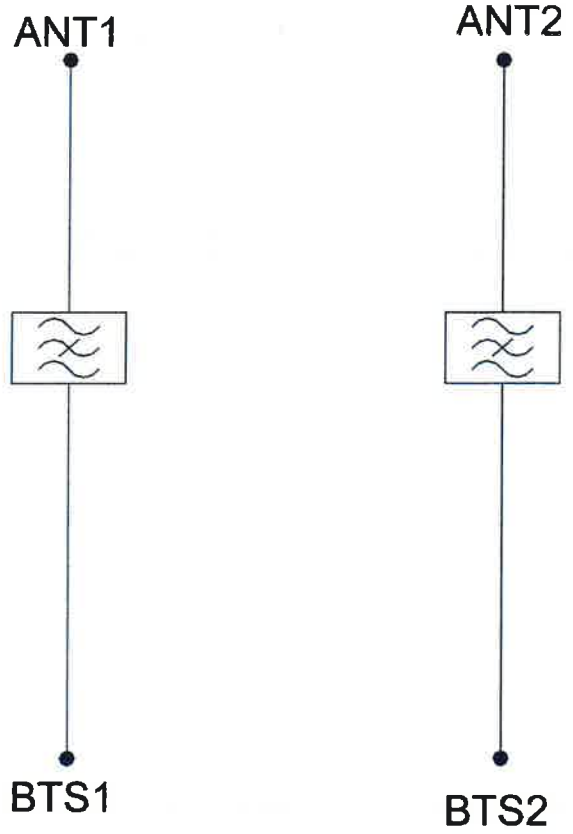
BAND NAME	700 PATH / 850 UPLINK PATH	850 DOWNLINK PATH
Passband	698 - 849MHz	869 - 891.5MHz
Insertion loss	0.1dB typical / 0.3dB maximum	0.5dB typical, 1.45dB maximum
Return loss	24dB typical, 18dB minimum	
Maximum input power (Per Port)	100W average	200W average and 66W per 5MHz
Rejection	53dB minimum @ 894.1 - 896.5MHz	
<b>ELECTRICAL</b>		
Impedance	50Ohms	
Intermodulation products	-160dBc maximum in UL Band (assuming 20MHz Signal), with 2 x 43dBm carriers -153dBc maximum with 2 x 43dBm	
<b>DC / AISG</b>		
Passband	0 - 13MHz	
Insertion loss	0.3dB maximum	
Return loss	15dB minimum	
Input voltage range	± 33V	
DC current rating	2A continuous, 4A peak	
Compliance	3GPP TS 25.461	
<b>ENVIRONMENTAL</b>		
For further details of environmental compliance, please contact Kaelus.		
Temperature range	-20°C to +60°C   -4°F to +140°F	
Ingress protection	IP67	
Altitude	2600m   8530ft	
Lightning protection	RF port: ±5kA maximum (8/20us), IEC 61000-4-5 – Unit must be terminated with some lightning protection circuits.	
MTBF	>1,000,000 hours	
Compliance	ETSI EN 300 019 class 4.1H, RoHS, NEBS GR-487-CORE	

MECHANICAL	
Dimensions H x D x W	269 x 277 x 80mm   10.60 x 10.90 x 3.15in (Excluding brackets and connectors)
Weight	8.0 kg   17.6 lbs (no bracket)
Finish	Powder coated, light grey (RAL7035)
Connectors	RF: 4.3-10 (F) x 4
Mounting	Optional pole/wall bracket supplied with two metal clamps 45-178mm diameter poles or custom bracket. See ordering information.

### ORDERING INFORMATION

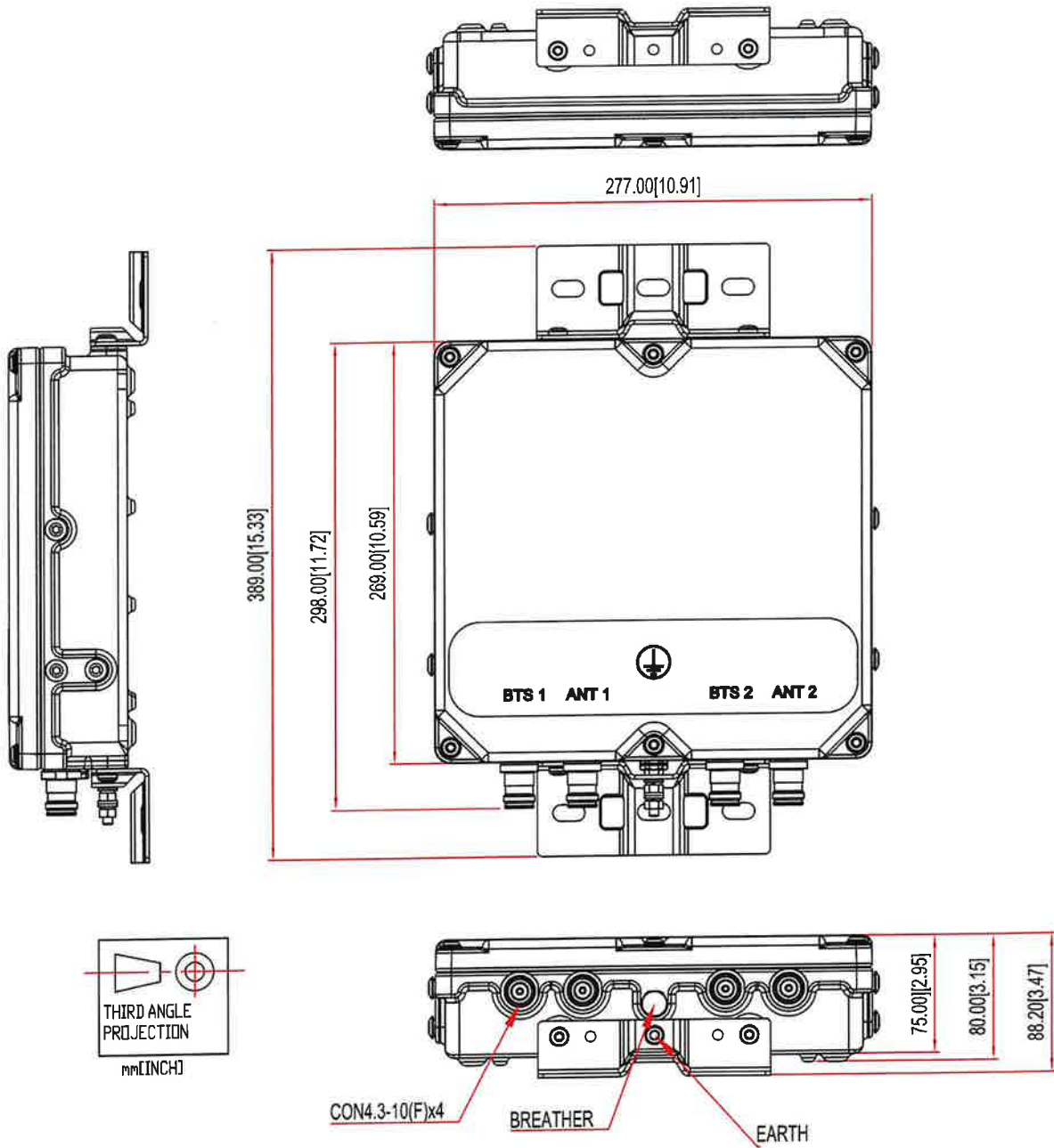
PART NUMBER	CONFIGURATION	OPTIONAL FEATURES	CONNECTORS
KA-6030-2032	TWIN, 2 in / 2 out	DC/AISG PASS	4.3-10 (F)

ELECTRICAL BLOCK DIAGRAM





**MECHANICAL BLOCK DIAGRAM**



# **ATTACHMENT 3**



## Structural Analysis Report

**Location Code:** 467452  
**Site Name:** PLAINVILLE 3 CT  
**FUZE Project ID:** 17123831  
**Project Name:** RF Filter Add  
**Address:** 11 East Main Street  
Plainville, CT 06062

**Client:**

**verizon** ✓  
20 ALEXANDER DRIVE  
WALLINGFORD, CT 06492

**Date:** 03/18/2024

**Sufficient Capacity – 93.2%**



Centerline Engineering Services, PA  
750 W Center St, Suite 301  
West Bridgewater, MA 02379  
781-713-4725



**Scope of Work:**

Centerline Communications was authorized by Verizon Wireless to perform an analysis of the existing 81 ft. monopole to determine its capacity to support the existing and proposed equipment listed in this report.

**Existing & Proposed Equipment:**

Carrier	Mounting Level (ft)	Center Line Elevation (ft)	Number of Appurtenances	Antenna Manufacturer	Appurtenance Model	Feed Lines (in)
Verizon Wireless	78.0	81.0	6	Andrew	SBNHH-1D65B	(6) 1-5/8" Coax (2) HCS 6x12
			3	Antel	BXA-70063-4CF	
			3	-	nL-Sub6	
			3	Samsung	B2/66A RRH-BR049 (RFV01U-D1A)	
			3	Samsung	B5/B13 RRH-BR04C (RFV01U-D2A)	
			3	Commscope	BSAMNT-SBS-1-2	
			1	Raycap	RRFDC-3315-PF-48	
			1	RFS	DB-B1-6C-12AB-0Z	
			2	<b>Kaelus</b>	<b>KA-6030</b>	
		1	<b>Site Pro 1</b>	<b>RRUDSM</b>		
	78.0	1	-	17.47' Platform w/ Kickers		
Municipal	62.5	72.5	1	-	20' 4-Bay Dipole	(4) 7/8"
		67.5	1	-	10'x3" Omni	
		65.5	2	-	4'x2" Omni	
		62.5	1	-	Platform Mount	
Municipal	42.5	50.5	1	-	10'x3" Omni	(6) 7/8"
		47.5	2	-	10' 2-Bay Omni	
		46.5	2	-	3' Yagi	
		42.5	1	-	Platform Mount	
		40.5	1	-	10' 2-Bay Dipole	

Note: Proposed equipment shown in **bold**.

Centerline Engineering Services, PA  
 750 W Center St, Suite 301  
 West Bridgewater, MA 02379  
 781-713-4725



**Design Criteria:**

**Design Codes:**

2022 Connecticut State Building Code

2021 International Building Code

ASCE 7-16

TIA-222-H Standards

Basic Design Wind Speed (V)	130 mph
Wind Speed with Ice	50 mph
Ice Thickness	1.50 in.
Exposure Category	B
Topographic Category	1
Risk Category	III
Site Soil Class (Assumed)	D – Stiff Soil
Seismic Design Category	B
Spectral Response Acceleration Parameter at a Short Periods, $S_s$	0.191 g
Spectral Response Acceleration Parameter at a Period of 1 Second, $S_1$	0.055 g
Short Period Site Coefficient, $F_a$	1.60
Long Period Site Coefficient, $F_v$	2.40

**\*Refer to calculations for additional design criteria.**

Centerline Engineering Services, PA  
750 W Center St, Suite 301  
West Bridgewater, MA 02379  
781-713-4725



**Conclusion:**

**Tower Section Capacity (Summary)**

Section No.	Elevation ft	Component Type	Size	Critical Element	P lb	$\phi P_{allow}$ lb	% Capacity	Pass Fail
L1	81 - 48.5	Pole	TP17.614x13x0.1875	1	-11.605	606.700	78.9	Pass
L2	48.5 - 37.54	Pole	TP19.17x17.614x0.51	2	-16.861	912.000	68.6	Pass
L3	37.54 - 28.5	Pole	TP20.0416x17.7354x0.5515	3	-19.082	1058.400	80.0	Pass
L4	28.5 - 27.5	Pole	TP20.1805x20.0416x0.5534	4	-19.250	1055.240	81.8	Pass
L5	27.5 - 23.5	Pole	TP20.736x20.1805x0.4851	5	-19.874	1022.590	90.2	Pass
L6	23.5 - 2.5	Pole	TP23.6528x20.736x0.4857	6	-23.464	1329.760	93.2	Pass
L7	2.5 - 0	Pole	TP24x23.6528x0.42	7	-23.879	1693.480	74.9	Pass
							Summary	
						Pole (L6)	93.2	Pass
						Anchor Rod	56.7	Pass
						Base Plate	81.2	Pass
						<b>RATING =</b>	<b>93.2</b>	<b>Pass</b>

**Structure Rating (Max From All Components) = 93.2%**

**Foundation Capacity (Summary)**

Component	% Capacity	Pass Fail
Foundation – Soil Rating	33.1	Pass
Foundation – Structural Rating	37.5	Pass

**Foundation Rating (Max From All Components) = 37.5%**

**Recommendations:**

The existing tower and its foundation have sufficient capacity to support the existing and proposed loading for the final loading configuration.



**Reference Documents:**

- Structural Analysis Report and Modification Design by Paul J. Ford, dated April 15, 2021
- Lease Exhibit by Centerline, dated December 11, 2023
- Mount Analysis Report by Colliers Engineering & Design, dated December 01, 2023

**Assumptions and Limitations:**

- The tower and structures were built and maintained with the manufacturer's specifications.
- The configuration of antennas, transmission cables, mounts and other appurtenances are as specified in this report and the referenced drawings.
- Existing appurtenance information obtained from the Structural Analysis Report by Structural Analysis Report and Modification Design by Paul J. Ford, date April 15, 2021 and the Lease Exhibit by Centerline, dated December 11, 2023.
- Modifications designed by Paul J. Ford, dated April 15, 2021 are assumed to have been considered for the purpose of this analysis.
- Blow counts have been assumed based on Table F-1: Presumptive Soil Parameters in ANSI/TIA-222-H.

Centerline Engineering Services, PA  
750 W Center St, Suite 301  
West Bridgewater, MA 02379  
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Three decorative blue wavy lines at the bottom of the page, consisting of three parallel, slightly curved horizontal bands.



Design Calculations

Centerline Engineering Services, PA  
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West Bridgewater, MA 02379  
781-713-4725



Section	Length (ft)	Number of Sides	Thickness (in)	Socket Length (ft)	Top Dia (in)	Bot Dia (in)	Grade	Weight (K)
1	32.50	18	0.1875	13.0000	17.6140	17.6140	A572-65	1.0
2	10.96	18	0.5100	2.92	17.6140	19.1700	Reinf 34.31 ksi	1.1
3	11.96	18	0.5515	17.7354	20.0416	20.0416	Reinf 34.47 ksi	1.3
4	1.00	18	0.5514	20.160520	20.0416	20.0416	Reinf 34.01 ksi	0.1
5	4.00	18	0.4851	20.160520	20.736028	20.736028	Reinf 34.01 ksi	0.4
6	21.00	18	0.4857	20.7360	23.6528	23.6528	Reinf 36.44 ksi	2.4
7	2.50	18	0.4200	23.6528	24.0000	24.0000	Reinf 59.86 ksi	0.3

81.0 ft

48.5 ft

37.5 ft

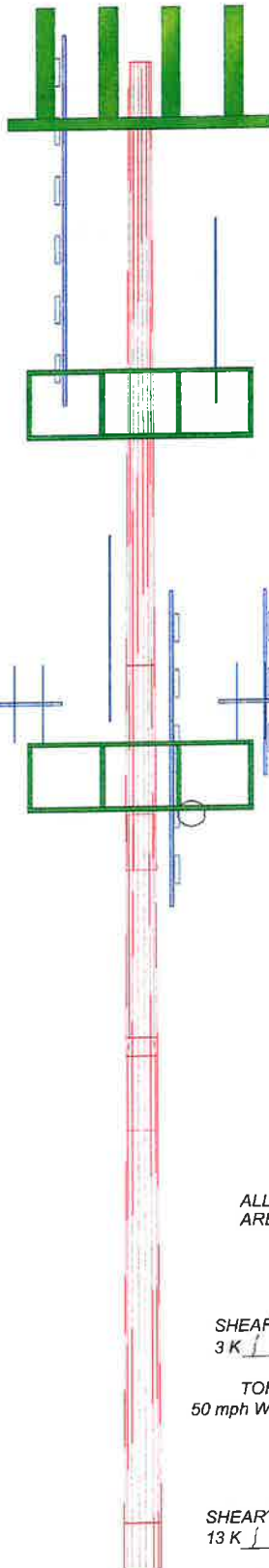
28.5 ft

27.5 ft

23.5 ft

2.5 ft

0.0 ft



**DESIGNED APPURTENANCE LOADING**

TYPE	ELEVATION	TYPE	ELEVATION
(2) SBNHH-1D65B w/ Mount Pipe	78	BSAMNT-SBS-1-2	78
(2) SBNHH-1D65B w/ Mount Pipe	78	RRFDC-3315-PF-48	78
(2) SBNHH-1D65B w/ Mount Pipe	78	DB-B1-6C-12AB-0Z	78
BXA-70063-4CF w/ Mount Pipe	78	(2) KA-5030	78
BXA-70063-4CF w/ Mount Pipe	78	RRUDSM	78
BXA-70063-4CF w/ Mount Pipe	78	17.47' Platform Mount w/ Kickers	78
nL-Sub6 w/ Pipe Mount	78	20' 4-Bay Dipole	62.5
nL-Sub6 w/ Pipe Mount	78	(2) 4' x 2" Omni	62.5
nL-Sub6 w/ Pipe Mount	78	10' x 3" Omni	62.5
B2/B66A RRH-BR049 (RFV01U-D1A)	78	Platform Mount	62.5
B2/B66A RRH-BR049 (RFV01U-D1A)	78	10' 2-Bay Dipole	42.5
B2/B66A RRH-BR049 (RFV01U-D1A)	78	10' 2-Bay Dipole	42.5
B5/B13 RRH-BR04C (RFV01U-D2A)	78	10' 2-Bay Dipole	42.5
B5/B13 RRH-BR04C (RFV01U-D2A)	78	3' Yagi	42.5
B5/B13 RRH-BR04C (RFV01U-D2A)	78	3' Yagi	42.5
BSAMNT-SBS-1-2	78	10' x 3" Omni	42.5
BSAMNT-SBS-1-2	78	Platform Mount	42.5

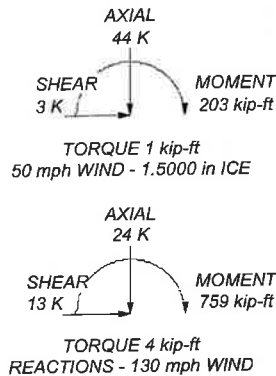
**MATERIAL STRENGTH**

GRADE	Fy	Fu	GRADE	Fy	Fu
A572-65	65 ksi	80 ksi	Reinf 36.44 ksi	36 ksi	80 ksi
Reinf 34.31 ksi	34 ksi	65 ksi	Reinf 41.37 ksi	41 ksi	80 ksi
Reinf 34.47 ksi	34 ksi	80 ksi	Reinf 59.86 ksi	60 ksi	80 ksi
Reinf 34.01 ksi	34 ksi	80 ksi			

**TOWER DESIGN NOTES**

1. Tower is located in Hartford County, Connecticut.
2. Tower designed for Exposure B to the TIA-222-H Standard.
3. Tower designed for a 130 mph basic wind in accordance with the TIA-222-H Standard.
4. Tower is also designed for a 50 mph basic wind with 1.50 in ice. Ice is considered to increase in thickness with height.
5. Deflections are based upon a 60 mph wind.
6. Tower Risk Category III.
7. Topographic Category 1 with Crest Height of 0.00 ft
8. TOWER RATING: 93.2%

ALL REACTIONS ARE FACTORED

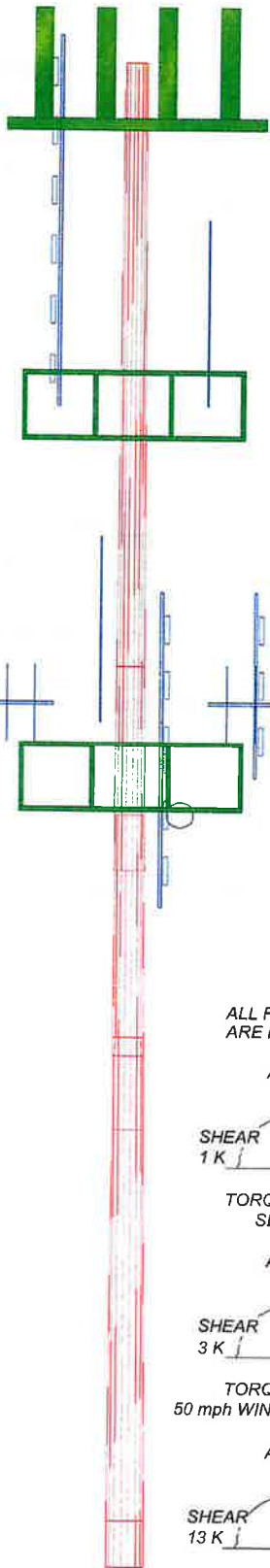


**Centerline Engineering Services, PA**  
750 W Center St, Suite 301  
West Bridgewater, MA 02379  
Phone: (781) 713-4725  
FAX:

Job: Plainville 3 CT		
Project: 23CLVZ-0021		
Client: Verizon Wireless	Drawn by: jll	App'd:
Code: TIA-222-H	Date: 03/15/24	Scale: NTS
Path:		Dwg No. E-1

Section	Length (ft)	Number of Sides	Thickness (in)	Socket Length (ft)	Top Dia (in)	Bot Dia (in)	Grade	Weight (K)
1	32.50	18	0.1875		13.0000	17.6140	A572-65	17.6140
2	10.98	18	0.5100	2.92	17.6140	19.1700	Reinf 34.31 ksi	1.1
3	11.96	13	0.5515		17.7354	20.0416	Reinf 34.47 ksi	1.3
4	1.00	18	0.5534		20.180520, 04.16	20.736020, 19.05	Reinf 34.01 ksi	0.4
5	4.00	18	0.4851		20.180520, 04.16	20.736020, 19.05	Reinf 36.44 ksi	0.4
6	21.00	18	0.4857		20.7360	23.6528	Reinf 41.37 ksi	2.4
7	2.50	18	0.4200		23.6528	24.0000	Reinf 59.86 ksi	0.3

81.0 ft  
48.5 ft  
37.5 ft  
28.5 ft  
27.5 ft  
23.5 ft  
2.5 ft  
0.0 ft



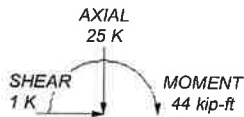
### MATERIAL STRENGTH

GRADE	Fy	Fu	GRADE	Fy	Fu
A572-65	65 ksi	80 ksi	Reinf 36.44 ksi	36 ksi	80 ksi
Reinf 34.31 ksi	34 ksi	65 ksi	Reinf 41.37 ksi	41 ksi	80 ksi
Reinf 34.47 ksi	34 ksi	80 ksi	Reinf 59.86 ksi	60 ksi	80 ksi
Reinf 34.01 ksi	34 ksi	80 ksi			

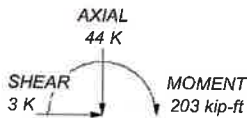
### TOWER DESIGN NOTES

1. Tower is located in Hartford County, Connecticut.
2. Tower designed for Exposure B to the TIA-222-H Standard.
3. Tower designed for a 130 mph basic wind in accordance with the TIA-222-H Standard.
4. Tower is also designed for a 50 mph basic wind with 1.50 in ice. Ice is considered to increase in thickness with height.
5. Deflections are based upon a 60 mph wind.
6. Tower Risk Category III.
7. Topographic Category 1 with Crest Height of 0.00 ft
8. Seismic calculations are in accordance with TIA-222-H
9. Seismic loads do not control this analysis
10. TOWER RATING: 93.2%

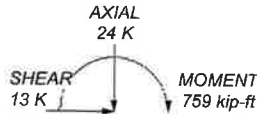
ALL REACTIONS  
ARE FACTORED



TORQUE 0 kip-ft  
SEISMIC



TORQUE 1 kip-ft  
50 mph WIND - 1.5000 in ICE

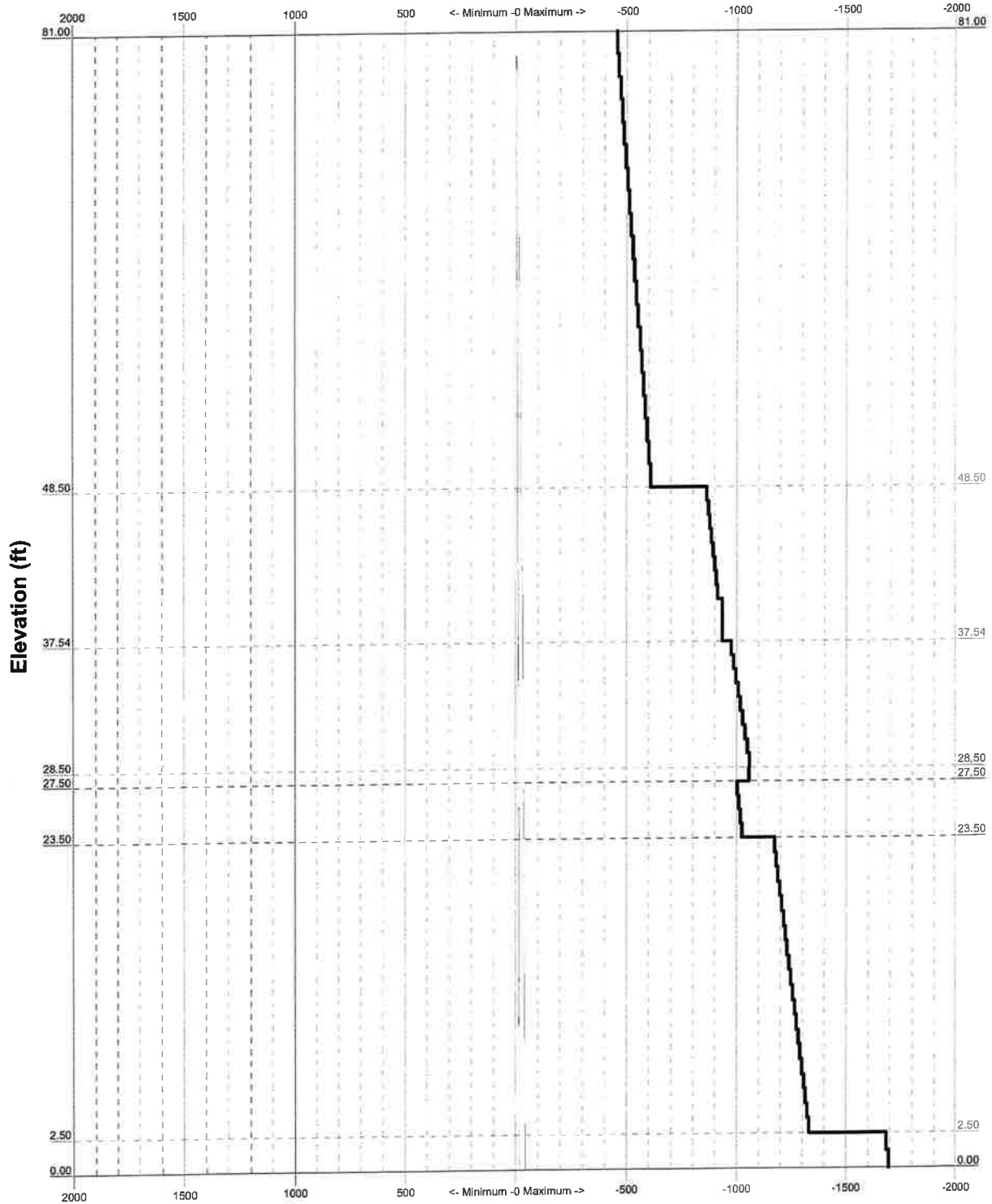


TORQUE 4 kip-ft  
REACTIONS - 130 mph WIND

<b>Centerline Engineering Services, PA</b> 750 W Center St, Suite 301 West Bridgewater, MA 02379 Phone: (781) 713-4725 FAX:	Job: <b>Plainville 3 CT</b>		
	Project: <b>23CLVZ-0021</b>		
	Client: Verizon Wireless	Drawn by: jll	App'd:
	Code: TIA-222-H	Date: 03/15/24	Scale: NTS
	Path:	Dwg No. E-1	

TIA-222-H - 130 mph/50 mph 1.5000 in Ice Exposure B

Leg Capacity ——— Leg Compression (K)



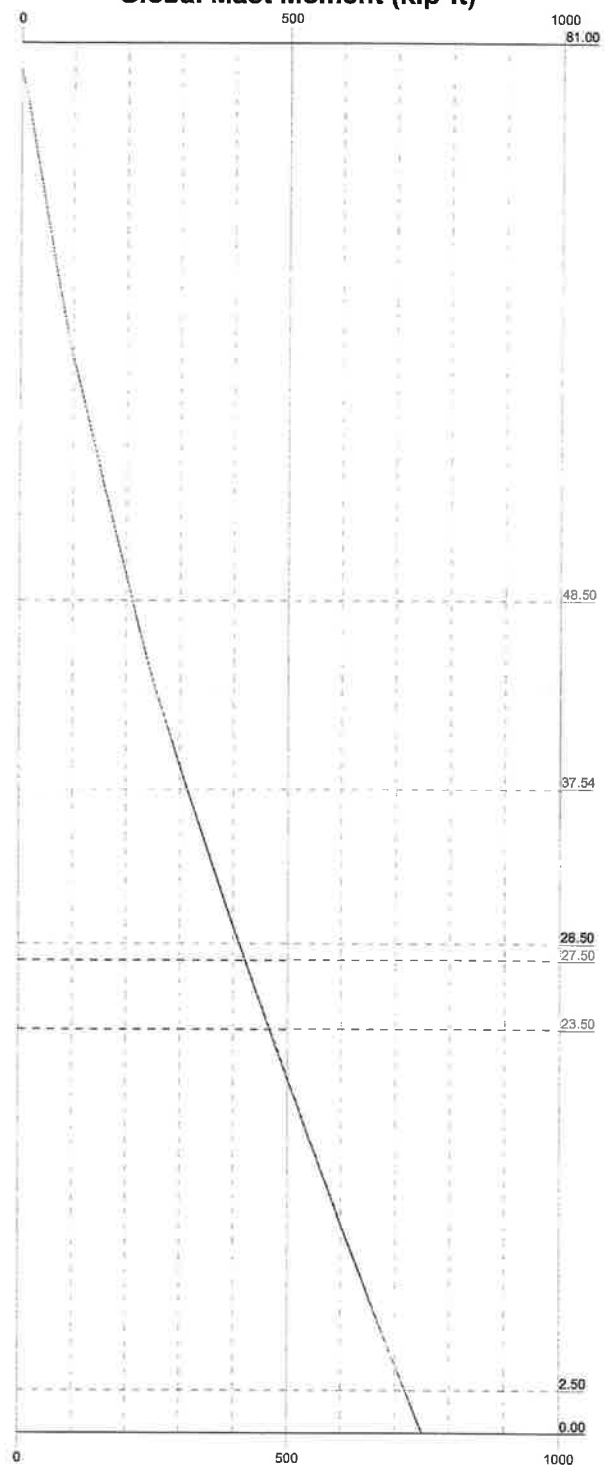
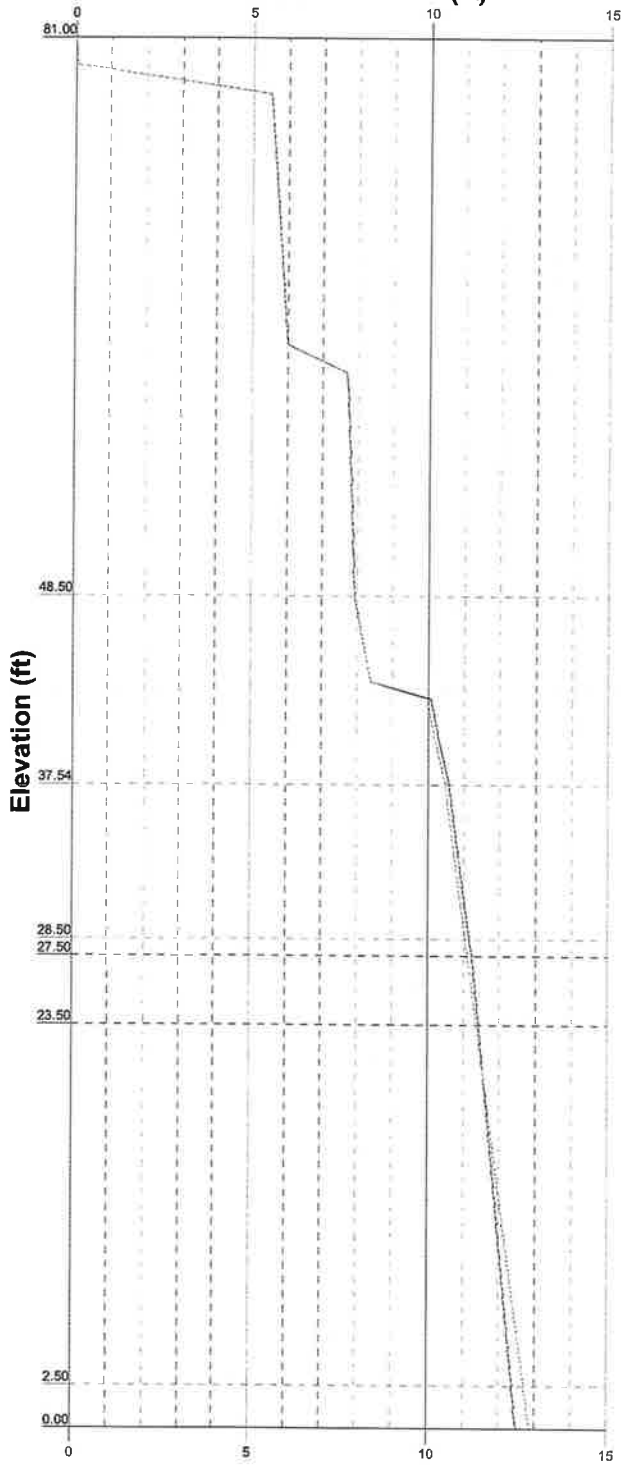
<b>Centerline Engineering Services, PA</b> 750 W Center St, Suite 301 West Bridgewater, MA 02379 Phone: (781) 713-4725 FAX:	Job: <b>Plainville 3 CT</b>		
	Project: <b>23CLVZ-0021</b>		
	Client: Verizon Wireless	Drawn by: jll	App'd:
	Code: TIA-222-H	Date: 03/15/24	Scale: NTS
	Path:		Dwg No: E-3

Vx Vz

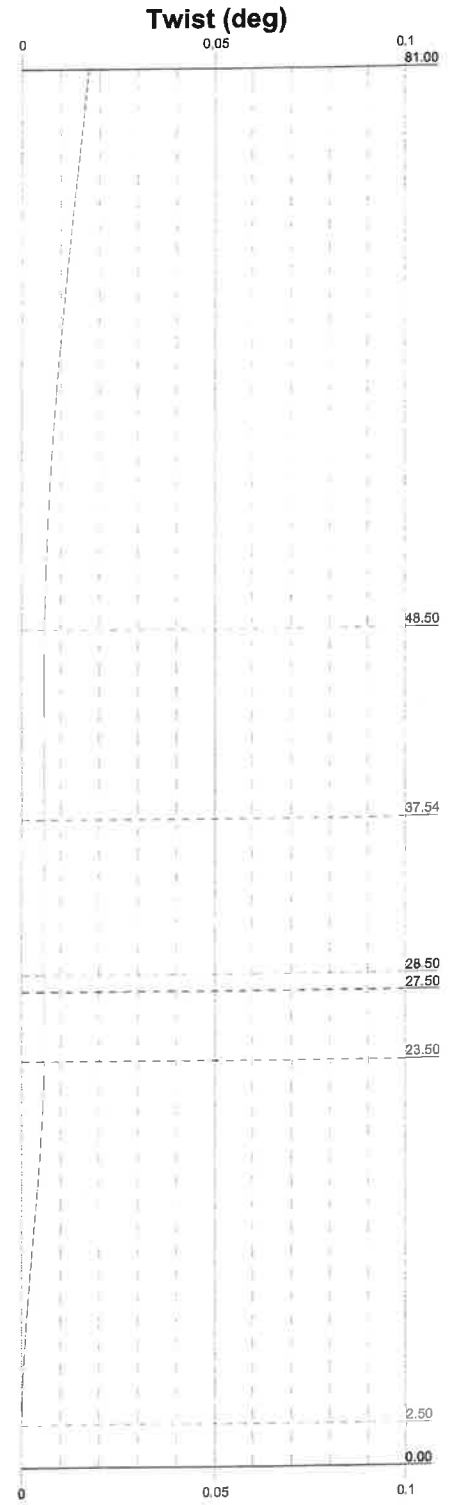
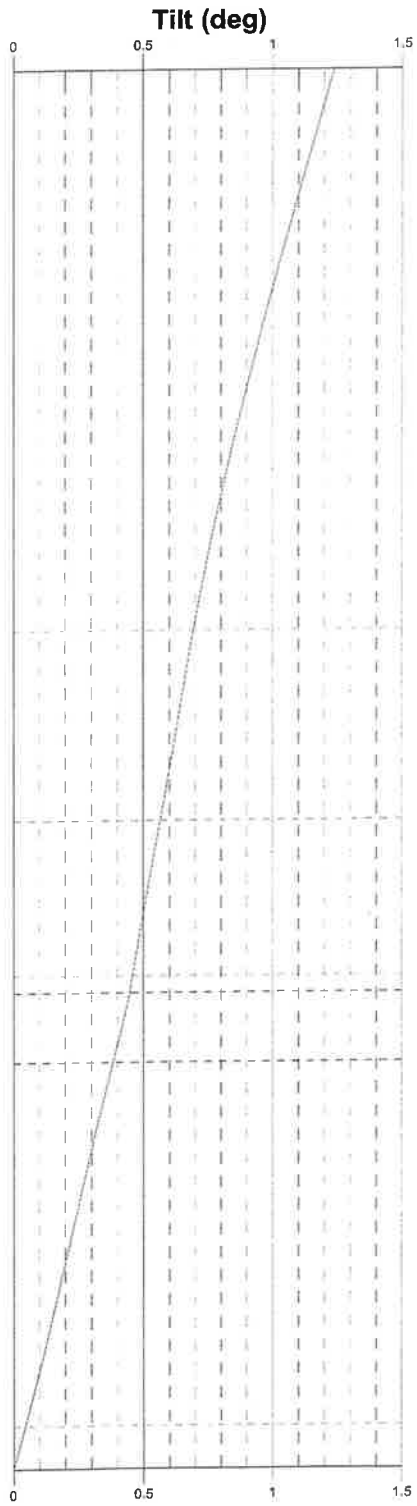
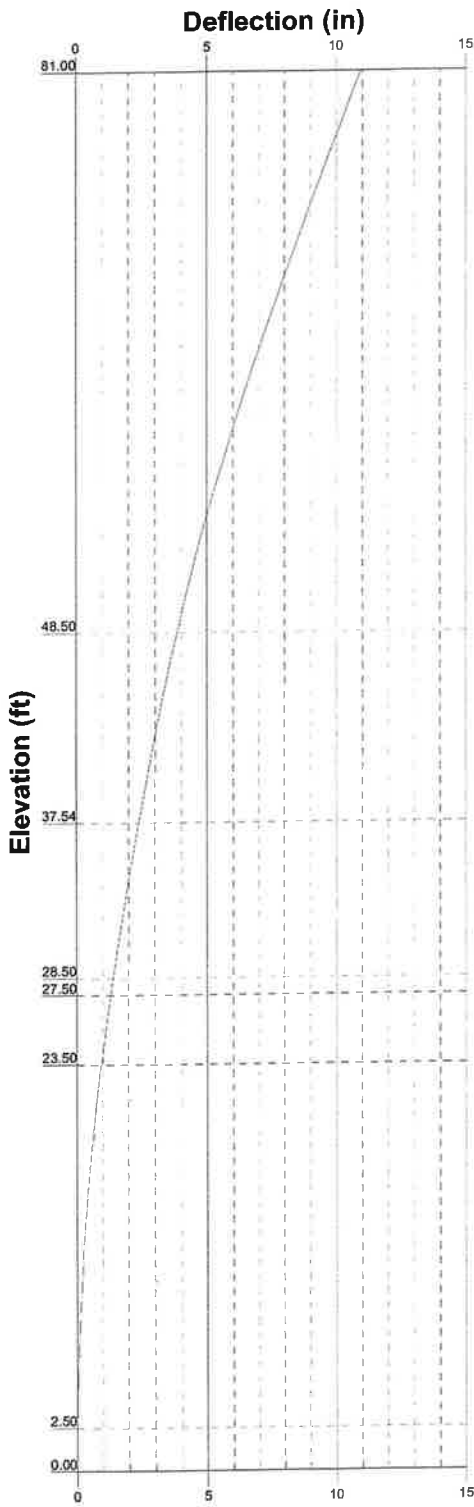
Mx Mz

Global Mast Shear (K)

Global Mast Moment (kip-ft)



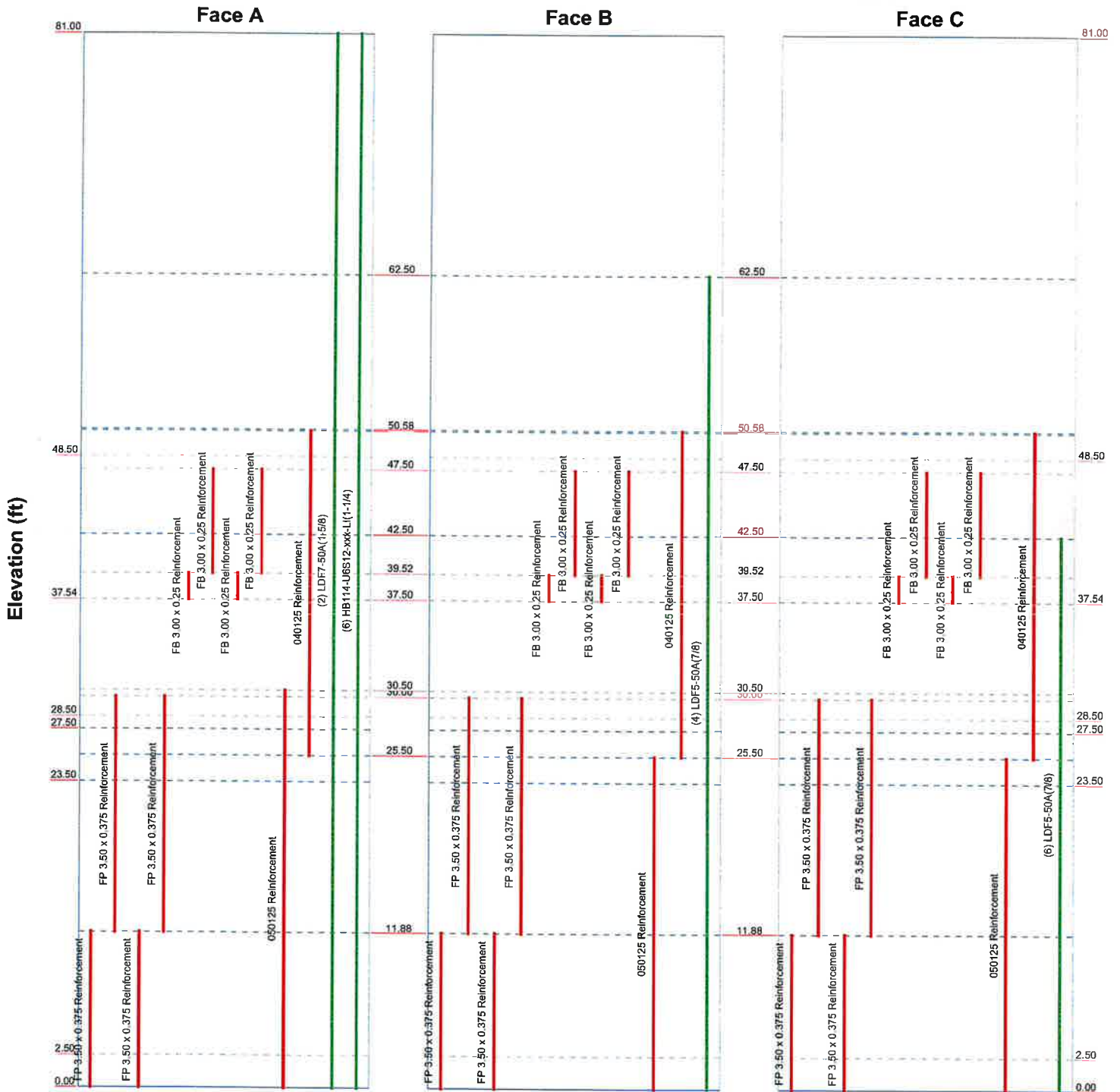
<p><b>Centerline Engineering Services, PA</b>                  750 W Center St, Suite 301                  West Bridgewater, MA 02379                  Phone: (781) 713-4725                  FAX:</p>	<p>Job: <b>Plainville 3 CT</b></p>		
	<p>Project: <b>23CLVZ-0021</b></p>		
	<p>Client: Verizon Wireless</p>	<p>Drawn by: jll</p>	<p>App'd:</p>
	<p>Code: TIA-222-H</p>	<p>Date: 03/15/24</p>	<p>Scale: NTS</p>
	<p>Path:</p>	<p>Dwg No. <b>E-4</b></p>	



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	Project: <b>23CLVZ-0021</b>		
	Client: Verizon Wireless	Drawn by: jll	App'd:
	Code: TIA-222-H	Date: 03/15/24	Scale: NTS
	Path:		Dwg No. E-5

# Feed Line Distribution Chart 0' - 81'

— Round   
 — Flat   
 — App In Face   
 — App Out Face   
 — Truss Leg

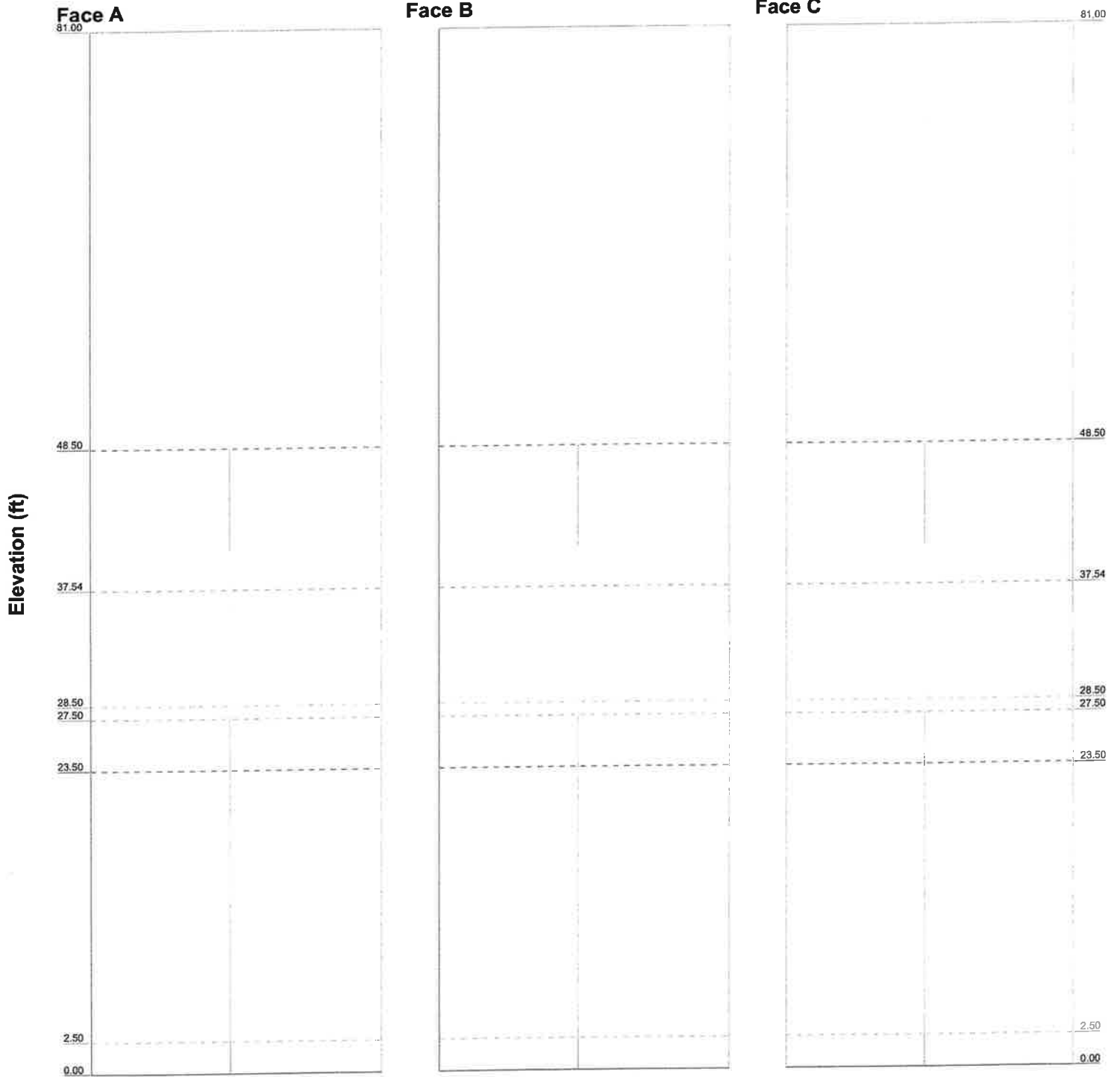


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FAX:		Client: Verizon Wireless	Drawn by: jll
Code: TIA-222-H	Date: 03/15/24	App'd:	Scale: NTS
Path:		Dwg No. E-7	

# Stress Distribution Chart

0' - 81'

█ > 100% █ 90%-100% █ 75%-90% █ 50%-75% █ < 50% Overstress



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FAX:

**Job: Plainville 3 CT**

Project: 23CLVZ-0021

Client: Verizon Wireless

Drawn by: jll

App'd:

Code: TIA-222-H

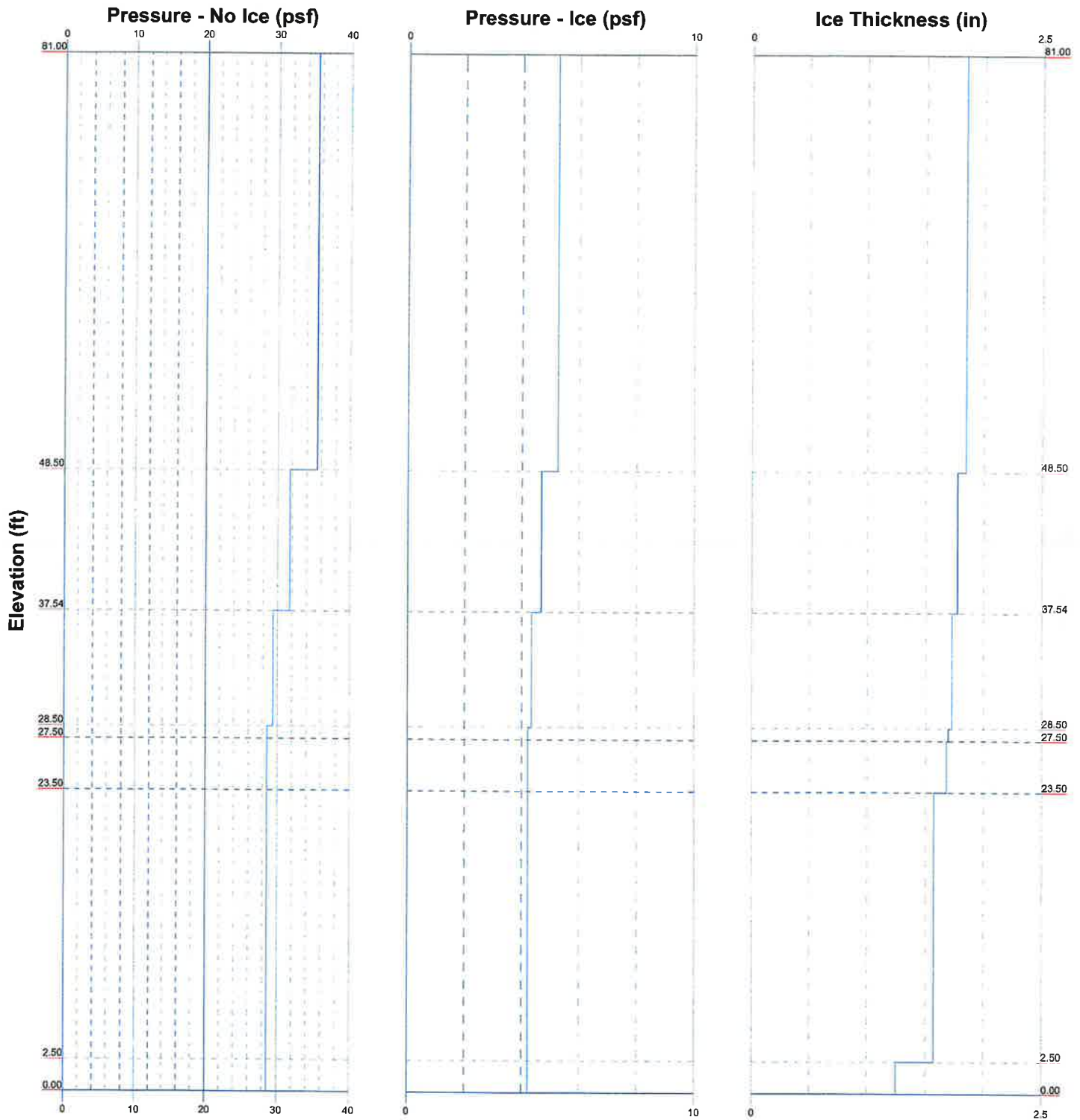
Date: 03/15/24

Scale: NTS

Path:

Dwg No: E-8

**Wind Pressures and Ice Thickness**  
**TIA-222-H - 130 mph/50 mph 1.5000 in Ice Exposure B**



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Phone: (781) 713-4725		Client: Verizon Wireless	Drawn by: jll
FAX:		Code: TIA-222-H	Date: 03/15/24
		Path:	Scale: NTS
			Dwg No. E-9



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	<b>Client</b> Verizon Wireless	<b>Designed by</b> jll

## Tower Input Data

The tower is a monopole.  
This tower is designed using the TIA-222-H standard.  
The following design criteria apply:  
Tower is located in Hartford County, Connecticut.  
Tower base elevation above sea level: 188.93 ft.  
Basic wind speed of 130 mph.  
Risk Category III.  
Exposure Category B.  
Simplified Topographic Factor Procedure for wind speed-up calculations is used.  
Topographic Category: 1.  
Crest Height: 0.00 ft.  
Nominal ice thickness of 1.5000 in.  
Ice thickness is considered to increase with height.  
Ice density of 56 pcf.  
A wind speed of 50 mph is used in combination with ice.  
Temperature drop of 50 °F.  
Deflections calculated using a wind speed of 60 mph.  
A non-linear (P-delta) analysis was used.  
Pressures are calculated at each section.  
Stress ratio used in pole design is 1.  
Tower analysis based on target reliabilities in accordance with Annex S.  
Load Modification Factors used:  $K_{es}(F_w) = 1.0$ ,  $K_{es}(t_i) = 1.0$ .  
Maximum demand-capacity ratio is: 1.  
Local bending stresses due to climbing loads, feed line supports, and appurtenance mounts are not considered.

## Options

- |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <ul style="list-style-type: none"> <li>Consider Moments - Legs</li> <li>Consider Moments - Horizontals</li> <li>Consider Moments - Diagonals</li> <li>Use Moment Magnification</li> <li>√ Use Code Stress Ratios</li> <li>√ Use Code Safety Factors - Guys</li> <li>Escalate Ice</li> <li>Always Use Max Kz</li> <li>Use Special Wind Profile</li> <li>Include Bolts In Member Capacity</li> <li>Leg Bolts Are At Top Of Section</li> <li>Secondary Horizontal Braces Leg</li> <li>Use Diamond Inner Bracing (4 Sided)</li> <li>SR Members Have Cut Ends</li> <li>SR Members Are Concentric</li> <li>Distribute Leg Loads As Uniform</li> </ul> | <ul style="list-style-type: none"> <li>Assume Legs Pinned</li> <li>√ Assume Rigid Index Plate</li> <li>√ Use Clear Spans For Wind Area</li> <li>Use Clear Spans For KL/r</li> <li>Retension Guys To Initial Tension</li> <li>√ Bypass Mast Stability Checks</li> <li>√ Use Azimuth Dish Coefficients</li> <li>√ Project Wind Area of Appurtenances</li> <li>Alternative Appurt. EPA Calculation</li> <li>Autocalc Torque Arm Areas</li> <li>Add IBC .6D+W Combination</li> <li>√ Sort Capacity Reports By Component</li> <li>Triangulate Diamond Inner Bracing</li> <li>Treat Feed Line Bundles As Cylinder</li> <li>Ignore KL/ry For 60 Deg. Angle Legs</li> <li>Use ASCE 10 X-Brace Ly Rules</li> </ul> | <ul style="list-style-type: none"> <li>Calculate Redundant Bracing Forces</li> <li>Ignore Redundant Members in FEA</li> <li>SR Leg Bolts Resist Compression</li> <li>All Leg Panels Have Same Allowable</li> <li>Offset Girt At Foundation</li> <li>√ Consider Feed Line Torque</li> <li>Include Angle Block Shear Check</li> <li>√ Use TIA-222-H Bracing Resist. Exemption</li> <li>Use TIA-222-H Tension Splice Exemption</li> <li style="text-align: center;">Poles</li> <li>√ Include Shear-Torsion Interaction</li> <li>Always Use Sub-Critical Flow</li> <li>Use Top Mounted Sockets</li> <li>Pole Without Linear Attachments</li> <li>Pole With Shroud Or No Appurtenances</li> <li>Outside and Inside Corner Radii Are Known</li> </ul> |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

## Tapered Pole Section Geometry

Section	Elevation	Section Length	Splice Length	Number of Sides	Top Diameter	Bottom Diameter	Wall Thickness	Bend Radius	Pole Grade
	ft	ft	ft		in	in	in	in	
L1	81.00-48.50	32.50	0.00	18	13.0000	17.6140	0.1875	0.7500	A572-65

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	<b>Client</b> Verizon Wireless	<b>Designed by</b> jll

Section	Elevation ft	Section Length ft	Splice Length ft	Number of Sides	Top Diameter in	Bottom Diameter in	Wall Thickness in	Bend Radius in	Pole Grade
L2	48.50-37.54	10.96	2.92	18	17.6140	19.1700	0.5100	2.0400	(65 ksi) Reinf 34.31 ksi
L3	37.54-28.50	11.96	0.00	18	17.7354	20.0416	0.5515	2.2060	(34 ksi) Reinf 34.47 ksi
L4	28.50-27.50	1.00	0.00	18	20.0416	20.1805	0.5534	2.2136	(34 ksi) Reinf 34.01 ksi
L5	27.50-23.50	4.00	0.00	18	20.1805	20.7360	0.4851	1.9404	(34 ksi) Reinf 36.44 ksi
L6	23.50-2.50	21.00	0.00	18	20.7360	23.6528	0.4857	1.9428	(36 ksi) Reinf 41.37 ksi
L7	2.50-0.00	2.50		18	23.6528	24.0000	0.4200	1.6800	(41 ksi) Reinf 59.86 ksi (60 ksi)

### Tapered Pole Properties

Section	Tip Dia. in	Area in <sup>2</sup>	I in <sup>4</sup>	r in	C in	I/C in <sup>3</sup>	J in <sup>4</sup>	I/J in <sup>2</sup>	w in	w/t
L1	13.1716	7.6250	158.1420	4.5484	6.6040	23.9464	316.4921	3.8132	1.9580	10.443
	17.8568	10.3709	397.9020	6.1864	8.9479	44.4687	796.3276	5.1865	2.7701	14.774
L2	17.8070	27.6869	1023.3109	6.0719	8.9479	114.3631	2047.9684	13.8461	2.2025	4.319
	19.3871	30.2057	1328.7689	6.6243	9.7384	136.4469	2659.2863	15.1057	2.4763	4.856
L3	18.4957	30.0798	1122.1696	6.1003	9.0096	124.5526	2245.8158	15.0428	2.1508	3.9
	20.2657	34.1167	1637.3144	6.9190	10.1811	160.8185	3276.7833	17.0616	2.5567	4.636
L4	20.2654	34.2309	1642.4748	6.9183	10.1811	161.3253	3287.1108	17.1187	2.5533	4.614
	20.4064	34.4748	1677.8454	6.9676	10.2517	163.6652	3357.8985	17.2407	2.5778	4.658
L5	20.4170	30.3252	1486.1754	6.9919	10.2517	144.9688	2974.3063	15.1655	2.6980	5.562
	20.9811	31.1805	1615.5062	7.1891	10.5339	153.3628	3233.1382	15.5932	2.7958	5.763
L6	20.9810	31.2181	1617.3606	7.1889	10.5339	153.5388	3236.8494	15.6120	2.7947	5.754
	23.9428	35.7147	2421.7399	8.2243	12.0156	201.5493	4846.6664	17.8607	3.3081	6.811
L7	23.9529	30.9712	2112.0214	8.2476	12.0156	175.7730	4226.8220	15.4885	3.4237	8.152
	24.3054	31.4340	2208.1322	8.3709	12.1920	181.1132	4419.1699	15.7200	3.4848	8.297

Tower Elevation ft	Gusset Area (per face) ft <sup>2</sup>	Gusset Thickness in	Gusset Grade	Adjust. Factor A <sub>f</sub>	Adjust. Factor A <sub>r</sub>	Weight Mult.	Double Angle Stitch Bolt Spacing Diagonals in	Double Angle Stitch Bolt Spacing Horizontals in	Double Angle Stitch Bolt Spacing Redundants in
L1 81.00-48.50				1	1	1			
L2 48.50-37.54				1	1	1			
L3 37.54-28.50				1	1	1			
L4 28.50-27.50				1	1	1			
L5 27.50-23.50				1	1	1			
L6 23.50-2.50				1	1	1			
L7 2.50-0.00				1	1	1			

### Feed Line/Linear Appurtenances - Entered As Round Or Flat

Description	Sector	Exclude From Torque Calculation	Component Type	Placement ft	Total Number	Number Per Row	Start/End Position	Width or Diameter in	Perimeter in	Weight plf
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Description	Sector	Exclude From Torque Calculation	Component Type	Placement ft	Total Number	Number Per Row	Start/End Position	Width or Diameter in	Perimeter in	Weight plf
FP 3.50 x 0.375 Reinforcement	A	No	Surface Af (CaAa)	11.88 - 0.00	1	1	0.000	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	A	No	Surface Af (CaAa)	30.00 - 11.88	1	1	0.000	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	A	No	Surface Af (CaAa)	11.88 - 0.00	1	1	-0.333	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	A	No	Surface Af (CaAa)	30.00 - 11.88	1	1	-0.333	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	C	No	Surface Af (CaAa)	11.88 - 0.00	1	1	0.167	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	C	No	Surface Af (CaAa)	30.00 - 11.88	1	1	0.167	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	C	No	Surface Af (CaAa)	11.88 - 0.00	1	1	-0.500	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	C	No	Surface Af (CaAa)	30.00 - 11.88	1	1	-0.500	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	B	No	Surface Af (CaAa)	11.88 - 0.00	1	1	0.167	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	B	No	Surface Af (CaAa)	30.00 - 11.88	1	1	0.167	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	B	No	Surface Af (CaAa)	11.88 - 0.00	1	1	-0.333	3.5000	7.7500	0.00
FP 3.50 x 0.375 Reinforcement	B	No	Surface Af (CaAa)	30.00 - 11.88	1	1	-0.333	3.5000	7.7500	0.00
FB 3.00 x 0.25 Reinforcement	A	No	Surface Ar (CaAa)	39.52 - 37.50	1	1	0.167	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	A	No	Surface Ar (CaAa)	47.50 - 39.52	1	1	0.167	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	A	No	Surface Ar (CaAa)	39.52 - 37.50	1	1	-0.333	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	A	No	Surface Ar (CaAa)	47.50 - 39.52	1	1	-0.333	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	C	No	Surface Ar (CaAa)	39.52 - 37.50	1	1	0.167	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	C	No	Surface Ar (CaAa)	47.50 - 39.52	1	1	0.167	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	C	No	Surface Ar (CaAa)	39.52 - 37.50	1	1	-0.333	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	C	No	Surface Ar (CaAa)	47.50 - 39.52	1	1	-0.333	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	B	No	Surface Ar (CaAa)	39.52 - 37.50	1	1	0.167	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	B	No	Surface Ar (CaAa)	47.50 - 39.52	1	1	0.167	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	B	No	Surface Ar (CaAa)	39.52 - 37.50	1	1	-0.333	3.0000		0.00
FB 3.00 x 0.25 Reinforcement	B	No	Surface Ar (CaAa)	47.50 - 39.52	1	1	-0.333	3.0000		0.00
*****										
050125 Reinforcement	A	No	Surface Ar (CaAa)	30.50 - 0.00	1	1	0.167	5.0000		0.00
050125 Reinforcement	C	No	Surface Ar (CaAa)	25.50 - 0.00	1	1	0.333	5.0000		0.00
050125 Reinforcement	B	No	Surface Ar (CaAa)	25.50 - 0.00	1	1	0.333	5.0000		0.00
040125 Reinforcement	A	No	Surface Ar (CaAa)	50.50 - 25.50	1	1	0.333	4.0000		0.00
040125 Reinforcement	C	No	Surface Ar (CaAa)	50.58 - 25.50	1	1	0.333	4.0000		0.00
040125 Reinforcement	B	No	Surface Ar (CaAa)	50.58 - 25.50	1	1	0.333	4.0000		0.00

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	<b>Client</b>	Verizon Wireless	<b>Designed by</b>	jll

Description	Sector	Exclude From Torque Calculation	Component Type	Placement ft	Total Number	Number Per Row	Start/End Position	Width or Diameter in	Perimeter in	Weight plf
			(CaAa)	25.50					0.333	

### Feed Line/Linear Appurtenances - Entered As Area

Description	Face or Leg	Allow Shield	Exclude From Torque Calculation	Component Type	Placement ft	Total Number		C <sub>AA</sub> ft <sup>2</sup> /ft	Weight plf
*****									
LDF7-50A(1-5/8)	A	No	No	Inside Pole	81.00 - 0.00	2	No Ice	0.00	0.82
							1/2" Ice	0.00	0.82
							1" Ice	0.00	0.82
							2" Ice	0.00	0.82
HB114-U6S12-xxx-LI(1-1/4)	A	No	No	Inside Pole	81.00 - 0.00	6	No Ice	0.00	1.70
							1/2" Ice	0.00	1.70
							1" Ice	0.00	1.70
							2" Ice	0.00	1.70
*****									
LDF5-50A(7/8)	B	No	No	Inside Pole	62.50 - 0.00	4	No Ice	0.00	0.33
							1/2" Ice	0.00	0.33
							1" Ice	0.00	0.33
							2" Ice	0.00	0.33
*****									
LDF5-50A(7/8)	C	No	No	Inside Pole	42.50 - 0.00	6	No Ice	0.00	0.33
							1/2" Ice	0.00	0.33
							1" Ice	0.00	0.33
							2" Ice	0.00	0.33

### Feed Line/Linear Appurtenances Section Areas

Tower Section	Tower Elevation ft	Face	A <sub>R</sub> ft <sup>2</sup>	A <sub>F</sub> ft <sup>2</sup>	C <sub>AA</sub> In Face ft <sup>2</sup>	C <sub>AA</sub> Out Face ft <sup>2</sup>	Weight K
L1	81.00-48.50	A	0.000	0.000	0.800	0.000	0.385
		B	0.000	0.000	0.832	0.000	0.018
		C	0.000	0.000	0.832	0.000	0.000
L2	48.50-37.54	A	0.000	0.000	10.360	0.000	0.130
		B	0.000	0.000	10.360	0.000	0.015
		C	0.000	0.000	10.360	0.000	0.010
L3	37.54-28.50	A	0.000	0.000	6.390	0.000	0.107
		B	0.000	0.000	5.390	0.000	0.012
		C	0.000	0.000	5.390	0.000	0.018
L4	28.50-27.50	A	0.000	0.000	2.067	0.000	0.012
		B	0.000	0.000	1.567	0.000	0.001
		C	0.000	0.000	1.567	0.000	0.002
L5	27.50-23.50	A	0.000	0.000	7.467	0.000	0.047
		B	0.000	0.000	6.467	0.000	0.005
		C	0.000	0.000	6.467	0.000	0.008
L6	23.50-2.50	A	0.000	0.000	35.000	0.000	0.249
		B	0.000	0.000	35.000	0.000	0.028
		C	0.000	0.000	35.000	0.000	0.042

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Tower Section	Tower Elevation ft	Face	$A_R$ ft <sup>2</sup>	$A_F$ ft <sup>2</sup>	$C_A A_A$ In Face ft <sup>2</sup>	$C_A A_A$ Out Face ft <sup>2</sup>	Weight K
L7	2.50-0.00	A	0.000	0.000	4.167	0.000	0.030
		B	0.000	0.000	4.167	0.000	0.003
		C	0.000	0.000	4.167	0.000	0.005

### Feed Line/Linear Appurtenances Section Areas - With Ice

Tower Section	Tower Elevation ft	Face or Leg	Ice Thickness in	$A_R$ ft <sup>2</sup>	$A_F$ ft <sup>2</sup>	$C_A A_A$ In Face ft <sup>2</sup>	$C_A A_A$ Out Face ft <sup>2</sup>	Weight K
L1	81.00-48.50	A	1.844	0.000	0.000	1.538	0.000	0.411
		B		0.000	0.000	1.599	0.000	0.046
		C		0.000	0.000	1.599	0.000	0.027
L2	48.50-37.54	A	1.771	0.000	0.000	21.298	0.000	0.472
		B		0.000	0.000	21.298	0.000	0.357
		C		0.000	0.000	21.298	0.000	0.352
L3	37.54-28.50	A	1.725	0.000	0.000	11.391	0.000	0.280
		B		0.000	0.000	9.683	0.000	0.156
		C		0.000	0.000	9.683	0.000	0.161
L4	28.50-27.50	A	1.697	0.000	0.000	3.424	0.000	0.056
		B		0.000	0.000	2.585	0.000	0.032
		C		0.000	0.000	2.585	0.000	0.033
L5	27.50-23.50	A	1.681	0.000	0.000	12.174	0.000	0.199
		B		0.000	0.000	10.501	0.000	0.130
		C		0.000	0.000	10.501	0.000	0.133
L6	23.50-2.50	A	1.569	0.000	0.000	54.427	0.000	0.864
		B		0.000	0.000	54.427	0.000	0.643
		C		0.000	0.000	54.427	0.000	0.657
L7	2.50-0.00	A	1.243	0.000	0.000	6.012	0.000	0.083
		B		0.000	0.000	6.012	0.000	0.057
		C		0.000	0.000	6.012	0.000	0.059

### Feed Line Center of Pressure

Section	Elevation ft	$CP_x$ in	$CP_z$ in	$CP_x$ Ice in	$CP_z$ Ice in
L1	81.00-48.50	0.0035	0.0097	0.0033	0.0092
L2	48.50-37.54	0.0000	0.0000	0.0000	0.0000
L3	37.54-28.50	-0.2969	-0.3307	-0.3378	-0.3775
L4	28.50-27.50	-0.7656	-0.8380	-0.8360	-0.9186
L5	27.50-23.50	-0.6326	-0.4429	-0.6963	-0.4855
L6	23.50-2.50	-0.5148	-0.0373	-0.5711	-0.0282
L7	2.50-0.00	-0.5374	-0.0413	-0.5901	-0.0344

Note: For pole sections, center of pressure calculations do not consider feed line shielding.

### Shielding Factor Ka

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Tower Section	Feed Line Record No.	Description	Feed Line Segment Elev.	K <sub>a</sub> No Ice	K <sub>a</sub> Ice
L1	29	040125 Reinforcement	48.50 - 50.50	1.0000	1.0000
L1	30	040125 Reinforcement	48.50 - 50.58	1.0000	1.0000
L1	31	040125 Reinforcement	48.50 - 50.58	1.0000	1.0000
L2	13	FB 3.00 x 0.25 Reinforcement	37.54 - 39.52	1.0000	1.0000
L2	14	FB 3.00 x 0.25 Reinforcement	39.52 - 47.50	1.0000	1.0000
L2	15	FB 3.00 x 0.25 Reinforcement	37.54 - 39.52	1.0000	1.0000
L2	16	FB 3.00 x 0.25 Reinforcement	39.52 - 47.50	1.0000	1.0000
L2	17	FB 3.00 x 0.25 Reinforcement	37.54 - 39.52	1.0000	1.0000
L2	18	FB 3.00 x 0.25 Reinforcement	39.52 - 47.50	1.0000	1.0000
L2	19	FB 3.00 x 0.25 Reinforcement	37.54 - 39.52	1.0000	1.0000
L2	20	FB 3.00 x 0.25 Reinforcement	39.52 - 47.50	1.0000	1.0000
L2	21	FB 3.00 x 0.25 Reinforcement	37.54 - 39.52	1.0000	1.0000
L2	22	FB 3.00 x 0.25 Reinforcement	39.52 - 47.50	1.0000	1.0000
L2	23	FB 3.00 x 0.25 Reinforcement	37.54 - 39.52	1.0000	1.0000
L2	24	FB 3.00 x 0.25 Reinforcement	39.52 - 47.50	1.0000	1.0000
L2	29	040125 Reinforcement	37.54 - 48.50	1.0000	1.0000
L2	30	040125 Reinforcement	37.54 - 48.50	1.0000	1.0000
L2	31	040125 Reinforcement	37.54 - 48.50	1.0000	1.0000
L3	2	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	1.0000	1.0000
L3	4	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	1.0000	1.0000
L3	6	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	1.0000	1.0000
L3	8	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	1.0000	1.0000
L3	10	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	1.0000	1.0000
L3	12	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	1.0000	1.0000
L3	13	FB 3.00 x 0.25 Reinforcement	37.50 - 37.54	1.0000	1.0000
L3	15	FB 3.00 x 0.25 Reinforcement	37.50 - 37.54	1.0000	1.0000
L3	17	FB 3.00 x 0.25 Reinforcement	37.50 - 37.54	1.0000	1.0000
L3	19	FB 3.00 x 0.25 Reinforcement	37.50 - 37.54	1.0000	1.0000
L3	21	FB 3.00 x 0.25 Reinforcement	37.50 - 37.54	1.0000	1.0000
L3	23	FB 3.00 x 0.25 Reinforcement	37.50 - 37.54	1.0000	1.0000
L3	26	050125 Reinforcement	28.50 - 30.50	1.0000	1.0000
L3	29	040125 Reinforcement	28.50 - 37.54	1.0000	1.0000
L3	30	040125 Reinforcement	28.50 - 37.54	1.0000	1.0000
L3	31	040125 Reinforcement	28.50 - 37.54	1.0000	1.0000
L4	2	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	1.0000	1.0000
L4	4	FP 3.50 x 0.375	27.50 - 28.50	1.0000	1.0000

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Tower Section	Feed Line Record No.	Description	Feed Line Segment Elev.	K <sub>a</sub> No Ice	K <sub>a</sub> Ice
L4	6	Reinforcement FP 3.50 x 0.375	27.50 - 28.50	1.0000	1.0000
L4	8	Reinforcement FP 3.50 x 0.375	27.50 - 28.50	1.0000	1.0000
L4	10	Reinforcement FP 3.50 x 0.375	27.50 - 28.50	1.0000	1.0000
L4	12	Reinforcement FP 3.50 x 0.375	27.50 - 28.50	1.0000	1.0000
L4	26	050125 Reinforcement	27.50 - 28.50	1.0000	1.0000
L4	29	040125 Reinforcement	27.50 - 28.50	1.0000	1.0000
L4	30	040125 Reinforcement	27.50 - 28.50	1.0000	1.0000
L4	31	040125 Reinforcement	27.50 - 28.50	1.0000	1.0000
L5	2	Reinforcement FP 3.50 x 0.375	23.50 - 27.50	1.0000	1.0000
L5	4	Reinforcement FP 3.50 x 0.375	23.50 - 27.50	1.0000	1.0000
L5	6	Reinforcement FP 3.50 x 0.375	23.50 - 27.50	1.0000	1.0000
L5	8	Reinforcement FP 3.50 x 0.375	23.50 - 27.50	1.0000	1.0000
L5	10	Reinforcement FP 3.50 x 0.375	23.50 - 27.50	1.0000	1.0000
L5	12	Reinforcement FP 3.50 x 0.375	23.50 - 27.50	1.0000	1.0000
L5	26	050125 Reinforcement	23.50 - 27.50	1.0000	1.0000
L5	27	050125 Reinforcement	23.50 - 25.50	1.0000	1.0000
L5	28	050125 Reinforcement	23.50 - 25.50	1.0000	1.0000
L5	29	040125 Reinforcement	25.50 - 27.50	1.0000	1.0000
L5	30	040125 Reinforcement	25.50 - 27.50	1.0000	1.0000
L5	31	040125 Reinforcement	25.50 - 27.50	1.0000	1.0000
L6	1	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	1.0000	1.0000
L6	2	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	1.0000	1.0000
L6	3	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	1.0000	1.0000
L6	4	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	1.0000	1.0000
L6	5	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	1.0000	1.0000
L6	6	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	1.0000	1.0000
L6	7	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	1.0000	1.0000
L6	8	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	1.0000	1.0000
L6	9	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	1.0000	1.0000
L6	10	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	1.0000	1.0000
L6	11	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	1.0000	1.0000
L6	12	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	1.0000	1.0000
L6	26	050125 Reinforcement	2.50 - 23.50	1.0000	1.0000
L6	27	050125 Reinforcement	2.50 - 23.50	1.0000	1.0000
L6	28	050125 Reinforcement	2.50 - 23.50	1.0000	1.0000
L7	1	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	1.0000	1.0000
L7	3	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	1.0000	1.0000

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Tower Section	Feed Line Record No.	Description	Feed Line Segment Elev.	K <sub>a</sub> No Ice	K <sub>a</sub> Ice
L7	5	FP 3.50 x 0.375 Reinforcement	0.00 - 2.50	1.0000	1.0000
L7	7	FP 3.50 x 0.375 Reinforcement	0.00 - 2.50	1.0000	1.0000
L7	9	FP 3.50 x 0.375 Reinforcement	0.00 - 2.50	1.0000	1.0000
L7	11	FP 3.50 x 0.375 Reinforcement	0.00 - 2.50	1.0000	1.0000
L7	26	050125 Reinforcement	0.00 - 2.50	1.0000	1.0000
L7	27	050125 Reinforcement	0.00 - 2.50	1.0000	1.0000
L7	28	050125 Reinforcement	0.00 - 2.50	1.0000	1.0000

### Effective Width of Flat Linear Attachments / Feed Lines

Tower Section	Attachment Record No.	Description	Attachment Segment Elev.	Ratio Calculation Method	Effective Width Ratio
L3	2	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	Manual	1.0000
L3	4	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	Manual	1.0000
L3	6	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	Manual	1.0000
L3	8	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	Manual	1.0000
L3	10	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	Manual	1.0000
L3	12	FP 3.50 x 0.375 Reinforcement	28.50 - 30.00	Manual	1.0000
L4	2	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	Manual	1.0000
L4	4	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	Manual	1.0000
L4	6	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	Manual	1.0000
L4	8	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	Manual	1.0000
L4	10	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	Manual	1.0000
L4	12	FP 3.50 x 0.375 Reinforcement	27.50 - 28.50	Manual	1.0000
L5	2	FP 3.50 x 0.375 Reinforcement	23.50 - 27.50	Manual	1.0000
L5	4	FP 3.50 x 0.375 Reinforcement	23.50 - 27.50	Manual	1.0000
L5	6	FP 3.50 x 0.375 Reinforcement	23.50 - 27.50	Manual	1.0000
L5	8	FP 3.50 x 0.375 Reinforcement	23.50 - 27.50	Manual	1.0000
L5	10	FP 3.50 x 0.375 Reinforcement	23.50 - 27.50	Manual	1.0000
L5	12	FP 3.50 x 0.375 Reinforcement	23.50 - 27.50	Manual	1.0000
L6	1	FP 3.50 x 0.375	2.50 - 11.88	Manual	1.0000



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Tower Section	Attachment Record No.	Description	Attachment Segment Elev.	Ratio Calculation Method	Effective Width Ratio
L6	2	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	Manual	1.0000
L6	3	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	Manual	1.0000
L6	4	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	Manual	1.0000
L6	5	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	Manual	1.0000
L6	6	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	Manual	1.0000
L6	7	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	Manual	1.0000
L6	8	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	Manual	1.0000
L6	9	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	Manual	1.0000
L6	10	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	Manual	1.0000
L6	11	Reinforcement FP 3.50 x 0.375	2.50 - 11.88	Manual	1.0000
L6	12	Reinforcement FP 3.50 x 0.375	11.88 - 23.50	Manual	1.0000
L7	1	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	Manual	1.0000
L7	3	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	Manual	1.0000
L7	5	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	Manual	1.0000
L7	7	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	Manual	1.0000
L7	9	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	Manual	1.0000
L7	11	Reinforcement FP 3.50 x 0.375	0.00 - 2.50	Manual	1.0000

### Discrete Tower Loads

Description	Face or Leg	Offset Type	Offsets: Horz Lateral Vert ft ft ft	Azimuth Adjustment °	Placement ft	C <sub>AA</sub> Front ft <sup>2</sup>	C <sub>AA</sub> Side ft <sup>2</sup>	Weight K	
(2) SBNHH-1D65B w/ Mount Pipe	A	From Face	4.00	0.0000	78.00	No Ice	8.39	7.08	0.076
			0.00			1/2" Ice	8.95	8.28	0.146
			3.00			1" Ice	9.48	9.19	0.223
						2" Ice	10.56	11.03	0.404
(2) SBNHH-1D65B w/ Mount Pipe	B	From Face	4.00	0.0000	78.00	No Ice	8.39	7.08	0.076
			0.00			1/2" Ice	8.95	8.28	0.146
			3.00			1" Ice	9.48	9.19	0.223
						2" Ice	10.56	11.03	0.404
(2) SBNHH-1D65B w/	C	From Face	4.00	0.0000	78.00	No Ice	8.39	7.08	0.076

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Description	Face or Leg	Offset Type	Offsets: Horz Lateral Vert ft ft ft	Azimuth Adjustment °	Placement ft	C <sub>A</sub> A <sub>Front</sub> ft <sup>2</sup>	C <sub>A</sub> A <sub>Side</sub> ft <sup>2</sup>	Weight K	
Mount Pipe			0.00 3.00		1/2" Ice	8.95	8.28	0.146	
					1" Ice	9.48	9.19	0.223	
					2" Ice	10.56	11.03	0.404	
BXA-70063-4CF w/ Mount Pipe	A	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	4.95 5.32	3.69 4.29	0.028 0.070
						1" Ice	5.71	4.91	0.118
						2" Ice	6.51	6.18	0.235
BXA-70063-4CF w/ Mount Pipe	B	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	4.95 5.32	3.69 4.29	0.028 0.070
						1" Ice	5.71	4.91	0.118
						2" Ice	6.51	6.18	0.235
BXA-70063-4CF w/ Mount Pipe	C	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	4.95 5.32	3.69 4.29	0.028 0.070
						1" Ice	5.71	4.91	0.118
						2" Ice	6.51	6.18	0.235
nL-Sub6 w/ Pipe Mount	A	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	4.71 5.01	2.43 2.84	0.098 0.135
						1" Ice	5.31	3.26	0.178
						2" Ice	5.93	4.17	0.279
nL-Sub6 w/ Pipe Mount	B	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	4.71 5.01	2.43 2.84	0.098 0.135
						1" Ice	5.31	3.26	0.178
						2" Ice	5.93	4.17	0.279
nL-Sub6 w/ Pipe Mount	C	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	4.71 5.01	2.43 2.84	0.098 0.135
						1" Ice	5.31	3.26	0.178
						2" Ice	5.93	4.17	0.279
B2/B66A RRH-BR049 (RFV01U-D1A)	A	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	1.88 2.05	1.25 1.39	0.084 0.103
						1" Ice	2.22	1.54	0.124
						2" Ice	2.60	1.86	0.175
B2/B66A RRH-BR049 (RFV01U-D1A)	B	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	1.88 2.05	1.25 1.39	0.084 0.103
						1" Ice	2.22	1.54	0.124
						2" Ice	2.60	1.86	0.175
B2/B66A RRH-BR049 (RFV01U-D1A)	C	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	1.88 2.05	1.25 1.39	0.084 0.103
						1" Ice	2.22	1.54	0.124
						2" Ice	2.60	1.86	0.175
B5/B13 RRH-BR04C (RFV01U-D2A)	A	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	1.88 2.05	1.01 1.14	0.070 0.087
						1" Ice	2.22	1.28	0.106
						2" Ice	2.60	1.59	0.153
B5/B13 RRH-BR04C (RFV01U-D2A)	B	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	1.88 2.05	1.01 1.14	0.070 0.087
						1" Ice	2.22	1.28	0.106
						2" Ice	2.60	1.59	0.153
B5/B13 RRH-BR04C (RFV01U-D2A)	C	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	1.88 2.05	1.01 1.14	0.070 0.087
						1" Ice	2.22	1.28	0.106
						2" Ice	2.60	1.59	0.153
BSAMNT-SBS-1-2	A	From Face	4.00 0.00 3.00	0.0000	78.00	No Ice 1/2" Ice	0.00 0.00	0.00 0.00	0.026 0.032
						1" Ice	0.00	0.00	0.038
						2" Ice	0.00	0.00	0.050
BSAMNT-SBS-1-2	B	From Face	4.00 0.00	0.0000	78.00	No Ice 1/2" Ice	0.00 0.00	0.00 0.00	0.026 0.032

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Description	Face or Leg	Offset Type	Offsets: Horz Lateral Vert ft ft ft	Azimuth Adjustment °	Placement ft	CAAs Front ft²	CAAs Side ft²	Weight K
			3.00			1" Ice 0.00	0.00	0.038
						2" Ice 0.00	0.00	0.050
BSAMNT-SBS-1-2	C	From Face	4.00	0.0000	78.00	No Ice 0.00	0.00	0.026
			0.00			1/2" Ice 0.00	0.00	0.032
			3.00			1" Ice 0.00	0.00	0.038
						2" Ice 0.00	0.00	0.050
RRFDC-3315-PF-48	A	From Face	4.00	0.0000	78.00	No Ice 3.36	2.19	0.032
			0.00			1/2" Ice 3.60	2.39	0.061
			3.00			1" Ice 3.84	2.61	0.093
						2" Ice 4.34	3.05	0.168
DB-B1-6C-12AB-0Z	B	From Face	4.00	0.0000	78.00	No Ice 3.36	2.19	0.021
			0.00			1/2" Ice 3.60	2.39	0.050
			3.00			1" Ice 3.84	2.61	0.082
						2" Ice 4.34	3.05	0.158
(2) KA-6030	C	From Face	4.00	0.0000	78.00	No Ice 0.77	0.28	0.030
			0.00			1/2" Ice 0.88	0.35	0.033
			3.00			1" Ice 1.00	0.43	0.041
						2" Ice 1.26	0.61	0.063
RRUDSM	C	From Face	4.00	0.0000	78.00	No Ice 1.12	1.12	0.040
			0.00			1/2" Ice 1.69	1.69	0.090
			3.00			1" Ice 2.26	2.26	0.140
						2" Ice 3.40	3.40	0.240
17.47' Platform Mount w/ Kickers	C	None		0.0000	78.00	No Ice 34.83	34.83	3.675
						1/2" Ice 42.61	42.61	4.495
						1" Ice 50.39	50.39	5.315
						2" Ice 65.95	65.95	6.955
*****								
20' 4-Bay Dipole	A	From Face	4.00	0.0000	62.50	No Ice 4.00	4.00	0.055
			0.00			1/2" Ice 6.00	6.00	0.100
			10.00			1" Ice 8.00	8.00	0.145
						2" Ice 12.00	12.00	0.235
(2) 4' x 2" Omni	A	From Face	4.00	0.0000	62.50	No Ice 0.79	0.79	0.005
			0.00			1/2" Ice 1.03	1.03	0.011
			3.00			1" Ice 1.27	1.27	0.017
						2" Ice 1.76	1.76	0.029
10' x 3" Omni	B	From Face	4.00	0.0000	62.50	No Ice 3.00	3.00	0.020
			0.00			1/2" Ice 4.03	4.03	0.042
			5.00			1" Ice 5.07	5.07	0.064
						2" Ice 7.13	7.13	0.108
Platform Mount	C	None		0.0000	62.50	No Ice 23.61	23.61	3.400
						1/2" Ice 28.39	28.39	4.079
						1" Ice 33.17	33.17	4.758
						2" Ice 42.73	42.73	6.116
*****								
10' 2-Bay Dipole	B	From Face	4.00	0.0000	42.50	No Ice 2.00	2.00	0.028
			5.00			1/2" Ice 3.00	3.00	0.050
			5.00			1" Ice 4.00	4.00	0.072
						2" Ice 6.00	6.00	0.116
10' 2-Bay Dipole	B	From Face	4.00	0.0000	42.50	No Ice 2.00	2.00	0.028
			-5.00			1/2" Ice 3.00	3.00	0.050
			5.00			1" Ice 4.00	4.00	0.072
						2" Ice 6.00	6.00	0.116
10' 2-Bay Dipole	B	From Face	4.00	0.0000	42.50	No Ice 2.00	2.00	0.028
			-5.00			1/2" Ice 3.00	3.00	0.050
			-2.00			1" Ice 4.00	4.00	0.072
						2" Ice 6.00	6.00	0.116
3' Yagi	B	From Face	4.00	0.0000	42.50	No Ice 3.67	0.50	0.010

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Description	Face or Leg	Offset Type	Offsets: Horz Lateral Vert	Azimuth Adjustment	Placement	C <sub>A</sub> A <sub>A</sub> Front	C <sub>A</sub> A <sub>A</sub> Side	Weight	
			ft ft ft		ft	ft <sup>2</sup>	ft <sup>2</sup>	K	
			0.00			1/2" Ice	3.93	0.81	0.027
			4.00			1" Ice	4.19	1.11	0.044
						2" Ice	4.71	1.73	0.078
3' Yagi	A	From Face	4.00	0.0000	42.50	No Ice	3.67	0.50	0.010
			0.00			1/2" Ice	3.93	0.81	0.027
			4.00			1" Ice	4.19	1.11	0.044
						2" Ice	4.71	1.73	0.078
10' x 3" Omni	A	From Face	4.00	0.0000	42.50	No Ice	3.00	3.00	0.020
			5.00			1/2" Ice	4.03	4.03	0.042
			8.00			1" Ice	5.07	5.07	0.064
						2" Ice	7.13	7.13	0.108
Platform Mount	C	None		0.0000	42.50	No Ice	23.61	23.61	3.400
						1/2" Ice	28.39	28.39	4.079
						1" Ice	33.17	33.17	4.758
						2" Ice	42.73	42.73	6.116

## Load Combinations

Comb. No.	Description
1	Dead Only
2	1.2 Dead+1.0 Wind 0 deg - No Ice
3	0.9 Dead+1.0 Wind 0 deg - No Ice
4	1.2 Dead+1.0 Wind 30 deg - No Ice
5	0.9 Dead+1.0 Wind 30 deg - No Ice
6	1.2 Dead+1.0 Wind 60 deg - No Ice
7	0.9 Dead+1.0 Wind 60 deg - No Ice
8	1.2 Dead+1.0 Wind 90 deg - No Ice
9	0.9 Dead+1.0 Wind 90 deg - No Ice
10	1.2 Dead+1.0 Wind 120 deg - No Ice
11	0.9 Dead+1.0 Wind 120 deg - No Ice
12	1.2 Dead+1.0 Wind 150 deg - No Ice
13	0.9 Dead+1.0 Wind 150 deg - No Ice
14	1.2 Dead+1.0 Wind 180 deg - No Ice
15	0.9 Dead+1.0 Wind 180 deg - No Ice
16	1.2 Dead+1.0 Wind 210 deg - No Ice
17	0.9 Dead+1.0 Wind 210 deg - No Ice
18	1.2 Dead+1.0 Wind 240 deg - No Ice
19	0.9 Dead+1.0 Wind 240 deg - No Ice
20	1.2 Dead+1.0 Wind 270 deg - No Ice
21	0.9 Dead+1.0 Wind 270 deg - No Ice
22	1.2 Dead+1.0 Wind 300 deg - No Ice
23	0.9 Dead+1.0 Wind 300 deg - No Ice
24	1.2 Dead+1.0 Wind 330 deg - No Ice
25	0.9 Dead+1.0 Wind 330 deg - No Ice
26	1.2 Dead+1.0 Ice+1.0 Temp
27	1.2 Dead+1.0 Wind 0 deg+1.0 Ice+1.0 Temp
28	1.2 Dead+1.0 Wind 30 deg+1.0 Ice+1.0 Temp
29	1.2 Dead+1.0 Wind 60 deg+1.0 Ice+1.0 Temp
30	1.2 Dead+1.0 Wind 90 deg+1.0 Ice+1.0 Temp
31	1.2 Dead+1.0 Wind 120 deg+1.0 Ice+1.0 Temp

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Comb. No.	Description
32	1.2 Dead+1.0 Wind 150 deg+1.0 Ice+1.0 Temp
33	1.2 Dead+1.0 Wind 180 deg+1.0 Ice+1.0 Temp
34	1.2 Dead+1.0 Wind 210 deg+1.0 Ice+1.0 Temp
35	1.2 Dead+1.0 Wind 240 deg+1.0 Ice+1.0 Temp
36	1.2 Dead+1.0 Wind 270 deg+1.0 Ice+1.0 Temp
37	1.2 Dead+1.0 Wind 300 deg+1.0 Ice+1.0 Temp
38	1.2 Dead+1.0 Wind 330 deg+1.0 Ice+1.0 Temp
39	Dead+Wind 0 deg - Service
40	Dead+Wind 30 deg - Service
41	Dead+Wind 60 deg - Service
42	Dead+Wind 90 deg - Service
43	Dead+Wind 120 deg - Service
44	Dead+Wind 150 deg - Service
45	Dead+Wind 180 deg - Service
46	Dead+Wind 210 deg - Service
47	Dead+Wind 240 deg - Service
48	Dead+Wind 270 deg - Service
49	Dead+Wind 300 deg - Service
50	Dead+Wind 330 deg - Service

### Maximum Member Forces

Section No.	Elevation ft	Component Type	Condition	Gov. Load Comb.	Axial K	Major Axis Moment kip-ft	Minor Axis Moment kip-ft
L1	81 - 48.5	Pole	Max Tension	48	0.000	-0.000	-0.000
			Max. Compression	26	-23.327	0.874	0.098
			Max. Mx	20	-11.605	211.323	-0.191
			Max. My	14	-11.608	0.253	-210.901
			Max. Vy	20	-7.944	211.323	-0.191
			Max. Vx	2	-7.934	0.253	210.574
			Max. Torque	9		1.989	
			Max Tension	1	0.000	0.000	0.000
L2	48.5 - 37.54	Pole	Max. Compression	26	-32.577	-0.066	2.485
			Max. Mx	8	-16.861	-283.277	0.335
			Max. My	2	-16.868	-0.012	282.714
			Max. Vy	8	10.269	-283.277	0.335
			Max. Vx	2	-10.165	-0.012	282.714
			Max. Torque	8		4.023	
			Max Tension	1	0.000	0.000	0.000
			Max. Compression	26	-36.109	-0.043	2.598
L3	37.54 - 28.5	Pole	Max. Mx	8	-19.086	-411.887	0.383
			Max. My	2	-19.091	-0.013	410.080
			Max. Vy	8	11.167	-411.887	0.383
			Max. Vx	2	-11.054	-0.013	410.080
			Max. Torque	8		4.026	
			Max Tension	1	0.000	0.000	0.000
			Max. Compression	26	-36.419	-0.032	2.610
			Max. Mx	8	-19.254	-423.078	0.386
L4	28.5 - 27.5	Pole	Max. My	2	-19.260	-0.014	421.155
			Max. Vy	8	11.238	-423.078	0.386
			Max. Vx	2	-11.120	-0.014	421.155
			Max. Torque	8		4.028	
			Max Tension	1	0.000	0.000	0.000
			Max. Compression	26	-37.579	-0.013	2.640
			Max. Mx	8	-19.882	-468.357	0.396
			Max. My	2	-19.884	-0.014	466.093
L5	27.5 - 23.5	Pole	Max. Vy	8	11.427	-468.357	0.396
			Max. Vx	2	-11.376	-0.014	466.093

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Section No.	Elevation ft	Component Type	Condition	Gov. Load Comb.	Axial K	Major Axis Moment kip-ft	Minor Axis Moment kip-ft
L6	23.5 - 2.5	Pole	Max. Torque	8			4.028
			Max Tension	1	0.000	0.000	0.000
			Max. Compression	26	-43.642	-0.040	2.629
			Max. Mx	8	-23.468	-718.093	0.406
			Max. My	2	-23.466	-0.015	718.762
			Max. Vy	8	12.388	-718.093	0.406
			Max. Vx	2	-12.727	-0.015	718.762
L7	2.5 - 0	Pole	Max. Torque	8			4.026
			Max Tension	1	0.000	0.000	0.000
			Max. Compression	26	-44.264	-0.043	2.624
			Max. Mx	8	-23.880	-749.141	0.402
			Max. My	2	-23.879	-0.015	750.715
			Max. Vy	8	12.494	-749.141	0.402
			Max. Vx	2	-12.879	-0.015	750.715
		Max. Torque	8			4.021	

### Maximum Reactions

Location	Condition	Gov. Load Comb.	Vertical K	Horizontal, X K	Horizontal, Z K
Pole	Max. Vert	28	44.264	-1.571	2.722
	Max. H <sub>x</sub>	21	17.920	12.469	0.000
	Max. H <sub>z</sub>	2	23.893	-0.000	12.853
	Max. M <sub>x</sub>	2	750.715	-0.000	12.853
	Max. M <sub>z</sub>	8	749.141	-12.469	0.000
	Max. Torsion	8	4.020	-12.469	0.000
	Min. Vert	13	17.920	-6.439	-11.153
	Min. H <sub>x</sub>	9	17.920	-12.469	0.000
	Min. H <sub>z</sub>	14	23.893	-0.000	-12.853
	Min. M <sub>x</sub>	14	-749.785	-0.000	-12.853
	Min. M <sub>z</sub>	20	-749.114	12.469	0.000
	Min. Torsion	20	-4.020	12.469	0.000

### Tower Mast Reaction Summary

Load Combination	Vertical K	Shear <sub>x</sub> K	Shear <sub>z</sub> K	Overturning Moment, M <sub>x</sub> kip-ft	Overturning Moment, M <sub>z</sub> kip-ft	Torque kip-ft
Dead Only	19.911	0.000	0.000	-0.364	-0.018	0.000
1.2 Dead+1.0 Wind 0 deg - No Ice	23.893	0.000	-12.853	-750.715	-0.015	0.083
0.9 Dead+1.0 Wind 0 deg - No Ice	17.920	0.000	-12.853	-736.023	-0.014	0.077
1.2 Dead+1.0 Wind 30 deg - No Ice	23.893	6.654	-11.525	-657.023	-379.067	0.089
0.9 Dead+1.0 Wind 30 deg - No Ice	17.920	6.654	-11.525	-644.226	-371.751	0.086
1.2 Dead+1.0 Wind 60 deg - No Ice	23.893	11.257	-6.499	-379.292	-656.225	-2.259
0.9 Dead+1.0 Wind 60 deg - No Ice	17.920	11.257	-6.499	-371.845	-643.516	-2.261
1.2 Dead+1.0 Wind 90 deg - No Ice	23.893	12.469	-0.000	-0.401	-749.141	-4.020

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<i>Load Combination</i>	<i>Vertical</i>	<i>Shear<sub>x</sub></i>	<i>Shear<sub>z</sub></i>	<i>Overturning Moment, M<sub>x</sub></i>	<i>Overturning Moment, M<sub>z</sub></i>	<i>Torque</i>
	K	K	K	kip-ft	kip-ft	kip-ft
Ice						
0.9 Dead+1.0 Wind 90 deg - No Ice	17.920	12.469	-0.000	-0.299	-734.524	-4.020
1.2 Dead+1.0 Wind 120 deg - No Ice	23.893	11.232	6.485	377.193	-654.075	-2.338
0.9 Dead+1.0 Wind 120 deg - No Ice	17.920	11.232	6.485	369.984	-641.396	-2.334
1.2 Dead+1.0 Wind 150 deg - No Ice	23.893	6.439	11.153	649.725	-375.414	-0.025
0.9 Dead+1.0 Wind 150 deg - No Ice	17.920	6.439	11.153	637.220	-368.119	-0.018
1.2 Dead+1.0 Wind 180 deg - No Ice	23.893	0.000	12.853	749.785	-0.015	-0.083
0.9 Dead+1.0 Wind 180 deg - No Ice	17.920	0.000	12.853	735.336	-0.014	-0.077
1.2 Dead+1.0 Wind 210 deg - No Ice	23.893	-6.654	11.525	656.084	379.056	-0.089
0.9 Dead+1.0 Wind 210 deg - No Ice	17.920	-6.654	11.525	643.532	371.737	-0.086
1.2 Dead+1.0 Wind 240 deg - No Ice	23.893	-11.257	6.499	378.417	656.167	2.259
0.9 Dead+1.0 Wind 240 deg - No Ice	17.920	-11.257	6.499	371.196	643.468	2.261
1.2 Dead+1.0 Wind 270 deg - No Ice	23.893	-12.469	-0.000	-0.401	749.114	4.020
0.9 Dead+1.0 Wind 270 deg - No Ice	17.920	-12.469	-0.000	-0.299	734.499	4.020
1.2 Dead+1.0 Wind 300 deg - No Ice	23.893	-11.232	-6.485	-378.070	654.078	2.338
0.9 Dead+1.0 Wind 300 deg - No Ice	17.920	-11.232	-6.485	-370.634	641.392	2.334
1.2 Dead+1.0 Wind 330 deg - No Ice	23.893	-6.439	-11.153	-650.665	375.367	0.025
0.9 Dead+1.0 Wind 330 deg - No Ice	17.920	-6.439	-11.153	-637.915	368.080	0.018
1.2 Dead+1.0 Ice+1.0 Temp	44.264	-0.000	-0.000	-2.624	-0.043	0.000
1.2 Dead+1.0 Wind 0 deg+1.0 Ice+1.0 Temp	44.264	-0.000	-3.037	-201.167	-0.044	0.044
1.2 Dead+1.0 Wind 30 deg+1.0 Ice+1.0 Temp	44.264	1.571	-2.722	-176.870	-100.626	-0.301
1.2 Dead+1.0 Wind 60 deg+1.0 Ice+1.0 Temp	44.264	2.599	-1.501	-102.027	-172.165	-0.765
1.2 Dead+1.0 Wind 90 deg+1.0 Ice+1.0 Temp	44.264	2.919	-0.000	-2.652	-198.262	-1.031
1.2 Dead+1.0 Wind 120 deg+1.0 Ice+1.0 Temp	44.264	2.629	1.518	96.788	-172.281	-0.810
1.2 Dead+1.0 Wind 150 deg+1.0 Ice+1.0 Temp	44.264	1.527	2.645	170.140	-99.808	-0.371
1.2 Dead+1.0 Wind 180 deg+1.0 Ice+1.0 Temp	44.264	-0.000	3.037	195.848	-0.044	-0.043
1.2 Dead+1.0 Wind 210 deg+1.0 Ice+1.0 Temp	44.264	-1.571	2.722	171.553	100.536	0.301
1.2 Dead+1.0 Wind 240 deg+1.0 Ice+1.0 Temp	44.264	-2.599	1.501	96.718	172.073	0.765
1.2 Dead+1.0 Wind 270 deg+1.0 Ice+1.0 Temp	44.264	-2.919	-0.000	-2.652	198.176	1.032
1.2 Dead+1.0 Wind 300 deg+1.0 Ice+1.0 Temp	44.264	-2.629	-1.518	-102.098	172.199	0.811
1.2 Dead+1.0 Wind 330 deg+1.0 Ice+1.0 Temp	44.264	-1.527	-2.645	-175.457	99.723	0.371
Dead+Wind 0 deg - Service	19.911	0.000	-2.463	-142.644	-0.011	0.015

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Load Combination	Vertical K	Shear <sub>x</sub> K	Shear <sub>y</sub> K	Overtuning Moment, M <sub>x</sub> kip-ft	Overtuning Moment, M <sub>y</sub> kip-ft	Torque kip-ft
Dead+Wind 30 deg - Service	19.911	1.275	-2.208	-124.879	-71.888	0.018
Dead+Wind 60 deg - Service	19.911	2.157	-1.245	-72.219	-124.436	-0.435
Dead+Wind 90 deg - Service	19.911	2.390	-0.000	-0.382	-142.054	-0.774
Dead+Wind 120 deg - Service	19.911	2.152	1.243	71.222	-124.033	-0.449
Dead+Wind 150 deg - Service	19.911	1.234	2.137	122.904	-71.191	-0.002
Dead+Wind 180 deg - Service	19.911	0.000	2.463	141.877	-0.011	-0.015
Dead+Wind 210 deg - Service	19.911	-1.275	2.208	124.112	71.867	-0.018
Dead+Wind 240 deg - Service	19.911	-2.157	1.245	71.454	124.413	0.435
Dead+Wind 270 deg - Service	19.911	-2.390	-0.000	-0.382	142.032	0.774
Dead+Wind 300 deg - Service	19.911	-2.152	-1.243	-71.987	124.012	0.449
Dead+Wind 330 deg - Service	19.911	-1.234	-2.137	-123.671	71.169	0.002

### Solution Summary

Load Comb.	Sum of Applied Forces			Sum of Reactions			% Error
	PX K	PY K	PZ K	PX K	PY K	PZ K	
1	0.000	-19.911	0.000	0.000	19.911	0.000	0.000%
2	0.000	-23.893	-12.853	-0.000	23.893	12.853	0.000%
3	0.000	-17.920	-12.853	0.000	17.920	12.853	0.000%
4	6.654	-23.893	-11.525	-6.654	23.893	11.525	0.000%
5	6.654	-17.920	-11.525	-6.654	17.920	11.525	0.000%
6	11.257	-23.893	-6.499	-11.257	23.893	6.499	0.000%
7	11.257	-17.920	-6.499	-11.257	17.920	6.499	0.000%
8	12.469	-23.893	0.000	-12.469	23.893	0.000	0.000%
9	12.469	-17.920	0.000	-12.469	17.920	0.000	0.000%
10	11.232	-23.893	6.485	-11.232	23.893	-6.485	0.000%
11	11.232	-17.920	6.485	-11.232	17.920	-6.485	0.000%
12	6.439	-23.893	11.153	-6.439	23.893	-11.153	0.000%
13	6.439	-17.920	11.153	-6.439	17.920	-11.153	0.000%
14	0.000	-23.893	12.853	-0.000	23.893	-12.853	0.000%
15	0.000	-17.920	12.853	0.000	17.920	-12.853	0.000%
16	-6.654	-23.893	11.525	6.654	23.893	-11.525	0.000%
17	-6.654	-17.920	11.525	6.654	17.920	-11.525	0.000%
18	-11.257	-23.893	6.499	11.257	23.893	-6.499	0.000%
19	-11.257	-17.920	6.499	11.257	17.920	-6.499	0.000%
20	-12.469	-23.893	0.000	12.469	23.893	0.000	0.000%
21	-12.469	-17.920	0.000	12.469	17.920	0.000	0.000%
22	-11.232	-23.893	-6.485	11.232	23.893	6.485	0.000%
23	-11.232	-17.920	-6.485	11.232	17.920	6.485	0.000%
24	-6.439	-23.893	-11.153	6.439	23.893	11.153	0.000%
25	-6.439	-17.920	-11.153	6.439	17.920	11.153	0.000%
26	0.000	-44.264	0.000	0.000	44.264	0.000	0.000%
27	0.000	-44.264	-3.037	0.000	44.264	3.037	0.000%
28	1.571	-44.264	-2.722	-1.571	44.264	2.722	0.000%
29	2.599	-44.264	-1.501	-2.599	44.264	1.501	0.000%
30	2.919	-44.264	0.000	-2.919	44.264	0.000	0.000%
31	2.629	-44.264	1.518	-2.629	44.264	-1.518	0.000%
32	1.527	-44.264	2.645	-1.527	44.264	-2.645	0.000%
33	0.000	-44.264	3.037	0.000	44.264	-3.037	0.000%
34	-1.571	-44.264	2.722	1.571	44.264	-2.722	0.000%
35	-2.599	-44.264	1.501	2.599	44.264	-1.501	0.000%
36	-2.919	-44.264	0.000	2.919	44.264	0.000	0.000%
37	-2.629	-44.264	-1.518	2.629	44.264	1.518	0.000%
38	-1.527	-44.264	-2.645	1.527	44.264	2.645	0.000%
39	0.000	-19.911	-2.463	0.000	19.911	2.463	0.000%
40	1.275	-19.911	-2.208	-1.275	19.911	2.208	0.000%
41	2.157	-19.911	-1.245	-2.157	19.911	1.245	0.000%



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Load Comb.	Sum of Applied Forces			Sum of Reactions			% Error
	PX K	PY K	PZ K	PX K	PY K	PZ K	
42	2.390	-19.911	0.000	-2.390	19.911	0.000	0.000%
43	2.152	-19.911	1.243	-2.152	19.911	-1.243	0.000%
44	1.234	-19.911	2.137	-1.234	19.911	-2.137	0.000%
45	0.000	-19.911	2.463	0.000	19.911	-2.463	0.000%
46	-1.275	-19.911	2.208	1.275	19.911	-2.208	0.000%
47	-2.157	-19.911	1.245	2.157	19.911	-1.245	0.000%
48	-2.390	-19.911	0.000	2.390	19.911	0.000	0.000%
49	-2.152	-19.911	-1.243	2.152	19.911	1.243	0.000%
50	-1.234	-19.911	-2.137	1.234	19.911	2.137	0.000%

### Non-Linear Convergence Results

Load Combination	Converged?	Number of Cycles	Displacement Tolerance	Force Tolerance
1	Yes	4	0.0000001	0.0000001
2	Yes	5	0.0000001	0.00006949
3	Yes	5	0.0000001	0.00003159
4	Yes	6	0.0000001	0.00034434
5	Yes	6	0.0000001	0.00012060
6	Yes	6	0.0000001	0.00039049
7	Yes	6	0.0000001	0.00013857
8	Yes	6	0.0000001	0.00014697
9	Yes	5	0.0000001	0.00082439
10	Yes	6	0.0000001	0.00030702
11	Yes	6	0.0000001	0.00010648
12	Yes	6	0.0000001	0.00033274
13	Yes	6	0.0000001	0.00011645
14	Yes	5	0.0000001	0.00006943
15	Yes	5	0.0000001	0.00003157
16	Yes	6	0.0000001	0.00033392
17	Yes	6	0.0000001	0.00011666
18	Yes	6	0.0000001	0.00030827
19	Yes	6	0.0000001	0.00010682
20	Yes	6	0.0000001	0.00014695
21	Yes	5	0.0000001	0.00082439
22	Yes	6	0.0000001	0.00039010
23	Yes	6	0.0000001	0.00013843
24	Yes	6	0.0000001	0.00034205
25	Yes	6	0.0000001	0.00012006
26	Yes	4	0.0000001	0.00009128
27	Yes	6	0.0000001	0.00024494
28	Yes	6	0.0000001	0.00029494
29	Yes	6	0.0000001	0.00030837
30	Yes	6	0.0000001	0.00025749
31	Yes	6	0.0000001	0.00028764
32	Yes	6	0.0000001	0.00029206
33	Yes	6	0.0000001	0.00023907
34	Yes	6	0.0000001	0.00029426
35	Yes	6	0.0000001	0.00028923
36	Yes	6	0.0000001	0.00025967
37	Yes	6	0.0000001	0.00031118
38	Yes	6	0.0000001	0.00029585
39	Yes	4	0.0000001	0.00011551
40	Yes	4	0.0000001	0.00038144
41	Yes	4	0.0000001	0.00060431
42	Yes	4	0.0000001	0.00066498

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43	Yes	4	0.00000001	0.00039635
44	Yes	4	0.00000001	0.00034784
45	Yes	4	0.00000001	0.00011512
46	Yes	4	0.00000001	0.00034636
47	Yes	4	0.00000001	0.00039250
48	Yes	4	0.00000001	0.00066710
49	Yes	4	0.00000001	0.00060981
50	Yes	4	0.00000001	0.00038183

### Maximum Tower Deflections - Service Wind

Section No.	Elevation ft	Horz. Deflection in	Gov. Load Comb.	Tilt °	Twist °
L1	81 - 48.5	10.931	47	1.2371	0.0195
L2	48.5 - 37.54	3.836	41	0.6932	0.0074
L3	40.46 - 28.5	2.745	41	0.6002	0.0062
L4	28.5 - 27.5	1.400	41	0.4579	0.0041
L5	27.5 - 23.5	1.306	41	0.4445	0.0040
L6	23.5 - 2.5	0.959	41	0.3825	0.0032
L7	2.5 - 0	0.012	40	0.0464	0.0003

### Critical Deflections and Radius of Curvature - Service Wind

Elevation ft	Appurtenance	Gov. Load Comb.	Deflection in	Tilt °	Twist °	Radius of Curvature ft
78.00	(2) SBNHH-1D65B w/ Mount Pipe	47	10.177	1.1805	0.0181	12864
62.50	20' 4-Bay Dipole	41	6.479	0.9005	0.0114	3476
42.50	10' 2-Bay Dipole	41	3.002	0.6231	0.0065	4639

### Maximum Tower Deflections - Design Wind

Section No.	Elevation ft	Horz. Deflection in	Gov. Load Comb.	Tilt °	Twist °
L1	81 - 48.5	57.676	18	6.5257	0.1014
L2	48.5 - 37.54	20.232	6	3.6630	0.0384
L3	40.46 - 28.5	14.479	6	3.1687	0.0322
L4	28.5 - 27.5	7.385	6	2.4163	0.0214
L5	27.5 - 23.5	6.887	6	2.3454	0.0205
L6	23.5 - 2.5	5.059	6	2.0181	0.0168
L7	2.5 - 0	0.064	4	0.2443	0.0017

### Critical Deflections and Radius of Curvature - Design Wind

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Elevation	Appurtenance	Gov. Load Comb.	Deflection	Tilt	Twist	Radius of Curvature
ft			in	°	°	ft
78.00	(2) SBNHH-1D65B w/ Mount Pipe	18	53.706	6.2293	0.0941	2496
62.50	20' 4-Bay Dipole	6	34.209	4.7607	0.0594	672
42.50	10' 2-Bay Dipole	6	15.834	3.2897	0.0337	883

### Compression Checks

### Pole Design Data

Section No.	Elevation	Size	L	L <sub>u</sub>	Kl/r	A	P <sub>u</sub>	φP <sub>n</sub>	Ratio
	ft		ft	ft		in <sup>2</sup>	K	K	$\frac{P_u}{\phi P_n}$
L1	81 - 48.5 (1)	TP17.614x13x0.1875	32.50	0.00	0.0	10.3709	-11.605	606.700	0.019
L2	48.5 - 37.54 (2)	TP19.17x17.614x0.51	10.96	0.00	0.0	29.5346	-16.861	912.000	0.018
L3	37.54 - 28.5 (3)	TP20.0416x17.7354x0.5515	11.96	0.00	0.0	34.1167	-19.082	1058.400	0.018
L4	28.5 - 27.5 (4)	TP20.1805x20.0416x0.5534	1.00	0.00	0.0	34.4748	-19.250	1055.240	0.018
L5	27.5 - 23.5 (5)	TP20.736x20.1805x0.4851	4.00	0.00	0.0	31.1805	-19.874	1022.590	0.019
L6	23.5 - 2.5 (6)	TP23.6528x20.736x0.4857	21.00	0.00	0.0	35.7147	-23.464	1329.760	0.018
L7	2.5 - 0 (7)	TP24x23.6528x0.42	2.50	0.00	0.0	31.4340	-23.879	1693.480	0.014

### Pole Bending Design Data

Section No.	Elevation	Size	M <sub>ux</sub>	φM <sub>ux</sub>	Ratio	M <sub>uy</sub>	φM <sub>uy</sub>	Ratio
	ft		kip-ft	kip-ft	$\frac{M_{ux}}{\phi M_{ux}}$	kip-ft	kip-ft	$\frac{M_{uy}}{\phi M_{uy}}$
L1	81 - 48.5 (1)	TP17.614x13x0.1875	211.322	275.317	0.768	0.000	275.317	0.000
L2	48.5 - 37.54 (2)	TP19.17x17.614x0.51	283.277	426.062	0.665	0.000	426.062	0.000
L3	37.54 - 28.5 (3)	TP20.0416x17.7354x0.5515	412.076	528.010	0.780	0.000	528.010	0.000
L4	28.5 - 27.5 (4)	TP20.1805x20.0416x0.5534	423.293	530.186	0.798	0.000	530.186	0.000
L5	27.5 - 23.5 (5)	TP20.736x20.1805x0.4851	468.911	532.308	0.881	0.000	532.308	0.000
L6	23.5 - 2.5 (6)	TP23.6528x20.736x0.4857	725.582	794.203	0.914	0.000	794.203	0.000
L7	2.5 - 0 (7)	TP24x23.6528x0.42	758.532	1032.650	0.735	0.000	1032.650	0.000

### Pole Shear Design Data

Section No.	Elevation	Size	Actual V <sub>u</sub>	φV <sub>u</sub>	Ratio	Actual T <sub>u</sub>	φT <sub>u</sub>	Ratio
	ft		K	K	$\frac{V_u}{\phi V_u}$	kip-ft	kip-ft	$\frac{T_u}{\phi T_u}$
L1	81 - 48.5 (1)	TP17.614x13x0.1875	7.944	182.010	0.044	1.973	277.770	0.007
L2	48.5 - 37.54 (2)	TP19.17x17.614x0.51	10.269	273.600	0.038	4.022	437.170	0.009
L3	37.54 - 28.5 (3)	TP20.0416x17.7354x0.5515	11.187	317.520	0.035	2.237	541.958	0.004
L4	28.5 - 27.5 (4)	TP20.1805x20.0416x0.5534	11.272	316.572	0.036	2.241	544.138	0.004
L5	27.5 - 23.5 (5)	TP20.736x20.1805x0.4851	11.565	306.778	0.038	2.249	544.062	0.004
L6	23.5 - 2.5 (6)	TP23.6528x20.736x0.4857	12.918	398.929	0.032	2.259	809.371	0.003
L7	2.5 - 0 (7)	TP24x23.6528x0.42	13.334	508.043	0.026	0.092	1049.117	0.000

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### Pole Interaction Design Data

Section No.	Elevation ft	Ratio	Ratio	Ratio	Ratio	Ratio	Comb. Stress Ratio	Allow. Stress Ratio	Criteria
		$P_u$	$M_{ux}$	$M_{uy}$	$V_u$	$T_u$			
L1	81 - 48.5 (1)	0.019	0.768	0.000	0.044	0.007	0.789	1.000	✓
L2	48.5 - 37.54 (2)	0.018	0.665	0.000	0.038	0.009	0.686	1.000	✓
L3	37.54 - 28.5 (3)	0.018	0.780	0.000	0.035	0.004	0.800	1.000	✓
L4	28.5 - 27.5 (4)	0.018	0.798	0.000	0.036	0.004	0.818	1.000	✓
L5	27.5 - 23.5 (5)	0.019	0.881	0.000	0.038	0.004	0.902	1.000	✓
L6	23.5 - 2.5 (6)	0.018	0.914	0.000	0.032	0.003	0.932	1.000	✓
L7	2.5 - 0 (7)	0.014	0.735	0.000	0.026	0.000	0.749	1.000	✓

### Section Capacity Table

Section No.	Elevation ft	Component Type	Size	Critical Element	P K	$\phi P_{allow}$ K	% Capacity	Pass Fail
L1	81 - 48.5	Pole	TP17.614x13x0.1875	1	-11.605	606.700	78.9	Pass
L2	48.5 - 37.54	Pole	TP19.17x17.614x0.51	2	-16.861	912.000	68.6	Pass
L3	37.54 - 28.5	Pole	TP20.0416x17.7354x0.5515	3	-19.082	1058.400	80.0	Pass
L4	28.5 - 27.5	Pole	TP20.1805x20.0416x0.5534	4	-19.250	1055.240	81.8	Pass
L5	27.5 - 23.5	Pole	TP20.736x20.1805x0.4851	5	-19.874	1022.590	90.2	Pass
L6	23.5 - 2.5	Pole	TP23.6528x20.736x0.4857	6	-23.464	1329.760	93.2	Pass
L7	2.5 - 0	Pole	TP24x23.6528x0.42	7	-23.879	1693.480	74.9	Pass
Summary								
Pole (L6)							93.2	Pass
RATING =							93.2	Pass



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Engineer:	JLL
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**Circular Base Plate and Anchor Rod Analysis (TIA-H)**

**Analysis Reactions and Information**

Moment:	758.53	ft-kips
Axial:	23.88	kips
Shear:	13.33	kips
Grout Considered:	N/A	
$I_{ar}$ :	0	in
Eta Factor, $\eta$ :	N/A	

**Anchor Rod Information**

Quantity:	8
Diameter:	2.25 in
Bolt Grade:	A615-75
Fy:	75 ksi
Fu:	100 ksi
Bolt Circle:	32.00 in

**Tower Information**

Diameter:	24.00	in
Thickness:	0.25	in
Pole Grade:	Reinf 59.86 ksi	
Fy:	60	ksi
Fu:	80	ksi
# of Sides:	18-sided	

**Base Plate Information**

Diameter:	38.00	in
Thickness:	1.75	in
Plate Grade:	A572-60	
Fy:	60.00	ksi
Fu:	75.00	ksi

**Capacity Results**

**Anchor Rod Results**

$Pu_c$ =	144.92	kips	$\phi Pn_c$ =	243.75	kips
$Vu$ =	1.67	kips	$\phi Vn$ =	73.13	kips
$Mu$ =	N/A	in-kips	$\phi Mn$ =	N/A	in-kips

Anchor Rod Stress Ratio: 56.7%

Good

**Base Plate Results**

Base Plate Stress:	46.05	ksi
Allowable Plate Stress:	54	ksi
Base Plate Stress Ratio:	81.2%	

Good



Centerline Engineering Services, PA  
 750 W Center St, Suite 301  
 West Bridgewater, MA 02379  
 Tel: (781) 713-4725

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**Monopole Drilled Pier Analysis Summary (TIA-H)**

**Analysis Reactions**

	Comp.	Uplift.	
Moment, M:	758.5	-	kip-ft
Axial, P:	23.9	-	kips
Shear, V:	13.3	-	kips

**Material Properties**

Rebar Strength, F'y:	60	ksi
Concrete Strength, f <sub>c</sub> :	4.0	ksi
Dry Concrete Density, δ <sub>c</sub> :	150	pcf

**Pier Properties**

Depth, D:	20.0	ft
Ext. Above Grade, E:	1.0	ft
Diameter, d:	5.0	ft
Rebar Quantity, R <sub>q</sub> :	12	
Rebar Size, R <sub>s</sub> :	11	
Clear Cover, cc:	4.00	in
Tie Size, T <sub>s</sub> :	5	
Groundwater Depth, D <sub>gw</sub> :	10.0	ft
Ultimate Gross End Bearing	0.0	ksf

**Soil Properties**

Layer	Top (ft)	Bottom (ft)	Thickness (ft)	Soil Unit Weight (pcf)	Cohesion (ksf)	Friction Angle (deg)	Ult. Skin Friction - Comp (ksf)	Ult. Skin Friction - Uplift (ksf)	SPT Blow Count (N)
1	0.0	2.5	2.5	100	0.00	0	0.000	0.000	0
2	2.5	5.0	2.5	100	0.00	25	0.310	0.310	10
3	5.0	10.0	5.0	120	0.00	34	0.603	0.603	10
4	10.0	20.0	10.0	60	0.00	34	8.000	0.912	10

**Foundation Analysis Results**

**Soil Lateral Capacity**

	Comp.	Uplift.
Dv=0 (ft):	6.57	-
Soil Safety Factor:	3.83	-
Max Moment (kip-ft):	829.73	-
Rating:	33.1%	-

**Reinforced Concrete Flexure Capacity**

	Comp.	Uplift.
Critical Depth (ft):	6.42	-
Critical Mom. (k-ft):	829.63	-
Critical Mom. Cap.:	2106.09	-
Rating:	37.5%	-

**Soil Vertical Capacity**

	Comp.	Uplift.
Skin Friction (kips):	987.1	-
End Bearing (kips):	0.0	-
Wt. of Conc. (kips):	59.5	-
Total Cap. (kips):	987.1	-
Axial (kips):	83.4	-
Rating:	8.0%	-

**Reinforced Concrete Shear Capacity**

	Comp.	Uplift.
Critical Depth (ft):	15.20	-
Critical Shear:	122.51	-
Critical Shear Cap.:	330.99	-
Rating:	35.3%	-

Soil Rating:	33.1%	<b>GOOD</b>
Structural Rating:	37.5%	<b>GOOD</b>



Colliers Engineering & Design, Architecture, Landscape Architecture, Surveying, CT P.C  
1055 Washington Boulevard  
Stamford, CT 06901  
203.324.0800  
peter.albano@collierseng.com

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## Antenna Mount Analysis Report and PMI Requirements

### Mount Analysis

SMART Tool Project #: 10215788  
Colliers Engineering & Design Project #: 23777254

December 1, 2023

#### Site Information

Site ID: 5000176778-VZW / Plainville 3 CT  
Site Name: Plainville 3 CT  
Carrier Name: Verizon Wireless  
Address: 11 East Main Street  
Plainville, Connecticut 06062  
Hartford County  
Latitude: 41.671869°  
Longitude: -72.867150°

#### Structure Information

Tower Type: 81-Ft Monopole  
Mount Type: 17.47-Ft Platform

FUZE ID # 17123831

#### Analysis Results

Platform: 72.7% Pass\*

**\*Antennas and equipment to be installed in compliance with PMI Requirements of this mount analysis.**

#### \*\*\*Contractor PMI Requirements:

**Included at the end of this MA report**

**Available & Submitted via portal at <https://pmi.vzwsmart.com>**

**For additional questions and support, please reach out to:  
[pmisupport@colliersengineering.com](mailto:pmisupport@colliersengineering.com)**

Report Prepared By: Gianna Argentina



12/01/2023

**Executive Summary:**

The objective of this report is to determine the capacity of the antenna support mount at the subject facility for the final wireless telecommunications configuration, per the applicable codes and standards. Any modification listed under Sources of Information was assumed completed and was included in this analysis.

This analysis is inclusive of the mount structure only and does not address the structural capacity of the supporting structure. This mounting frame was not analyzed as an anchor attachment point for fall protection. All climbing activities are required to have a fall protection plan completed by a competent person.

**Sources of Information:**

Document Type	Remarks
Radio Frequency Data Sheet (RFDS)	Verizon RFDS, Site ID: 324682, dated October 29, 2020
Mount Mapping Report	Tower Engineering Professionals, Site ID: 467452, dated November 18, 2020
Previous Mount Modification Report	Maser Consulting Connecticut, Project #: 20777380A, dated December 23, 2020
Final Loading Configuration	Filter Add Scope Provided by Verizon Wireless

**Analysis Criteria:**

Codes and Standards:	ANSI/TIA-222-H 2022 Connecticut State Building Code (CSBC), Effective October 1, 2022	
Wind Parameters:	Basic Wind Speed (Ultimate 3-sec. Gust), $V_{ULT}$ : Ice Wind Speed (3-sec. Gust): Design Ice Thickness: Risk Category: Exposure Category: Topographic Category: Topographic Feature Considered: Topographic Method: Ground Elevation Factor, $K_e$ :	120 mph 50 mph 1.50 in II C 1 N/A N/A 0.993
Seismic Parameters:	$S_s$ : $S_1$ :	0.191 g 0.055 g
Maintenance Parameters:	Wind Speed (3-sec. Gust): Maintenance Load, $L_v$ : Maintenance Load, $L_m$ :	30 mph 250 lbs. 500 lbs.
Analysis Software:	RISA-3D (V17)	



**Final Loading Configuration:**

The following equipment has been considered for the analysis of the mounts:

Mount Elevation (ft)	Equipment Elevation (ft)	Quantity	Manufacturer	Model	Status
78.00	81.00	3	-	nL-Sub6 Antenna	Retained
		6	Andrew	SBNHH-1D65B	
		3	Antel	BXA-70063-4CF	
		3	Samsung	B2/B66A RRH-BR049	
		3	Samsung	B5/B13 RRH-BR04C	
		1	Raycap	RRFDC-3315-PF-48*	
		1	RFS	DB-B1-6C-12AB-0Z*	
		2	KAelus	KA-6030	Added

\* Equipment is flush mounted directly to the Monopole. They are not mounted on platform mount and are not included in this mount analysis.

It is acceptable to install up to any three (3) of the OVP model numbers listed below as required at any location other than the mount face without affecting the structural capacity of the mount. If OVP units are installed on the mount face, a mount re-analysis may be required unless replacing an existing OVP.

Model Number	Ports	AKA
DB-B1-6C-12AB-0Z	6	OVP-6
RVZDC-6627-PF-48	12	OVP-12

**Standard Conditions:**

1. All engineering services are performed on the basis that the information provided to Colliers Engineering & Design and used in this analysis is current and correct. The existing equipment loading has been applied at locations determined from the supplied documentation. Any deviation from the loading locations specified in this report shall be communicated to Colliers Engineering & Design to verify deviation will not adversely impact the analysis.

2. Mounts are assumed to have been properly fabricated, installed and maintained in good condition, twist free and plumb in accordance with its original design and manufacturer's specifications.

Obvious safety and structural issues/deficiencies noticed at the time of the mount mapping and reported in the Mount Mapping Report are assumed to be corrected and documented as part of the PMI process and are not considered in the mount analysis.

The mount analysis and the mount mapping are not a condition assessment of the mount. Proper maintenance and condition assessments are still required post analysis.

3. For mount analyses completed from other data sources (including new replacement mounts) and not specifically mapped in accordance with the NSTD-446 Standard, the mounts are assumed to have been properly fabricated, installed and maintained in good condition, twist free and plumb in accordance with its original design and manufacturer's specifications.

4. All member connections are assumed to have been designed to meet or exceed the load carrying capacity of the connected member unless otherwise specified in this report.

5. The mount was checked up to, and including, the bolts that fasten it to the mount collar/attachment and threaded rod connections in collar members if applicable. Local deformation and interaction between the mount collar/attachment and the supporting tower structure are outside the scope of this analysis.
6. All services are performed, results obtained, and recommendations made in accordance with generally accepted engineering principles and practices. Colliers Engineering & Design is not responsible for the conclusion, opinions, and recommendations made by others based on the information supplied.
7. Structural Steel Grades have been assumed as follows, if applicable, unless otherwise noted in this analysis:
  - o Channel, Solid Round, Angle, Plate      ASTM A36 (Gr. 36)
  - o HSS (Rectangular)                              ASTM 500 (Gr. B-46)
  - o Pipe                                                      ASTM A53 (Gr. B-35)
  - o Threaded Rod                                        F1554 (Gr. 36)
  - o Bolts                                                    ASTM A325

**Discrepancies between in-field conditions and the assumptions listed above may render this analysis invalid unless explicitly approved by Colliers Engineering & Design.**

**Analysis Results:**

Component	Utilization %	Pass/Fail
Standoff Horizontal	38.4 %	Pass
Face Horizontal	25.9 %	Pass
Grating Support	10.7 %	Pass
Mount Pipe	58.8 %	Pass
Threaded Rod	53.6 %	Pass
GPS Pipe	2.2 %	Pass
Kicker	13.6 %	Pass
Mount Connection	72.7 %	Pass

<b>Structure Rating – (Controlling Utilization of all Components)</b>	<b>72.7%</b>
-----------------------------------------------------------------------	--------------

**Mount Steel (EPA)a per ANSI/TIA-222-H Section 2.6.11.2:**

Ice Thickness (In)	Mount Pipes Excluded		Mount Pipes Included	
	Front (EPA)a (Sq. Ft.)	Side (EPA)a (Sq. Ft.)	Front (EPA)a (Sq. Ft.)	Side (EPA)a (Sq. Ft.)
0	26.1	26.1	46.2	46.2
0.5	32.9	32.9	61.6	61.5
1	38.7	38.8	75.9	75.8

Notes:

- (EPA)a values listed above may be used in the absence of more precise information
- (EPA)a values in the table above include 3 sector(s).
- Ka factors included in (EPA)a calculations

### **Requirements:**

The existing mount is **SUFFICIENT** for the final loading configuration shown in attachment 2 and do not require modifications. Additional requirements are noted below.

Contractor shall verify modifications detailed in Construction Drawings by Maser Consulting Connecticut dated December 23, 2020 have been installed prior to installation of equipment. **Escalate any discrepancies to EOR immediately as it may render the results of this analysis invalid and require additional modifications.**

Contractor shall install the proposed filter units on new Site Pro 1 Dual Swivel Mount Kit (Part #: RRUDSM or EOR approved equivalent) in the location shown in the placement diagrams.

If required, ANSI/ASSP rigging plan review services compliant with the requirements of ANSI/TIA 322 are available for a Construction Class IV site or other. Separate review fees will apply.

### **Attachments:**

1. **Contractor Required Post Installation Inspection (PMI) Report Deliverables**
2. Antenna Placement Diagrams
3. Mount Photos
4. Mount Mapping Report (for reference only)
5. Analysis Calculations

## Mount Desktop – Post Modification Inspection (PMI) Report Requirements

### Documents & Photos Required from Contractor – **Passing Mount Analysis**

Passing Mount Analysis requires a PMI due to a modification in loading.

Electronic pdf version of this can be downloaded at <https://pmi.vzwsmart.com>.

For additional questions and support, please reach out to [pmisupport@colliersengineering.com](mailto:pmisupport@colliersengineering.com)

---

MDG #: 5000176778

SMART Project #: 10019480

Fuze Project ID: 16241843

**Purpose** – to provide SMART Tool structural vendor the proper documentation in order to complete the required Mount Desktop review of the Post Modification Inspection Report.

- Contractor is responsible for making certain the photos provided as noted below provide confirmation that the installation was completed in accordance with this Passing Mount Analysis.
- Contractor shall relay any data that can impact the performance of the mount, this includes safety issues.

#### **Base Requirements:**

- If installation will cause damage to the structure, the climbing facility, or safety climb if present or any installed system, SMART Tool vendor to be notified prior to install. Any special photos outside of the standard requirements will be indicated on the drawings.
- Provide “as built mount drawings” showing contractor’s name, contact information, preparer’s signature, and date. Any deviations from the drawings (Proposed modification) shall be shown. NOTE: If loading is different than what is conveyed in the passing mount analysis (MA) contact the SMART Tool vendor immediately.
- Each photo should be time and date stamped
- Photos should be high resolution.
- Contractor shall ensure that the safety climb wire rope is supported and not adversely impacted by the install of the modification components. This may involve the install of wire rope guides, or other items to protect the wire rope. If there is conflict, contact the SMART Tool engineer for recommendations.
- The PMI can be accessed at the following portal: <https://pmi.vzwsmart.com>

#### **Photo Requirements:**

- Photos taken at ground level
  - Photo of Gate Signs showing the tower owner, site name, and number.
  - Overall tower structure after installation.
  - Photos of the mount after installation; if the mounts are at different rad elevations, pictures must be provided for all elevations that equipment was installed.
- Photos taken at Mount Elevation
  - Photos showing the safety climb wire rope above and below the mount prior to installation.
  - Photos showing the climbing facility and safety climb if present.
  - Photos showing each individual sector after installation. Each entire sector shall be in one photo to show the interconnection of members.

- These photos shall also certify that the placement and geometry of the equipment on the mount is as depicted in the antenna placement diagram in this form.
- Photos that show the model number of each antenna and piece of equipment installed per sector.

**Antenna & equipment placement and Geometry Confirmation:**

- The contractor shall certify that the antenna & equipment placement and geometry is in accordance with the sketch and table as included in the mount analysis and noted below.

The contractor certifies that the photos support and the equipment on the mount is as depicted on the sketch and table included in this form and with the mount analysis provided.

OR

The contractor notes that the equipment on the mount is not in accordance with the sketch and has noted the differences below and provided photo documentation of any alterations.

**Special Instructions / Validation as required from the MA or any other information the contractor deems necessary to share that was identified:**

**Issue:**

Contractor shall verify modifications detailed in Construction Drawings by Maser Consulting Connecticut dated December 23, 2020 have been installed prior to installation of equipment. **Escalate any discrepancies to EOR immediately as it may render the results of this analysis invalid and require additional modifications.**

Contractor shall install the proposed filter units on new Site Pro 1 Dual Swivel Mount Kit (Part #: RRUDSM or EOR approved equivalent) in the location shown in the placement diagrams.

**Response:**

**Special Instruction Confirmation:**

- The contractor has read and acknowledges the above special instructions.
- All hardware listed in the Special Instructions above (if applicable) has been properly installed, and the existing hardware was inspected.
- The material utilized was as specified in the SMART Tool engineering vendor Special Instructions above (if applicable) and included in the material certification folder is a packing list or invoice for these materials.

OR

The material utilized was approved by a SMART Tool engineering vendor as an "equivalent" and this approval is included as part of the contractor submission.

**Comments:**

--

**Contractor certifies that the climbing facility / safety climb was not damaged prior to starting work:**

Yes       No

**Contractor certifies no new damage created during the current installation:**

Yes       No

**Contractor to certify the condition of the safety climb and verify no damage when leaving the site:**

Safety Climb in Good Condition       Safety Climb Damaged

**Certifying Individual:**

Company:	
Employee Name:	
Contact Phone:	
Email:	
Date:	

Structure: 5000176778-VZW - Plainville 3 CT

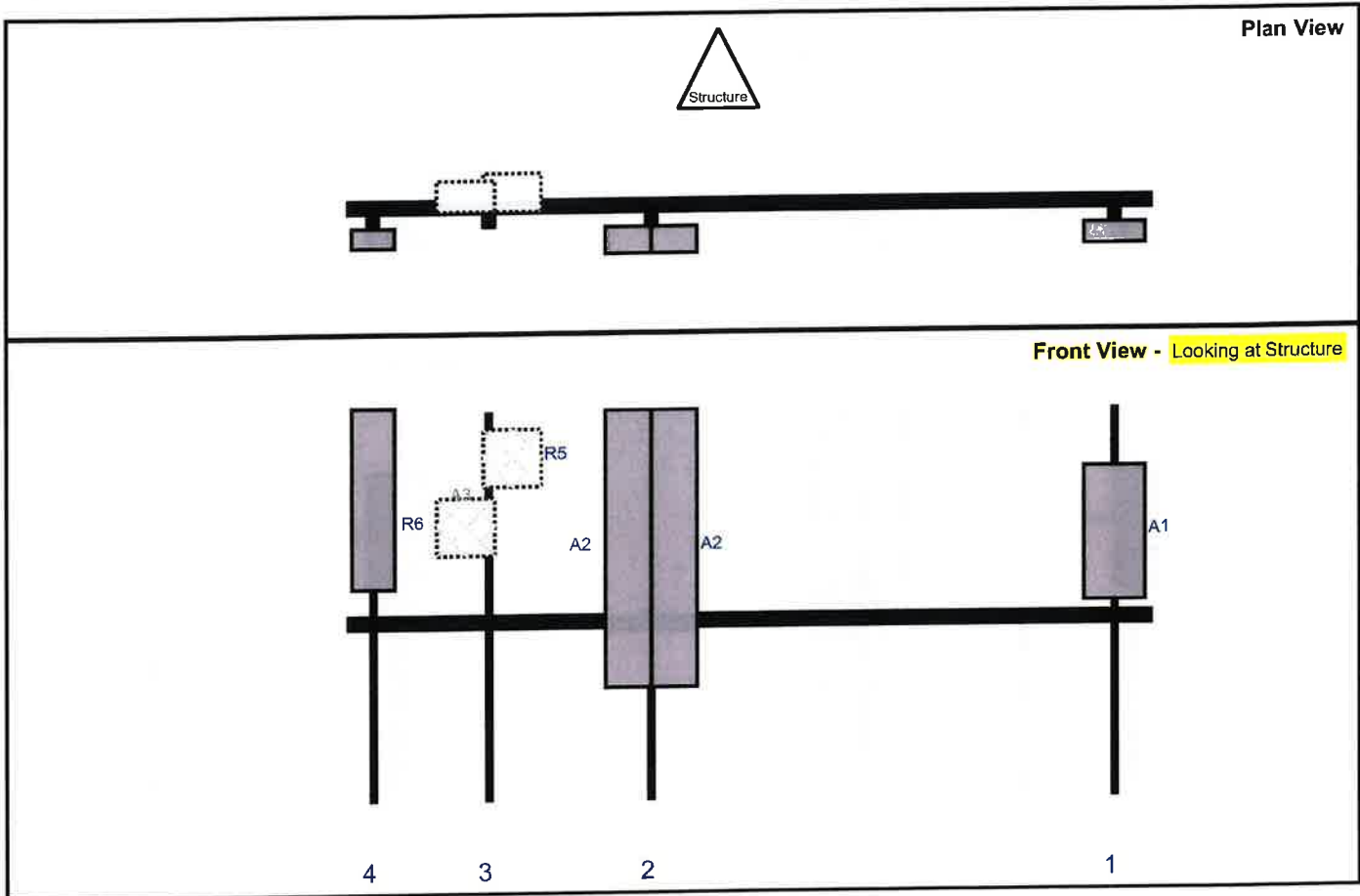
Sector: **A**  
 Structure Type: Monopole  
 Mount Elev: 81.00

10019480

11/27/2023



Page: 1



Ref#	Model	Height (in)	Width (in)	H Dist Fm L.	Pipe #	Pipe Pos V	Ant Pos	C. Ant Fm T.	Ant H Off	Status	Validation
A1	nL-Sub6 Antenna	35.1	16.1	199.694	1	a	Front	33	0	Retained	
A2	SBNHH-1D65B	72.6	11.9	78.9438	2	a	Front	36	6	Retained	11/18/2020
A2	SBNHH-1D65B	72.6	11.9	78.9438	2	b	Front	36	-6	Retained	11/18/2020
R5	B2/B66A RRH-BR049	15	15	36.9438	3	a	Behind	12	6	Retained	11/18/2020
R6	B5/B13 RRH-BR04C	15	15	36.9438	3	a	Behind	30	-6	Retained	11/18/2020
A3	BXA-70063-4CF	47.4	11.2	6.94379	4	a	Front	22.5	0	Retained	11/18/2020
M69	GPS	5.2	2.6			Member				Retained	11/18/2020

Structure: 5000176778-VZW - Plainville 3 CT

Sector: B

11/27/2023

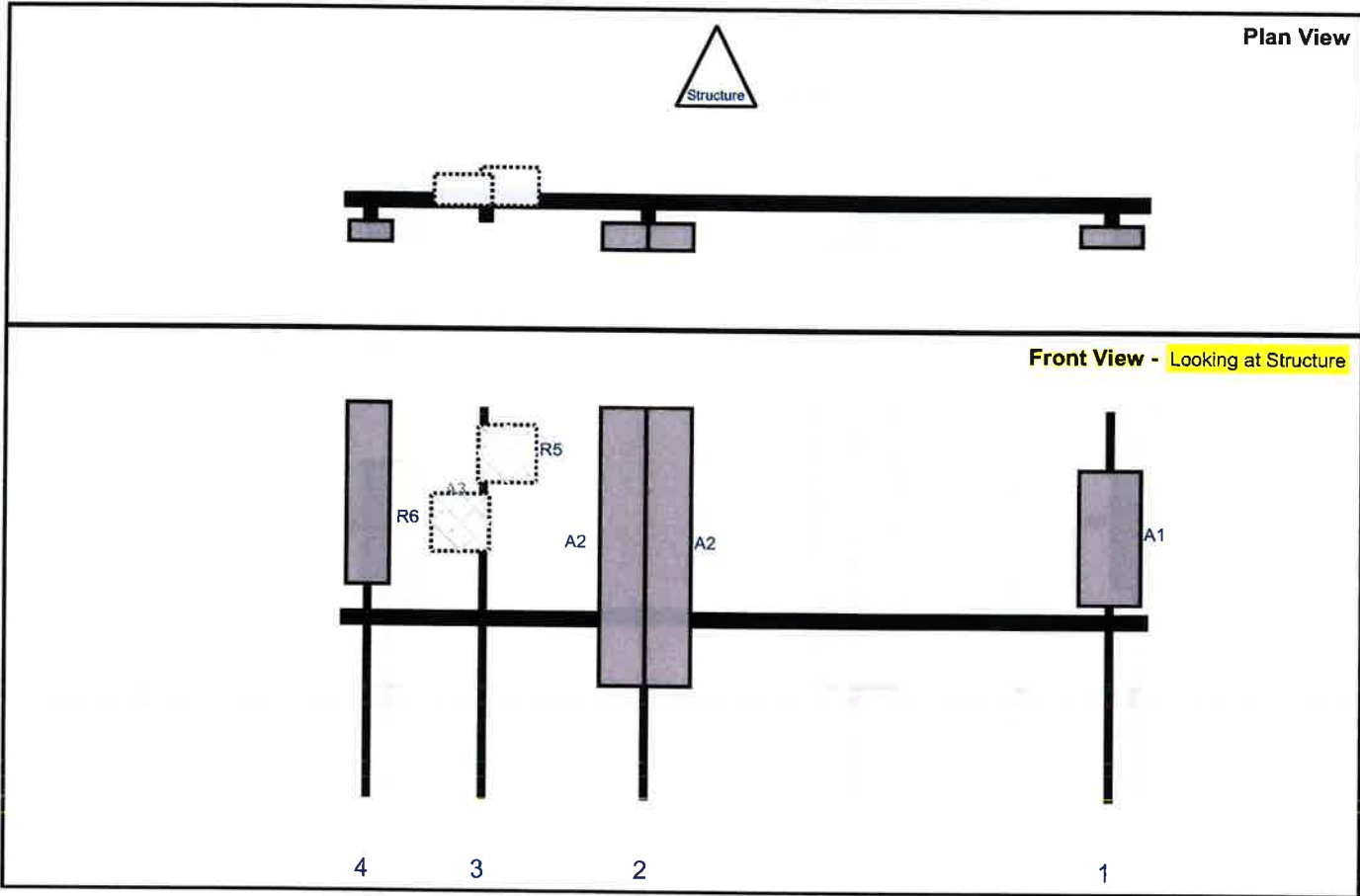
Structure Type: Monopole

10019480



Mount Elev: 81.00

Page: 2



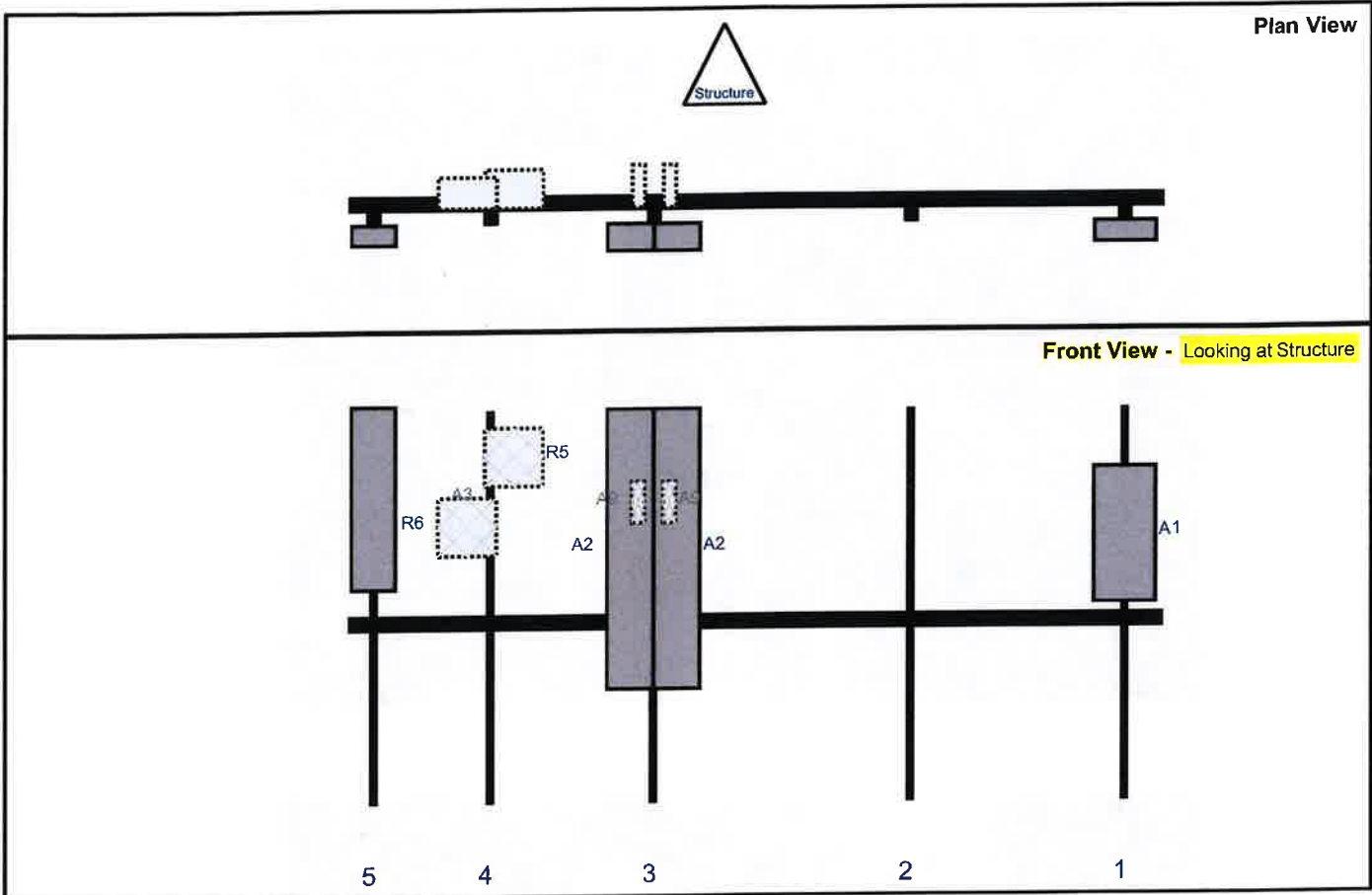
Ref#	Model	Height (in)	Width (in)	H Dist Frm L.	Pipe #	Pipe Pos V	Ant Pos	C. Ant Frm T.	Ant H Off	Status	Validation
A1	nL-Sub6 Antenna	35.1	16.1	199.694	1	a	Front	33	0	Retained	
A2	SBNHH-1D65B	72.6	11.9	78.9438	2	a	Front	36	6	Retained	11/18/2020
A2	SBNHH-1D65B	72.6	11.9	78.9438	2	b	Front	36	-6	Retained	11/18/2020
R5	B2/B66A RRH-BR049	15	15	36.9438	3	a	Behind	12	6	Retained	11/18/2020
R6	B5/B13 RRH-BR04C	15	15	36.9438	3	a	Behind	30	-6	Retained	11/18/2020
A3	BXA-70063-4CF	47.4	11.2	6.94379	4	a	Front	22.5	0	Retained	11/18/2020



Sector: C  
 Structure Type: Monopole  
 Mount Elev: 81.00

10019480

11/27/2023

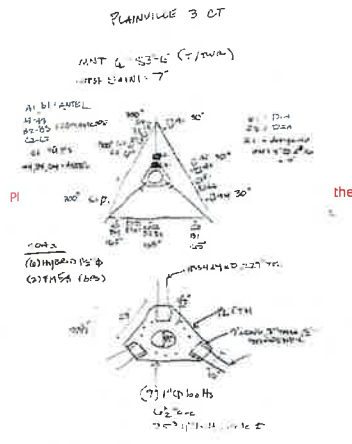


Ref#	Model	Height (in)	Width (in)	H Dist Frm L.	Pipe #	Pipe Pos V	Ant Pos	C. Ant Frm T.	Ant H Off	Status	Validation
A1	nL-Sub6 Antenna	35.1	16.1	199.694	1	a	Front	33	0	Retained	
A2	SBNHH-1D65B	72.6	11.9	78.4438	3	a	Front	36	6	Retained	11/18/2020
A2	SBNHH-1D65B	72.6	11.9	78.4438	3	b	Front	36	-6	Retained	11/18/2020
A9	KA-6030	10.6	3.2	78.4438	3	a	Behind	24	-4	Added	
A9	KA-6030	10.6	3.2	78.4438	3	b	Behind	24	4	Added	
R5	B2/B66A RRH-BR049	15	15	36.4438	4	a	Behind	12	6	Retained	11/18/2020
R6	B5/B13 RRH-BR04C	15	15	36.4438	4	a	Behind	30	-6	Retained	11/18/2020
A3	BXA-70063-4CF	47.4	11.2	6.44379	5	a	Front	22.5	0	Retained	11/18/2020



	<b>Antenna Mount Mapping Form (PATENT PENDING)</b>			FCC #
				N/A
	<b>Tower Owner:</b>	Unknown	<b>Mapping Date:</b>	11/18/2020
	<b>Site Name:</b>	Plainville 3 CT	<b>Tower Type:</b>	Mohopole
<b>Site Number or ID:</b>	467452	<b>Tower Height (FL):</b>	83.5	
<b>Mapping Contractor:</b>	TEP	<b>Mount Elevation (FL):</b>	83.5	

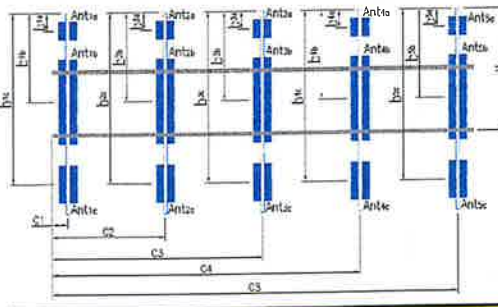
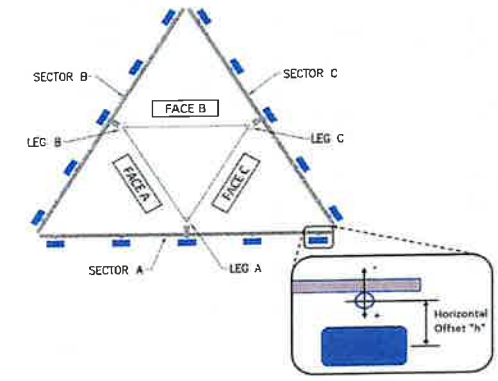
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Mount Pipe Configuration and Geometries [Unit = Inches]							
Sector / Position	Mount Pipe Size & Length	Vertical Offset Dimension "v"	Horizontal Offset "C1, C2, C3, etc."	Sector / Position	Mount Pipe Size & Length	Vertical Offset Dimension "v"	Horizontal Offset "C1, C2, C3, etc."
A1	2.4"Ø x 5/32" x 8'-6"	55.00	10.00	C1	2.4"Ø x 5/32" x 8'-6"	56.50	10.00
A2	2.4"Ø x 5/32" x 8'-6"	54.50	130.75	C2	2.4"Ø x 5/32" x 8'-6"	57.00	65.25
A3	2.4"Ø x 5/32" x 7'-0"	57.00	172.75	C3	2.4"Ø x 5/32" x 8'-6"	56.50	131.25
A4	2.4"Ø x 5/32" x 8'-6"	56.00	202.75	C4	2.4"Ø x 5/32" x 7'-0"	57.00	173.25
A5				C5	2.4"Ø x 5/32" x 8'-6"	56.00	203.25
A6				C6			
B1	2.4"Ø x 5/32" x 8'-6"	55.00	10.00	D1			
B2	2.4"Ø x 5/32" x 8'-6"	54.50	130.75	D2			
B3	2.4"Ø x 5/32" x 7'-0"	57.00	172.75	D3			
B4	2.4"Ø x 5/32" x 8'-6"	56.00	202.75	D4			
B5				D5			
B6				D6			

Distance between bottom rail and mount CL elevation (dim d). Unit is inches. See 'Mount Elev Ref' tab for details. : 0.00  
 Distance from top of bottom support rail to lowest tip of ant./eqpt. of Carrier above. (N/A if > 10 ft.):  
 Distance from top of bottom support rail to highest tip of ant./eqpt. of Carrier below. (N/A if > 10 ft.): 2  
 Please enter additional information or comments below.  
 There is a dipole antenna on the mount below Verizon's mount - Tip of dipole is 2-ft from the bottom support rail

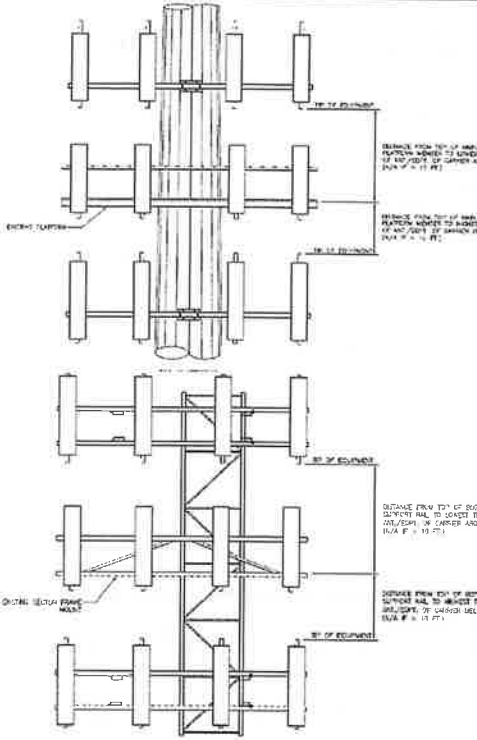
Tower Face Width at Mount Elev. (ft.): Tower Leg Size or Pole Shaft Diameter at Mount Elev. (in.): 13.23



**Antenna Layout (Looking Out From Tower)**

Ants. Items	Enter antenna model. If not labeled, enter "Unknown".						Mounting Locations [Units are inches and degrees]			Photos of antennas
	Antenna Models if Known	Width (in.)	Depth (in.)	Height (in.)	Coax Size and Qty	Antenna Center-line (Ft.)	Vertical Distances "b1a, b2a, b3a, b1b,..." (Inches)	Horiz. Offset "h" (Use "-" if Ant. is behind)	Antenna Azimuth (Degrees)	
<b>Sector A</b>										
Ant1a	BXA-70063-6CF-EDIN	11.20	5.20	71.00	None	85.2917	33.50	8.00	30.00	31-33
Ant1b										
Ant1c										
Ant2a	(2) 5BNHH-1D65B	11.90	7.10	72.00	Raycap	85.375	32.00	10.00	30.00	34-37
Ant2b										
Ant2c										
Ant3a	RFV01U-D1A	15.88	10.03	19.73	Raycap	86.7917	17.50	12.00		38-39
Ant3b	RFV01U-D2A	15.88	10.03	19.73	Raycap	85.3333	35.00	12.00		40-41
Ant3c										
Ant4a	BXA-70063-4CF-EDIN	11.20	5.00	47.40	(2) 1.625	86	26.00	8.50	30.00	42-43
Ant4b										
Ant4c										
Ant5a										
Ant5b										
Ant5c										
Ant on Standoff										
Ant on Standoff										
Ant on Tower	RRFDC-3315-PF-48	15.73	10.25	25.66	(1) 1.5 Hybrid					71-72
Ant on Tower	RRFDC-3315-PF-48	15.73	10.25	25.66	(1) 1.5 Hybrid					73-74

Mount Azimuth (Degree) for Each Sector			Tower Leg Azimuth (Degree) for Each Sector			Sector B										
Sector A:	40.00	Deg	Leg A:		Deg	Ant <sub>1a</sub>	3XA-70063-6CF-EDIN	11.20	5.20	71.00	None	85.2917	33.50	8.00	165.00	44-46
Sector B:	160.00	Deg	Leg B:		Deg	Ant <sub>1b</sub>										
Sector C:	280.00	Deg	Leg C:		Deg	Ant <sub>1c</sub>										
Sector D:		Deg	Leg D:		Deg	Ant <sub>2a</sub>	(2) SBNHH-1D65B	11.90	7.10	72.00	Raycap	85.375	32.00	10.00	165.00	47-50
<b>Climbing Facility Information</b>						Ant <sub>2c</sub>										
Location:	340.00	Deg	Sector A			Ant <sub>3a</sub>	RFV01U-D1A	15.88	10.03	19.73	Raycap	86.7917	17.50	12.00		51-52
Climbing Facility	Corrosion Type:		Good condition.			Ant <sub>3b</sub>	RFV01U-D2A	15.88	10.03	19.73	Raycap	85.3333	35.00	12.00		53-54
	Access:		Climbing path was unobstructed.			Ant <sub>3c</sub>										
	Condition:		Good condition.			Ant <sub>4a</sub>	BXA-70063-4CF-EDIN	11.20	5.00	47.40	(2) 1.625	86	26.00	8.50	165.00	55-56
						Ant <sub>4b</sub>										
						Ant <sub>4c</sub>										
						Ant <sub>5a</sub>										
						Ant <sub>5b</sub>										
						Ant <sub>5c</sub>										
						Ant on Standoff										
						Ant on Standoff										
						Ant on Tower										
						Ant on Tower										
						<b>Sector C</b>										
						Ant <sub>1a</sub>	APX75-866514-T0	12.25	4.75	82.00	None	85.3333	34.50	8.00	300.00	57-58
						Ant <sub>1b</sub>										
						Ant <sub>1c</sub>										
						Ant <sub>2a</sub>	GPS	3.00	3.00	5.50	(1) 0.5	89.5833	-16.00	3.50		60
						Ant <sub>2b</sub>										
						Ant <sub>2c</sub>										
						Ant <sub>3a</sub>	(2) SBNHH-1D65B	11.90	7.10	72.00	Raycap	85.5417	32.00	10.00	300.00	61-64
						Ant <sub>3b</sub>										
						Ant <sub>3c</sub>										
						Ant <sub>4a</sub>	RFV01U-D1A	15.88	10.03	19.73	Raycap	86.7917	17.50	12.00		65-66
						Ant <sub>4b</sub>	RFV01U-D2A	15.88	10.03	19.73	Raycap	85.3333	35.00	12.00		67-68
						Ant <sub>4c</sub>										
						Ant <sub>5a</sub>	BXA-70063-4CF-EDIN	11.20	5.00	47.40	(2) 1.625	86	26.00	8.50	300.00	69-70
						Ant <sub>5b</sub>										
						Ant <sub>5c</sub>										
						Ant on Standoff										
						Ant on Standoff										
						Ant on Standoff										
						Ant on Tower										
						Ant on Tower										
						<b>Sector D</b>										
						Ant <sub>1a</sub>										
						Ant <sub>1b</sub>										
						Ant <sub>1c</sub>										
						Ant <sub>2a</sub>										
						Ant <sub>2b</sub>										
						Ant <sub>2c</sub>										
						Ant <sub>3a</sub>										
						Ant <sub>3b</sub>										
						Ant <sub>3c</sub>										
						Ant <sub>4a</sub>										
						Ant <sub>4b</sub>										
						Ant <sub>4c</sub>										
						Ant <sub>5a</sub>										
						Ant <sub>5b</sub>										
						Ant <sub>5c</sub>										
						Ant on Standoff										
						Ant on Standoff										
						Ant on Tower										
						Ant on Tower										



Observed Safety and Structural Issues During the Mount Mapping		
Issue #	Description of Issue	Photo #

1		
2		
3		
4		
5		
6		
7		
8		

**Mapping Notes**

1. Please report any visible structural or safety issues observed on the antenna mounts (Damaged members, loose connections, tilting mounts, safety climb issues, etc.)
2. If the thickness of the existing pipes or tubing can't be obtained from a general tool (such as Caliper), please use an ultrasonic measurement tool (thickness gauge) to measure the thickness.
3. Please create all required detail sketches of the mounts and insert them into the "Sketches" tab.
4. Please measure and enter the bolt sizes and types under the Members Box in the spreadsheet of the mount type.
5. Take and label the photos of the tower, mounts, connections, antennas and all measurements. Minimum 50 photos are required.
6. Please measure and report the size and length of all existing antenna mounting pipes.
7. Please measure and report the antenna information for all sectors.
8. Don't delete or rearrange any sheet or contents of any sheet from this mapping form.

**Standard Conditions**

1. Obvious safety and structural issues/deficiencies noticed at the time of the mount mapping are to be reported in this mapping. However, this mount mapping is not a condition assessment of the mount.



Antenna Mount Mapping Form (PATENT PENDING)

FCC #  
N/A

Tower Owner:	Unknown	Mapping Date:	11/18/2020
Site Name:	Plainville 3 CT	Tower Type:	Monopole
Site Number or ID:	467452	Tower Height (Ft.):	83.5
Mapping Contractor:	TEP	Mount Elevation (Ft.):	83.5

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Please Insert Sketches of the Antenna Mount

PLAINVILLE 3 CT

MNT L = 83'-6" (T/TWA)

WAVE @ MNT = 7"

A1, B1 = ANTEL

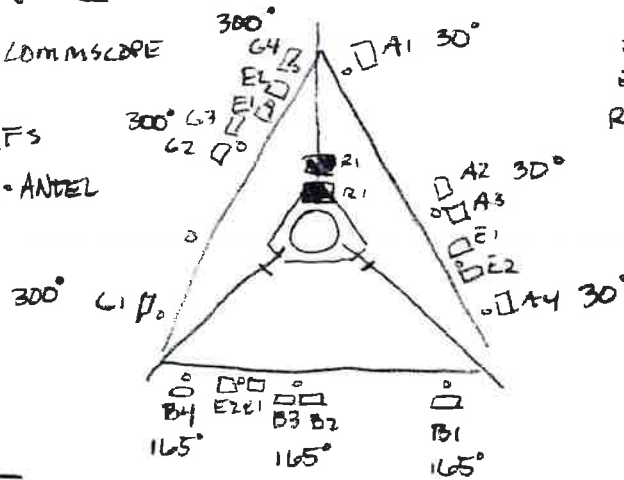
A2-A3 = LOMMSCOPE

B2-B3 = LOMMSCOPE

G2-G3

C1 = RFS

A4, B4, G4 = ANTEL

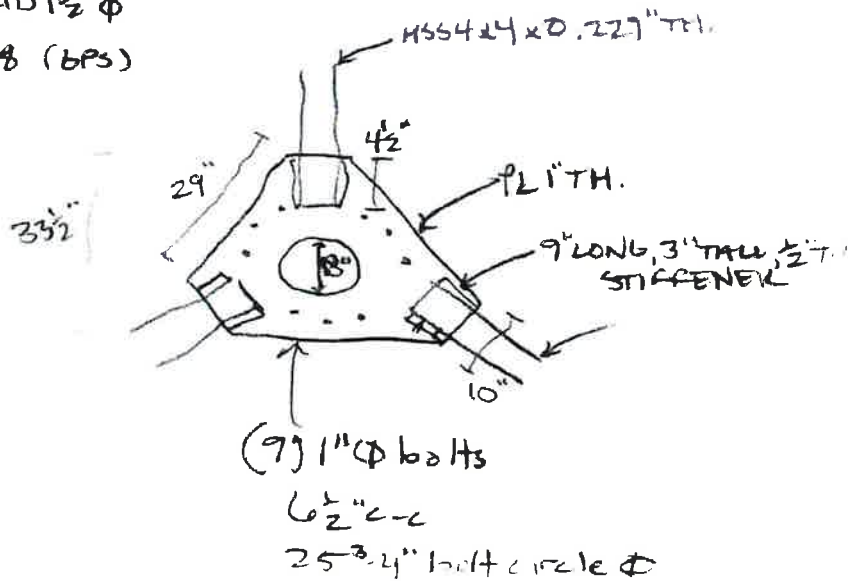


E1 = D1A  
E2 = D2A  
R1 = 247cm  
ON 2.4" Φ x 3/16  
x 4'

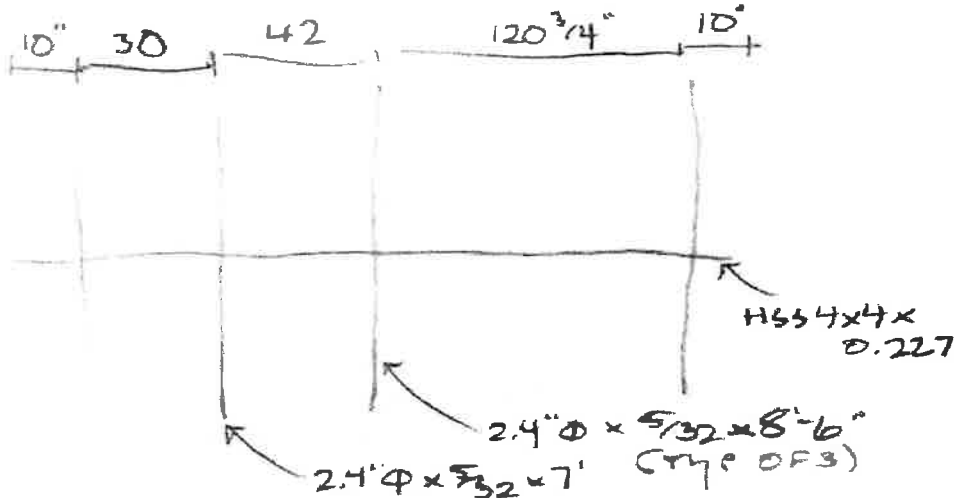
COAX

(6) HYBRID 1/2" Φ

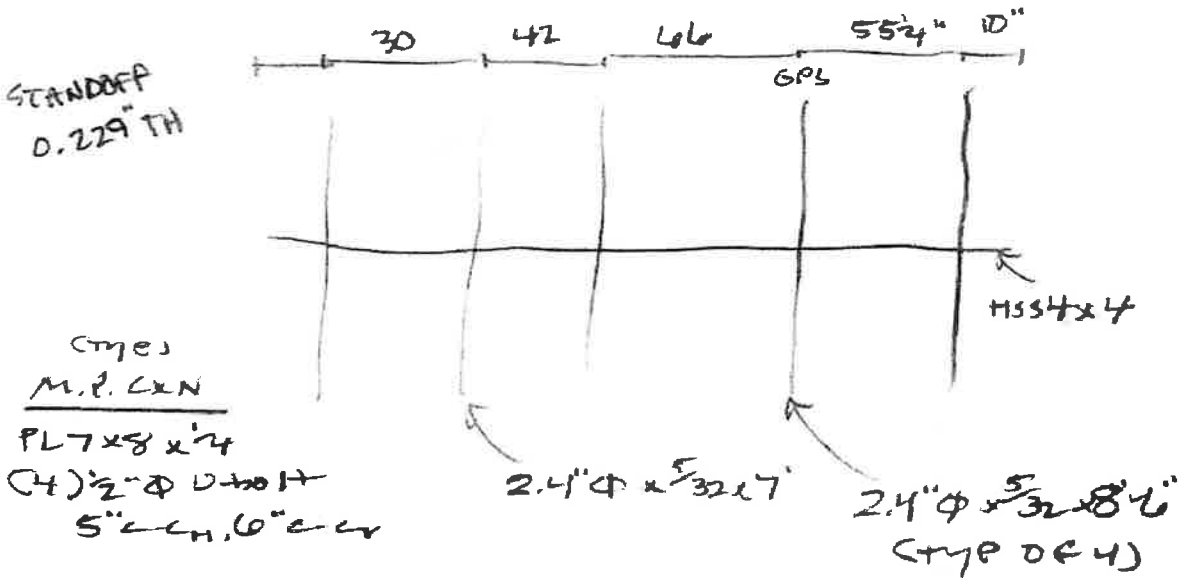
(2) FMSB (bps)

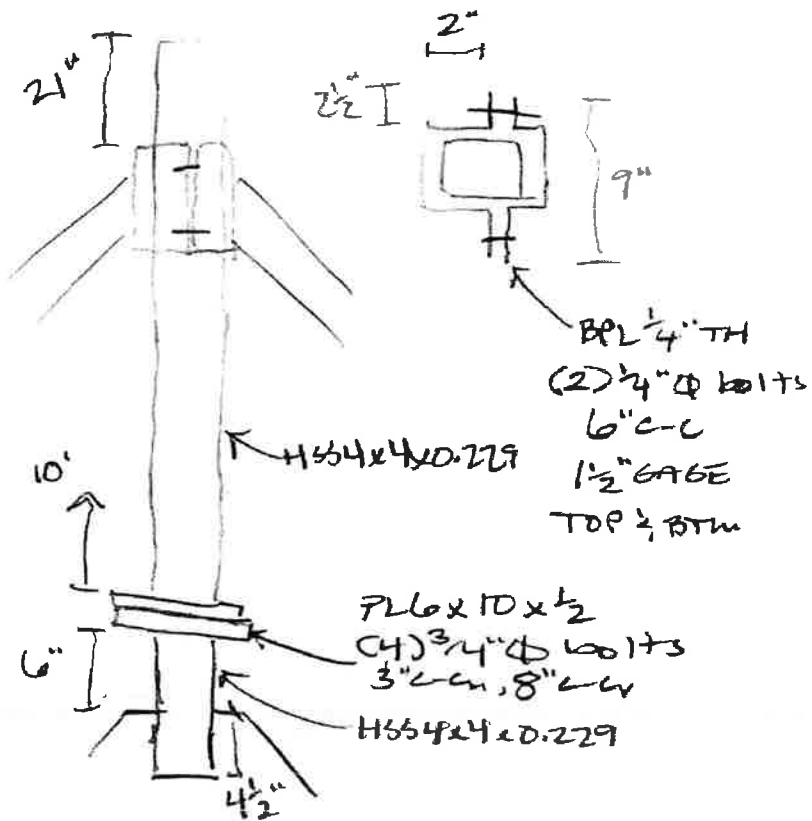


ALPHA/BETA



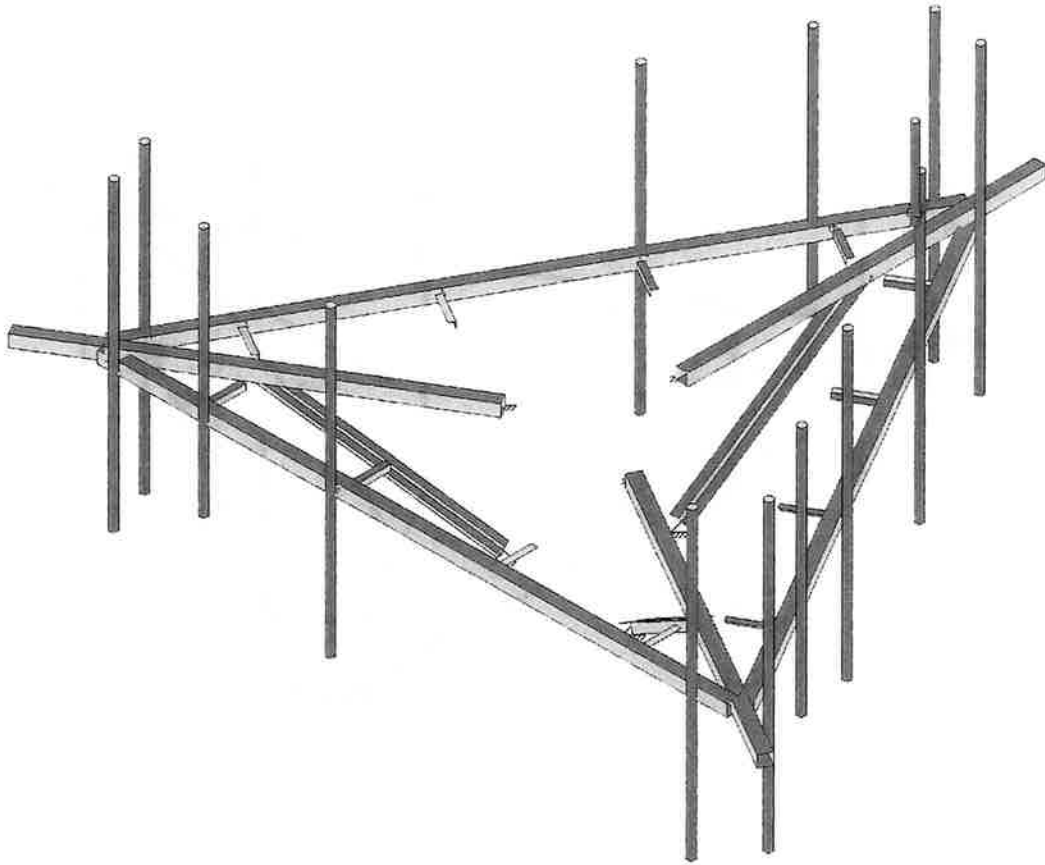
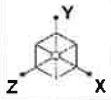
GAMMA





	B	U	H				
A1, B1	33 1/2	55	<del>8</del>				
A2-A3 B2-B3 G2-G3	32	54 1/2	10				
G1				34 1/2	56 1/2	8	
A4 B4 G4				26	56	8 1/2	
D1A	E1	17 1/2	57				12
D2A	E2	35	57				12





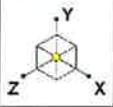
Colliers Engineering & Des...

5000176778-VZW\_MT\_LO\_H

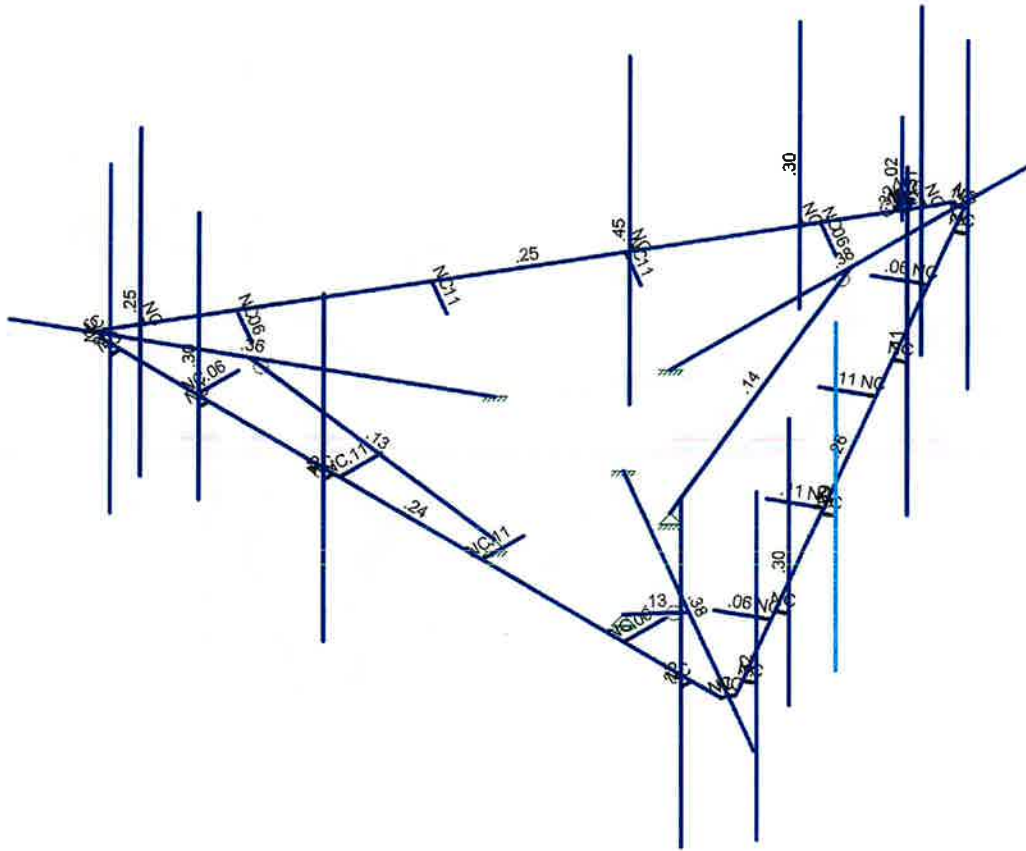
SK - 1

Nov 27, 2023 at 11:28 AM

5000176778-VZW\_MT\_LO\_H.r3d



Code Check ( Env )	
Black	No Calc
Red	> 1.0
Orange	.90-1.0
Yellow	.75-.90
Green	.50-.75
Blue	0-.50



Member Code Checks Displayed (Enveloped)  
Envelope Only Solution

Colliers Engineering & Des...

5000176778-VZW\_MT\_LO\_H

SK - 2

Nov 27, 2023 at 11:29 AM

5000176778-VZW\_MT\_LO\_H.r3d





Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

Nov 27, 2023  
 11:30 AM  
 Checked By: \_\_\_\_\_

**Basic Load Cases**

BLC Description	Category	X Gravity	Y Gravity	Z Gravity	Joint	Point	Distributed Area(Me...)	Surface(P...
1 Antenna D	None					99		
2 Antenna Di	None					99		
3 Antenna Wo (0 Deg)	None					99		
4 Antenna Wo (30 Deg)	None					99		
5 Antenna Wo (60 Deg)	None					99		
6 Antenna Wo (90 Deg)	None					99		
7 Antenna Wo (120 Deg)	None					99		
8 Antenna Wo (150 Deg)	None					99		
9 Antenna Wo (180 Deg)	None					99		
10 Antenna Wo (210 Deg)	None					99		
11 Antenna Wo (240 Deg)	None					99		
12 Antenna Wo (270 Deg)	None					99		
13 Antenna Wo (300 Deg)	None					99		
14 Antenna Wo (330 Deg)	None					99		
15 Antenna Wi (0 Deg)	None					99		
16 Antenna Wi (30 Deg)	None					99		
17 Antenna Wi (60 Deg)	None					99		
18 Antenna Wi (90 Deg)	None					99		
19 Antenna Wi (120 Deg)	None					99		
20 Antenna Wi (150 Deg)	None					99		
21 Antenna Wi (180 Deg)	None					99		
22 Antenna Wi (210 Deg)	None					99		
23 Antenna Wi (240 Deg)	None					99		
24 Antenna Wi (270 Deg)	None					99		
25 Antenna Wi (300 Deg)	None					99		
26 Antenna Wi (330 Deg)	None					99		
27 Antenna Wm (0 Deg)	None					99		
28 Antenna Wm (30 Deg)	None					99		
29 Antenna Wm (60 Deg)	None					99		
30 Antenna Wm (90 Deg)	None					99		
31 Antenna Wm (120 Deg)	None					99		
32 Antenna Wm (150 Deg)	None					99		
33 Antenna Wm (180 Deg)	None					99		
34 Antenna Wm (210 Deg)	None					99		
35 Antenna Wm (240 Deg)	None					99		
36 Antenna Wm (270 Deg)	None					99		
37 Antenna Wm (300 Deg)	None					99		
38 Antenna Wm (330 Deg)	None					99		
39 Structure D	None		-1				3	
40 Structure Di	None						37	3
41 Structure Wo (0 Deg)	None						74	
42 Structure Wo (30 Deg)	None						74	
43 Structure Wo (60 Deg)	None						74	
44 Structure Wo (90 Deg)	None						74	
45 Structure Wo (120 D...	None						74	
46 Structure Wo (150 D...	None						74	
47 Structure Wo (180 D...	None						74	
48 Structure Wo (210 D...	None						74	
49 Structure Wo (240 D...	None						74	
50 Structure Wo (270 D...	None						74	
51 Structure Wo (300 D...	None						74	
52 Structure Wo (330 D...	None						74	
53 Structure Wi (0 Deg)	None						74	







**Load Combinations (Continued)**

Description	So...	P	S	B	Fa...	B	Fa...	B	Fa...	B	Fa...	B	Fa...	B	Fa...	B	Fa...	B	Fa...
72 0.9D - 1.0Ev + 1.0Eh (240 De...	Yes	Y		1	.9	.39	.9	.81	-1	E...	-1	.82	-.5	.83	-.866	ELZ	-.5	E...	-.866
73 0.9D - 1.0Ev + 1.0Eh (270 De...	Yes	Y		1	.9	.39	.9	.81	-1	E...	-1	.82		.83	-1	ELZ		E...	-1
74 0.9D - 1.0Ev + 1.0Eh (300 De...	Yes	Y		1	.9	.39	.9	.81	-1	E...	-1	.82	.5	.83	-.866	ELZ	.5	E...	-.866
75 0.9D - 1.0Ev + 1.0Eh (330 De...	Yes	Y		1	.9	.39	.9	.81	-1	E...	-1	.82	.866	.83	-.5	ELZ	.866	E...	-.5

**Joint Coordinates and Temperatures**

	Label	X [ft]	Y [ft]	Z [ft]	Temp [F]	Detach From Diap...
1	CP	0	0	0	0	
2	N47A	-0.	0	-2.092917	0	
3	N48A	-0.	0	-12.092917	0	
4	N20	-1.812519	0	1.046458	0	
5	N21	-10.472773	0	6.046458	0	
6	N22	1.812519	0	1.046458	0	
7	N23	10.472773	0	6.046458	0	
8	N24	-0.	0	-10.134583	0	
9	N28	0.144783	0	-10.172488	0	
10	N33	-0.144783	0	-10.172488	0	
11	N25	-8.776807	0	5.067292	0	
12	N26	-8.882024	0	4.960858	0	
13	N27	-8.737241	0	5.211629	0	
14	N28A	8.776807	0	5.067292	0	
15	N29A	8.737241	0	5.211629	0	
16	N30	8.882024	0	4.960858	0	
17	N30A	2	0	5.211629	0	
18	N31	-2	0	5.211629	0	
19	N32	6	0	5.211629	0	
20	N33A	-6	0	5.211629	0	
21	N34	-6	0	5.044963	0	
22	N35	-6	0	4.044963	0	
23	N24A	-2	0	5.044963	0	
24	N25A	-2	0	4.044963	0	
25	N27A	2	0	5.044963	0	
26	N28B	2	0	4.044963	0	
27	N30B	6	0	5.044963	0	
28	N31A	6	0	4.044963	0	
29	N29	3.513403	0	-4.337865	0	
30	N30C	5.513403	0	-0.873764	0	
31	N31B	1.513403	0	-7.801967	0	
32	N32A	7.513403	0	2.590338	0	
33	N33B	7.369066	0	2.673671	0	
34	N34A	6.50304	0	3.173671	0	
35	N35A	5.369066	0	-0.79043	0	
36	N36	4.50304	0	-0.29043	0	
37	N37	3.369066	0	-4.254532	0	
38	N38	2.50304	0	-3.754532	0	
39	N39	1.369066	0	-7.718634	0	
40	N40	0.50304	0	-7.218634	0	
41	N41	-5.513403	0	-0.873764	0	
42	N42	-3.513403	0	-4.337865	0	
43	N43	-7.513403	0	2.590338	0	
44	N44	-1.513403	0	-7.801967	0	
45	N45	-1.369066	0	-7.718634	0	
46	N46	-0.50304	0	-7.218634	0	
47	N47	-3.369066	0	-4.254532	0	
48	N48	-2.50304	0	-3.754532	0	



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**Joint Coordinates and Temperatures (Continued)**

	Label	X [ft]	Y [ft]	Z [ft]	Temp [F]	Detach From Diap...
49	N49	-5.369066	0	-0.79043	0	
50	N50	-4.50304	0	-0.29043	0	
51	N51	-7.369066	0	2.673671	0	
52	N52	-6.50304	0	3.173671	0	
53	N53	7.903908	0	5.211629	0	
54	N54	7.903908	0	5.503296	0	
55	N55	7.903908	4.583333	5.503296	0	
56	N56	7.903908	-3.916667	5.503296	0	
57	N57	-2.158592	0	5.211629	0	
58	N58	-2.158592	0	5.503296	0	
59	N59	-2.158592	4.541667	5.503296	0	
60	N60	-2.158592	-3.958333	5.503296	0	
61	N61	-5.658592	0	5.211629	0	
62	N62	-5.658592	0	5.503296	0	
63	N63	-5.658592	4.75	5.503296	0	
64	N64	-5.658592	-2.25	5.503296	0	
65	N65	-8.158592	0	5.211629	0	
66	N66	-8.158592	0	5.503296	0	
67	N67	-8.158592	4.666667	5.503296	0	
68	N68	-8.158592	-3.833333	5.503296	0	
69	N69	-8.465357	0	4.239171	0	
70	N70	-8.717948	0	4.093337	0	
71	N71	-8.717948	4.583333	4.093337	0	
72	N72	-8.717948	-3.916667	4.093337	0	
73	N73	-3.434107	0	-4.47521	0	
74	N74	-3.686698	0	-4.621043	0	
75	N75	-3.686698	4.541667	-4.621043	0	
76	N76	-3.686698	-3.958333	-4.621043	0	
77	N77	-1.684107	0	-7.506299	0	
78	N78	-1.936698	0	-7.652132	0	
79	N79	-1.936698	4.75	-7.652132	0	
80	N80	-1.936698	-2.25	-7.652132	0	
81	N81	-0.434107	0	-9.671362	0	
82	N82	-0.686698	0	-9.817196	0	
83	N83	-0.686698	4.666667	-9.817196	0	
84	N84	-0.686698	-3.833333	-9.817196	0	
85	N85	0.561449	0	-9.4508	0	
86	N86	0.81404	0	-9.596633	0	
87	N87	0.81404	4.708333	-9.596633	0	
88	N88	0.81404	-3.791667	-9.596633	0	
89	N89	2.863533	0	-5.463475	0	
90	N90	3.116123	0	-5.609308	0	
91	N91	3.116123	4.75	-5.609308	0	
92	N92	3.116123	-3.75	-5.609308	0	
93	N93	5.613533	0	-0.700335	0	
94	N94	5.866123	0	-0.846168	0	
95	N95	5.866123	4.708333	-0.846168	0	
96	N96	5.866123	-3.791667	-0.846168	0	
97	N97	7.363533	0	2.330754	0	
98	N98	7.616123	0	2.184921	0	
99	N99	7.616123	4.75	2.184921	0	
100	N100	7.616123	-2.25	2.184921	0	
101	N101	8.613533	0	4.495818	0	
102	N102	8.866123	0	4.349984	0	
103	N103	8.866123	4.666667	4.349984	0	
104	N104	8.866123	-3.833333	4.349984	0	
105	N105	3.116123	4	-5.609308	0	





**Joint Coordinates and Temperatures (Continued)**

	Label	X (ft)	Y (ft)	Z (ft)	Temp (F)	Detach From Diap...
106	N106	3.224377	4	-5.671808	0	
107	N107	3.00787	4	-5.546808	0	
108	N108	3.324457	4	-5.248464	0	
109	N109	3.43271	4	-5.310964	0	
110	N110	3.216204	4	-5.185964	0	
111	N111	3.324457	3.75	-5.248464	0	
112	N112	3.324457	6.25	-5.248464	0	
113	N113	-0.	0	-7.134583	0	
114	N114	-0.	-3.5	-2.092917	0	
115	N115	-6.17873	0	3.567292	0	
116	N116	-1.812519	-3.5	1.046458	0	
117	N117	6.17873	0	3.567292	0	
118	N118	1.812519	-3.5	1.046458	0	

**Hot Rolled Steel Section Sets**

	Label	Shape	Type	Design Li...	Material	Design R...	A [in2]	Iyy [in4]	Izz [in4]	J [in4]
1	Face Horizontal	HSS4X4X4	Beam	SquareT...	A500 Gr.B Rect	Typical	3.37	7.8	7.8	12.8
2	Standoff Horizontal	HSS4X4X4	Beam	SquareT...	A500 Gr.B Rect	Typical	3.37	7.8	7.8	12.8
3	Mount Pipe	PIPE 2.0	Column	Pipe	A53 Gr.B	Typical	1.02	.627	.627	1.25
4	GPS Pipe	PIPE 1.5	Column	Pipe	A53 Gr.B	Typical	.749	.293	.293	.586
5	Grating Support	L2x2x3	Beam	Single A...	A36 Gr.36	Typical	.722	.271	.271	.009
6	Threaded Rod	SR 0.5	Beam	BAR	A36 Gr.36	Typical	.196	.003	.003	.006
7	Kicker	LL3x3x3x6	Beam	Double A...	A36 Gr.36	Typical	2.18	4.97	1.9	.027

**Hot Rolled Steel Properties**

	Label	E [ksi]	G [ksi]	Nu	Therm (/1E...	Density[k/ft...	Yield[ksi]	Rv	Fu[ksi]	Rt
1	A992	29000	11154	.3	.65	.49	50	1.1	65	1.1
2	A36 Gr.36	29000	11154	.3	.65	.49	36	1.5	58	1.2
3	A572 Gr.50	29000	11154	.3	.65	.49	50	1.1	65	1.1
4	A500 Gr.B RND	29000	11154	.3	.65	.527	42	1.4	58	1.3
5	A500 Gr.B Rect	29000	11154	.3	.65	.527	46	1.4	58	1.3
6	A53 Gr.B	29000	11154	.3	.65	.49	35	1.6	60	1.2
7	A1085	29000	11154	.3	.65	.49	50	1.4	65	1.3
8	Q235	29000	11154	.3	.65	.49	35	1.5	58	1.2

**Member Primary Data**

	Label	I Joint	J Joint	K Joint	Rotate(deg)	Section/Shape	Type	Design List	Material	Design Rules
1	M40	N47A	N48A			Standoff Horiz...	Beam	SquareTube	A500 Gr.B...	Typical
2	M13	N20	N21			Standoff Horiz...	Beam	SquareTube	A500 Gr.B...	Typical
3	M14	N22	N23			Standoff Horiz...	Beam	SquareTube	A500 Gr.B...	Typical
4	M16	N28	N24			RIGID	None	None	RIGID	Typical
5	M20	N33	N24			RIGID	None	None	RIGID	Typical
6	M21	N30	N28			Face Horizontal	Beam	SquareTube	A500 Gr.B...	Typical
7	M15	N26	N25			RIGID	None	None	RIGID	Typical
8	M16A	N27	N25			RIGID	None	None	RIGID	Typical
9	M17	N29A	N28A			RIGID	None	None	RIGID	Typical
10	M18	N30	N28A			RIGID	None	None	RIGID	Typical
11	M19	N33	N26			Face Horizontal	Beam	SquareTube	A500 Gr.B...	Typical
12	M20A	N27	N29A			Face Horizontal	Beam	SquareTube	A500 Gr.B...	Typical
13	M21A	N34	N35		180	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
14	M22	N33A	N34			RIGID	None	None	RIGID	Typical
15	M15A	N24A	N25A		180	Grating Support	Beam	Single Angle	A36 Gr.36	Typical

**Member Primary Data (Continued)**

Label	I Joint	J Joint	K Joint	Rotate(deg)	Section/Shape	Type	Design List	Material	Design Rules
16	M16B	N31	N24A		RIGID	None	None	RIGID	Typical
17	M17A	N27A	N28B	90	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
18	M18A	N30A	N27A		RIGID	None	None	RIGID	Typical
19	M19A	N30B	N31A	90	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
20	M20B	N32	N30B		RIGID	None	None	RIGID	Typical
21	M21B	N33B	N34A	180	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
22	M22A	N32A	N33B		RIGID	None	None	RIGID	Typical
23	M23	N35A	N36	180	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
24	M24	N30C	N35A		RIGID	None	None	RIGID	Typical
25	M25	N37	N38	90	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
26	M26	N29	N37		RIGID	None	None	RIGID	Typical
27	M27	N39	N40	90	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
28	M28	N31B	N39		RIGID	None	None	RIGID	Typical
29	M29	N45	N46	180	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
30	M30	N44	N45		RIGID	None	None	RIGID	Typical
31	M31	N47	N48	180	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
32	M32	N42	N47		RIGID	None	None	RIGID	Typical
33	M33	N49	N50	90	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
34	M34	N41	N49		RIGID	None	None	RIGID	Typical
35	M35	N51	N52	90	Grating Support	Beam	Single Angle	A36 Gr.36	Typical
36	M36	N43	N51		RIGID	None	None	RIGID	Typical
37	M37	N54	N53		RIGID	None	None	RIGID	Typical
38	MP1A	N55	N56		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
39	M39	N58	N57		RIGID	None	None	RIGID	Typical
40	MP2A	N59	N60		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
41	M41	N62	N61		RIGID	None	None	RIGID	Typical
42	MP3A	N63	N64		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
43	M43	N66	N65		RIGID	None	None	RIGID	Typical
44	MP4A	N67	N68		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
45	M45	N70	N69		RIGID	None	None	RIGID	Typical
46	MP1B	N71	N72		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
47	M47	N74	N73		RIGID	None	None	RIGID	Typical
48	MP2B	N75	N76		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
49	M49	N78	N77		RIGID	None	None	RIGID	Typical
50	MP3B	N79	N80		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
51	M51	N82	N81		RIGID	None	None	RIGID	Typical
52	MP4B	N83	N84		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
53	M53	N86	N85		RIGID	None	None	RIGID	Typical
54	MP1C	N87	N88		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
55	M55	N90	N89		RIGID	None	None	RIGID	Typical
56	MP2C	N91	N92		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
57	M57	N94	N93		RIGID	None	None	RIGID	Typical
58	MP3C	N95	N96		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
59	M59	N98	N97		RIGID	None	None	RIGID	Typical
60	MP4C	N99	N100		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
61	M61	N102	N101		RIGID	None	None	RIGID	Typical
62	MP5C	N103	N104		Mount Pipe	Column	Pipe	A53 Gr.B	Typical
63	M63	N106	N105		RIGID	None	None	RIGID	Typical
64	M64	N105	N107		RIGID	None	None	RIGID	Typical
65	M65	N109	N108		RIGID	None	None	RIGID	Typical
66	M66	N108	N110		RIGID	None	None	RIGID	Typical
67	M67	N109	N106		Threaded Rod	Beam	BAR	A36 Gr.36	Typical
68	M68	N110	N107		Threaded Rod	Beam	BAR	A36 Gr.36	Typical
69	M69	N112	N111		GPS Pipe	Column	Pipe	A53 Gr.B	Typical
70	M70	N113	N114		Kicker	Beam	Double Angle (...)	A36 Gr.36	Typical
71	M71	N115	N116		Kicker	Beam	Double Angle (...)	A36 Gr.36	Typical
72	M72	N117	N118		Kicker	Beam	Double Angle (...)	A36 Gr.36	Typical



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**Member Advanced Data**

	Label	I Release	J Release	I Offset[in]	J Offset[in]	T/C Only	Physical	Defl Rat...	Analysis ...	Inactive	Seismic...
1	M40						Yes				None
2	M13						Yes				None
3	M14						Yes				None
4	M16						Yes	** NA **			None
5	M20						Yes	** NA **			None
6	M21						Yes				None
7	M15						Yes	** NA **			None
8	M16A						Yes	** NA **			None
9	M17						Yes	** NA **			None
10	M18						Yes	** NA **			None
11	M19						Yes				None
12	M20A						Yes				None
13	M21A						Yes				None
14	M22						Yes	** NA **			None
15	M15A						Yes				None
16	M16B						Yes	** NA **			None
17	M17A						Yes				None
18	M18A						Yes	** NA **			None
19	M19A						Yes				None
20	M20B						Yes	** NA **			None
21	M21B						Yes				None
22	M22A						Yes	** NA **			None
23	M23						Yes				None
24	M24						Yes	** NA **			None
25	M25						Yes				None
26	M26						Yes	** NA **			None
27	M27						Yes				None
28	M28						Yes	** NA **			None
29	M29						Yes				None
30	M30						Yes	** NA **			None
31	M31						Yes				None
32	M32						Yes	** NA **			None
33	M33						Yes				None
34	M34						Yes	** NA **			None
35	M35						Yes				None
36	M36						Yes	** NA **			None
37	M37						Yes	** NA **			None
38	MP1A						Yes	** NA **			None
39	M39						Yes	** NA **			None
40	MP2A						Yes	** NA **			None
41	M41						Yes	** NA **			None
42	MP3A						Yes	** NA **			None
43	M43						Yes	** NA **			None
44	MP4A						Yes	** NA **			None
45	M45						Yes	** NA **			None
46	MP1B						Yes	** NA **			None
47	M47						Yes	** NA **			None
48	MP2B						Yes	** NA **			None
49	M49						Yes	** NA **			None
50	MP3B						Yes	** NA **			None
51	M51						Yes	** NA **			None
52	MP4B						Yes	** NA **			None
53	M53						Yes	** NA **			None
54	MP1C						Yes	** NA **			None
55	M55						Yes	** NA **			None
56	MP2C						Yes	** NA **			None



**Member Advanced Data (Continued)**

	Label	I Release	J Release	I Offset[in]	J Offset[in]	T/C Only	Physical	Defl Rat...	Analysis ...	Inactive	Seismic...
57	M57						Yes	** NA **			None
58	MP3C						Yes	** NA **			None
59	M59						Yes	** NA **			None
60	MP4C						Yes	** NA **			None
61	M61						Yes	** NA **			None
62	MP5C						Yes	** NA **			None
63	M63						Yes	** NA **			None
64	M64						Yes	** NA **			None
65	M65						Yes	** NA **			None
66	M66	OOXOX					Yes	** NA **			None
67	M67						Yes				None
68	M68						Yes				None
69	M69						Yes	** NA **			None
70	M70	BenPIN					Yes	Default			None
71	M71	BenPIN					Yes	Default			None
72	M72	BenPIN					Yes	Default			None

**Member Point Loads (BLC 1 : Antenna D)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	Y	-43.55	2.25
2	MP1A	My	.007	2.25
3	MP1A	Mz	-.02	2.25
4	MP1A	Y	-43.55	3.25
5	MP1A	My	.007	3.25
6	MP1A	Mz	-.02	3.25
7	MP1B	Y	-43.55	2.25
8	MP1B	My	.014	2.25
9	MP1B	Mz	.017	2.25
10	MP1B	Y	-43.55	3.25
11	MP1B	My	.014	3.25
12	MP1B	Mz	.017	3.25
13	MP1C	Y	-43.55	2.25
14	MP1C	My	-.022	2.25
15	MP1C	Mz	0	2.25
16	MP1C	Y	-43.55	3.25
17	MP1C	Mv	-.022	3.25
18	MP1C	Mz	0	3.25
19	MP2A	Y	-20	1
20	MP2A	My	-.006	1
21	MP2A	Mz	-.013	1
22	MP2A	Y	-20	5
23	MP2A	Mv	-.006	5
24	MP2A	Mz	-.013	5
25	MP2B	Y	-20	1
26	MP2B	My	.014	1
27	MP2B	Mz	.001	1
28	MP2B	Y	-20	5
29	MP2B	Mv	.014	5
30	MP2B	Mz	.001	5
31	MP2A	Y	-20	1
32	MP2A	My	.013	1
33	MP2A	Mz	-.006	1
34	MP2A	Y	-20	5
35	MP2A	Mv	.013	5
36	MP2A	Mz	-.006	5



**Member Point Loads (BLC 1 : Antenna D) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
37	MP2B	Y	-20	1
38	MP2B	My	-.001	1
39	MP2B	Mz	.014	1
40	MP2B	Y	-20	5
41	MP2B	My	-.001	5
42	MP2B	Mz	.014	5
43	MP3C	Y	-20	1
44	MP3C	My	-.01	1
45	MP3C	Mz	.01	1
46	MP3C	Y	-20	5
47	MP3C	My	-.01	5
48	MP3C	Mz	.01	5
49	MP3C	Y	-20	1
50	MP3C	My	-.01	1
51	MP3C	Mz	-.01	1
52	MP3C	Y	-20	5
53	MP3C	My	-.01	5
54	MP3C	Mz	-.01	5
55	MP4A	Y	-4.95	.25
56	MP4A	My	.000846	.25
57	MP4A	Mz	-.002	.25
58	MP4A	Y	-4.95	3.5
59	MP4A	My	.000846	3.5
60	MP4A	Mz	-.002	3.5
61	MP4B	Y	-4.95	.25
62	MP4B	My	.002	.25
63	MP4B	Mz	.002	.25
64	MP4B	Y	-4.95	3.5
65	MP4B	My	.002	3.5
66	MP4B	Mz	.002	3.5
67	MP5C	Y	-4.95	.25
68	MP5C	My	-.002	.25
69	MP5C	Mz	0	.25
70	MP5C	Y	-4.95	3.5
71	MP5C	My	-.002	3.5
72	MP5C	Mz	0	3.5
73	MP3A	Y	-84.4	1
74	MP3A	My	-.054	1
75	MP3A	Mz	.025	1
76	MP3B	Y	-84.4	1
77	MP3B	My	.005	1
78	MP3B	Mz	-.059	1
79	MP4C	Y	-84.4	1
80	MP4C	My	.042	1
81	MP4C	Mz	.042	1
82	MP3A	Y	-70.3	2.5
83	MP3A	My	.021	2.5
84	MP3A	Mz	.045	2.5
85	MP3B	Y	-70.3	2.5
86	MP3B	My	-.05	2.5
87	MP3B	Mz	-.004	2.5
88	MP4C	Y	-70.3	2.5
89	MP4C	My	.035	2.5
90	MP4C	Mz	-.035	2.5
91	M69	Y	-.5	.25
92	M69	My	0	.25
93	M69	Mz	0	.25



**Member Point Loads (BLC 1 : Antenna D) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
94	MP3C	Y	-17.6	2
95	MP3C	Mv	.018	2
96	MP3C	Mz	-.006	2
97	MP3C	Y	-17.6	2
98	MP3C	Mv	.018	2
99	MP3C	Mz	.006	2

**Member Point Loads (BLC 2 : Antenna Di)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	Y	-53.174	2.25
2	MP1A	My	.009	2.25
3	MP1A	Mz	-.025	2.25
4	MP1A	Y	-53.174	3.25
5	MP1A	Mv	.009	3.25
6	MP1A	Mz	-.025	3.25
7	MP1B	Y	-53.174	2.25
8	MP1B	My	.017	2.25
9	MP1B	Mz	.02	2.25
10	MP1B	Y	-53.174	3.25
11	MP1B	Mv	.017	3.25
12	MP1B	Mz	.02	3.25
13	MP1C	Y	-53.174	2.25
14	MP1C	Mv	-.027	2.25
15	MP1C	Mz	0	2.25
16	MP1C	Y	-53.174	3.25
17	MP1C	Mv	-.027	3.25
18	MP1C	Mz	0	3.25
19	MP2A	Y	-90.956	1
20	MP2A	My	-.027	1
21	MP2A	Mz	-.058	1
22	MP2A	Y	-90.956	5
23	MP2A	Mv	-.027	5
24	MP2A	Mz	-.058	5
25	MP2B	Y	-90.956	1
26	MP2B	Mv	.064	1
27	MP2B	Mz	.006	1
28	MP2B	Y	-90.956	5
29	MP2B	Mv	.064	5
30	MP2B	Mz	.006	5
31	MP2A	Y	-90.956	1
32	MP2A	My	.058	1
33	MP2A	Mz	-.027	1
34	MP2A	Y	-90.956	5
35	MP2A	Mv	.058	5
36	MP2A	Mz	-.027	5
37	MP2B	Y	-90.956	1
38	MP2B	My	-.006	1
39	MP2B	Mz	.064	1
40	MP2B	Y	-90.956	5
41	MP2B	My	-.006	5
42	MP2B	Mz	.064	5
43	MP3C	Y	-90.956	1
44	MP3C	Mv	-.045	1
45	MP3C	Mz	.045	1
46	MP3C	Y	-90.956	5
47	MP3C	My	-.045	5



**Member Point Loads (BLC 2 : Antenna Di) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
48	MP3C	Mz	.045	5
49	MP3C	Y	-90.956	1
50	MP3C	My	-.045	1
51	MP3C	Mz	-.045	1
52	MP3C	Y	-90.956	5
53	MP3C	My	-.045	5
54	MP3C	Mz	-.045	5
55	MP4A	Y	-53.672	.25
56	MP4A	My	.009	.25
57	MP4A	Mz	-.025	.25
58	MP4A	Y	-53.672	3.5
59	MP4A	My	.009	3.5
60	MP4A	Mz	-.025	3.5
61	MP4B	Y	-53.672	.25
62	MP4B	My	.017	.25
63	MP4B	Mz	.021	.25
64	MP4B	Y	-53.672	3.5
65	MP4B	My	.017	3.5
66	MP4B	Mz	.021	3.5
67	MP5C	Y	-53.672	.25
68	MP5C	My	-.027	.25
69	MP5C	Mz	0	.25
70	MP5C	Y	-53.672	3.5
71	MP5C	My	-.027	3.5
72	MP5C	Mz	0	3.5
73	MP3A	Y	-67.597	1
74	MP3A	My	-.043	1
75	MP3A	Mz	.02	1
76	MP3B	Y	-67.597	1
77	MP3B	My	.004	1
78	MP3B	Mz	-.048	1
79	MP4C	Y	-67.597	1
80	MP4C	My	.034	1
81	MP4C	Mz	.034	1
82	MP3A	Y	-60.908	2.5
83	MP3A	My	.018	2.5
84	MP3A	Mz	.039	2.5
85	MP3B	Y	-60.908	2.5
86	MP3B	My	-.043	2.5
87	MP3B	Mz	-.004	2.5
88	MP4C	Y	-60.908	2.5
89	MP4C	My	.03	2.5
90	MP4C	Mz	-.03	2.5
91	M69	Y	-2.61	.25
92	M69	My	0	.25
93	M69	Mz	0	.25
94	MP3C	Y	6.6	2
95	MP3C	My	-.007	2
96	MP3C	Mz	.002	2
97	MP3C	Y	6.6	2
98	MP3C	My	-.007	2
99	MP3C	Mz	-.002	2

**Member Point Loads (BLC 3 : Antenna Wo (0 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
1	MP1A	X	0	2.25



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

Nov 27, 2023  
 11:30 AM  
 Checked By: \_\_\_\_\_

**Member Point Loads (BLC 3 : Antenna Wo (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
2	MP1A	Z	-41.319	2.25
3	MP1A	Mx	.019	2.25
4	MP1A	X	0	3.25
5	MP1A	Z	-41.319	3.25
6	MP1A	Mx	.019	3.25
7	MP1B	X	0	2.25
8	MP1B	Z	-57.415	2.25
9	MP1B	Mx	-.022	2.25
10	MP1B	X	0	3.25
11	MP1B	Z	-57.415	3.25
12	MP1B	Mx	-.022	3.25
13	MP1C	X	0	2.25
14	MP1C	Z	-89.304	2.25
15	MP1C	Mx	0	2.25
16	MP1C	X	0	3.25
17	MP1C	Z	-89.304	3.25
18	MP1C	Mx	0	3.25
19	MP2A	X	0	1
20	MP2A	Z	-52.144	1
21	MP2A	Mx	.033	1
22	MP2A	X	0	5
23	MP2A	Z	-52.144	5
24	MP2A	Mx	.033	5
25	MP2B	X	0	1
26	MP2B	Z	-69.861	1
27	MP2B	Mx	-.004	1
28	MP2B	X	0	5
29	MP2B	Z	-69.861	5
30	MP2B	Mx	-.004	5
31	MP2A	X	0	1
32	MP2A	Z	-52.144	1
33	MP2A	Mx	.016	1
34	MP2A	X	0	5
35	MP2A	Z	-52.144	5
36	MP2A	Mx	.016	5
37	MP2B	X	0	1
38	MP2B	Z	-69.861	1
39	MP2B	Mx	-.049	1
40	MP2B	X	0	5
41	MP2B	Z	-69.861	5
42	MP2B	Mx	-.049	5
43	MP3C	X	0	1
44	MP3C	Z	-104.962	1
45	MP3C	Mx	-.052	1
46	MP3C	X	0	5
47	MP3C	Z	-104.962	5
48	MP3C	Mx	-.052	5
49	MP3C	X	0	1
50	MP3C	Z	-104.962	1
51	MP3C	Mx	.052	1
52	MP3C	X	0	5
53	MP3C	Z	-104.962	5
54	MP3C	Mx	.052	5
55	MP4A	X	0	.25
56	MP4A	Z	-52.924	.25
57	MP4A	Mx	.025	.25
58	MP4A	X	0	3.5





**Member Point Loads (BLC 3 : Antenna Wo (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
59	MP4A	Z	-52.924	3.5
60	MP4A	Mx	.025	3.5
61	MP4B	X	0	.25
62	MP4B	Z	-65.37	.25
63	MP4B	Mx	-.025	.25
64	MP4B	X	0	3.5
65	MP4B	Z	-65.37	3.5
66	MP4B	Mx	-.025	3.5
67	MP5C	X	0	.25
68	MP5C	Z	-90.027	.25
69	MP5C	Mx	0	.25
70	MP5C	X	0	3.5
71	MP5C	Z	-90.027	3.5
72	MP5C	Mx	0	3.5
73	MP3A	X	0	1
74	MP3A	Z	-41.896	1
75	MP3A	Mx	-.013	1
76	MP3B	X	0	1
77	MP3B	Z	-47.651	1
78	MP3B	Mx	.034	1
79	MP4C	X	0	1
80	MP4C	Z	-59.053	1
81	MP4C	Mx	-.03	1
82	MP3A	X	0	2.5
83	MP3A	Z	-35.413	2.5
84	MP3A	Mx	-.023	2.5
85	MP3B	X	0	2.5
86	MP3B	Z	-43.292	2.5
87	MP3B	Mx	.003	2.5
88	MP4C	X	0	2.5
89	MP4C	Z	-58.903	2.5
90	MP4C	Mx	.029	2.5
91	M69	X	0	.25
92	M69	Z	-3.032	.25
93	M69	Mx	0	.25
94	MP3C	X	0	2
95	MP3C	Z	-36.388	2
96	MP3C	Mx	.012	2
97	MP3C	X	0	2
98	MP3C	Z	-36.388	2
99	MP3C	Mx	-.012	2

**Member Point Loads (BLC 4 : Antenna Wo (30 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	18.3	2.25
2	MP1A	Z	-31.697	2.25
3	MP1A	Mx	.018	2.25
4	MP1A	X	18.3	3.25
5	MP1A	Z	-31.697	3.25
6	MP1A	Mx	.018	3.25
7	MP1B	X	41.474	2.25
8	MP1B	Z	-71.834	2.25
9	MP1B	Mx	-.014	2.25
10	MP1B	X	41.474	3.25
11	MP1B	Z	-71.834	3.25
12	MP1B	Mx	-.014	3.25



**Member Point Loads (BLC 4 : Antenna Wo (30 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
13	MP1C	X	37.859	2.25
14	MP1C	Z	-65.574	2.25
15	MP1C	Mx	-.019	2.25
16	MP1C	X	37.859	3.25
17	MP1C	Z	-65.574	3.25
18	MP1C	Mx	-.019	3.25
19	MP2A	X	23.475	1
20	MP2A	Z	-40.661	1
21	MP2A	Mx	.019	1
22	MP2A	X	23.475	5
23	MP2A	Z	-40.661	5
24	MP2A	Mx	.019	5
25	MP2B	X	48.983	1
26	MP2B	Z	-84.84	1
27	MP2B	Mx	.029	1
28	MP2B	X	48.983	5
29	MP2B	Z	-84.84	5
30	MP2B	Mx	.029	5
31	MP2A	X	23.475	1
32	MP2A	Z	-40.661	1
33	MP2A	Mx	.027	1
34	MP2A	X	23.475	5
35	MP2A	Z	-40.661	5
36	MP2A	Mx	.027	5
37	MP2B	X	48.983	1
38	MP2B	Z	-84.84	1
39	MP2B	Mx	-.063	1
40	MP2B	X	48.983	5
41	MP2B	Z	-84.84	5
42	MP2B	Mx	-.063	5
43	MP3C	X	45.004	1
44	MP3C	Z	-77.95	1
45	MP3C	Mx	-.061	1
46	MP3C	X	45.004	5
47	MP3C	Z	-77.95	5
48	MP3C	Mx	-.061	5
49	MP3C	X	45.004	1
50	MP3C	Z	-77.95	1
51	MP3C	Mx	.016	1
52	MP3C	X	45.004	5
53	MP3C	Z	-77.95	5
54	MP3C	Mx	.016	5
55	MP4A	X	24.638	.25
56	MP4A	Z	-42.674	.25
57	MP4A	Mx	.024	.25
58	MP4A	X	24.638	3.5
59	MP4A	Z	-42.674	3.5
60	MP4A	Mx	.024	3.5
61	MP4B	X	42.556	.25
62	MP4B	Z	-73.709	.25
63	MP4B	Mx	-.015	.25
64	MP4B	X	42.556	3.5
65	MP4B	Z	-73.709	3.5
66	MP4B	Mx	-.015	3.5
67	MP5C	X	39.761	.25
68	MP5C	Z	-68.868	.25
69	MP5C	Mx	-.02	.25



**Member Point Loads (BLC 4 : Antenna Wo (30 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
70	MP5C	X	39.761	3.5
71	MP5C	Z	-68.868	3.5
72	MP5C	Mx	-.02	3.5
73	MP3A	X	20.104	1
74	MP3A	Z	-34.822	1
75	MP3A	Mx	-.023	1
76	MP3B	X	28.39	1
77	MP3B	Z	-49.173	1
78	MP3B	Mx	.036	1
79	MP4C	X	27.098	1
80	MP4C	Z	-46.935	1
81	MP4C	Mx	-.01	1
82	MP3A	X	16.552	2.5
83	MP3A	Z	-28.669	2.5
84	MP3A	Mx	-.013	2.5
85	MP3B	X	27.895	2.5
86	MP3B	Z	-48.316	2.5
87	MP3B	Mx	-.017	2.5
88	MP4C	X	26.126	2.5
89	MP4C	Z	-45.252	2.5
90	MP4C	Mx	.036	2.5
91	M69	X	1.671	.25
92	M69	Z	-2.894	.25
93	M69	Mx	0	.25
94	MP3C	X	18.207	2
95	MP3C	Z	-31.536	2
96	MP3C	Mx	.029	2
97	MP3C	X	18.207	2
98	MP3C	Z	-31.536	2
99	MP3C	Mx	.008	2

**Member Point Loads (BLC 5 : Antenna Wo (60 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	49.723	2.25
2	MP1A	Z	-28.708	2.25
3	MP1A	Mx	.022	2.25
4	MP1A	X	49.723	3.25
5	MP1A	Z	-28.708	3.25
6	MP1A	Mx	.022	3.25
7	MP1B	X	75.921	2.25
8	MP1B	Z	-43.833	2.25
9	MP1B	Mx	.008	2.25
10	MP1B	X	75.921	3.25
11	MP1B	Z	-43.833	3.25
12	MP1B	Mx	.008	3.25
13	MP1C	X	42.044	2.25
14	MP1C	Z	-24.274	2.25
15	MP1C	Mx	-.021	2.25
16	MP1C	X	42.044	3.25
17	MP1C	Z	-24.274	3.25
18	MP1C	Mx	-.021	3.25
19	MP2A	X	60.502	1
20	MP2A	Z	-34.931	1
21	MP2A	Mx	.004	1
22	MP2A	X	60.502	5
23	MP2A	Z	-34.931	5



**Member Point Loads (BLC 5 : Antenna Wo (60 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb,k-ft]	Location[ft,%]
24	MP2A	Mx	.004	5
25	MP2B	X	89.338	1
26	MP2B	Z	-51.579	1
27	MP2B	Mx	.06	1
28	MP2B	X	89.338	5
29	MP2B	Z	-51.579	5
30	MP2B	Mx	.06	5
31	MP2A	X	60.502	1
32	MP2A	Z	-34.931	1
33	MP2A	Mx	.049	1
34	MP2A	X	60.502	5
35	MP2A	Z	-34.931	5
36	MP2A	Mx	.049	5
37	MP2B	X	89.338	1
38	MP2B	Z	-51.579	1
39	MP2B	Mx	-.042	1
40	MP2B	X	89.338	5
41	MP2B	Z	-51.579	5
42	MP2B	Mx	-.042	5
43	MP3C	X	52.049	1
44	MP3C	Z	-30.05	1
45	MP3C	Mx	-.041	1
46	MP3C	X	52.049	5
47	MP3C	Z	-30.05	5
48	MP3C	Mx	-.041	5
49	MP3C	X	52.049	1
50	MP3C	Z	-30.05	1
51	MP3C	Mx	-.011	1
52	MP3C	X	52.049	5
53	MP3C	Z	-30.05	5
54	MP3C	Mx	-.011	5
55	MP4A	X	56.612	.25
56	MP4A	Z	-32.685	.25
57	MP4A	Mx	.025	.25
58	MP4A	X	56.612	3.5
59	MP4A	Z	-32.685	3.5
60	MP4A	Mx	.025	3.5
61	MP4B	X	76.868	.25
62	MP4B	Z	-44.38	.25
63	MP4B	Mx	.008	.25
64	MP4B	X	76.868	3.5
65	MP4B	Z	-44.38	3.5
66	MP4B	Mx	.008	3.5
67	MP5C	X	50.674	.25
68	MP5C	Z	-29.257	.25
69	MP5C	Mx	-.025	.25
70	MP5C	X	50.674	3.5
71	MP5C	Z	-29.257	3.5
72	MP5C	Mx	-.025	3.5
73	MP3A	X	41.267	1
74	MP3A	Z	-23.825	1
75	MP3A	Mx	-.034	1
76	MP3B	X	50.634	1
77	MP3B	Z	-29.234	1
78	MP3B	Mx	.024	1
79	MP4C	X	38.521	1
80	MP4C	Z	-22.24	1



**Member Point Loads (BLC 5 : Antenna Wo (60 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
81	MP4C	Mx	.008	1
82	MP3A	X	37.492	2.5
83	MP3A	Z	-21.646	2.5
84	MP3A	Mx	-.003	2.5
85	MP3B	X	50.317	2.5
86	MP3B	Z	-29.05	2.5
87	MP3B	Mx	-.034	2.5
88	MP4C	X	33.733	2.5
89	MP4C	Z	-19.476	2.5
90	MP4C	Mx	.027	2.5
91	M69	X	3.43	.25
92	M69	Z	-1.98	.25
93	M69	Mx	0	.25
94	MP3C	X	31.582	2
95	MP3C	Z	-18.234	2
96	MP3C	Mx	.038	2
97	MP3C	X	31.582	2
98	MP3C	Z	-18.234	2
99	MP3C	Mx	.026	2

**Member Point Loads (BLC 6 : Antenna Wo (90 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	82.947	2.25
2	MP1A	Z	0	2.25
3	MP1A	Mx	.014	2.25
4	MP1A	X	82.947	3.25
5	MP1A	Z	0	3.25
6	MP1A	Mx	.014	3.25
7	MP1B	X	66.851	2.25
8	MP1B	Z	0	2.25
9	MP1B	Mx	.021	2.25
10	MP1B	X	66.851	3.25
11	MP1B	Z	0	3.25
12	MP1B	Mx	.021	3.25
13	MP1C	X	34.962	2.25
14	MP1C	Z	0	2.25
15	MP1C	Mx	-.017	2.25
16	MP1C	X	34.962	3.25
17	MP1C	Z	0	3.25
18	MP1C	Mx	-.017	3.25
19	MP2A	X	97.965	1
20	MP2A	Z	0	1
21	MP2A	Mx	-.029	1
22	MP2A	X	97.965	5
23	MP2A	Z	0	5
24	MP2A	Mx	-.029	5
25	MP2B	X	80.248	1
26	MP2B	Z	0	1
27	MP2B	Mx	.057	1
28	MP2B	X	80.248	5
29	MP2B	Z	0	5
30	MP2B	Mx	.057	5
31	MP2A	X	97.965	1
32	MP2A	Z	0	1
33	MP2A	Mx	.063	1
34	MP2A	X	97.965	5



**Member Point Loads (BLC 6 : Antenna Wo (90 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb,k-ft]	Location(ft,%)
35	MP2A	Z	0	5
36	MP2A	Mx	.063	5
37	MP2B	X	80.248	1
38	MP2B	Z	0	1
39	MP2B	Mx	-.005	1
40	MP2B	X	80.248	5
41	MP2B	Z	0	5
42	MP2B	Mx	-.005	5
43	MP3C	X	45.147	1
44	MP3C	Z	0	1
45	MP3C	Mx	-.023	1
46	MP3C	X	45.147	5
47	MP3C	Z	0	5
48	MP3C	Mx	-.023	5
49	MP3C	X	45.147	1
50	MP3C	Z	0	1
51	MP3C	Mx	-.023	1
52	MP3C	X	45.147	5
53	MP3C	Z	0	5
54	MP3C	Mx	-.023	5
55	MP4A	X	85.112	.25
56	MP4A	Z	0	.25
57	MP4A	Mx	.015	.25
58	MP4A	X	85.112	3.5
59	MP4A	Z	0	3.5
60	MP4A	Mx	.015	3.5
61	MP4B	X	72.666	.25
62	MP4B	Z	0	.25
63	MP4B	Mx	.023	.25
64	MP4B	X	72.666	3.5
65	MP4B	Z	0	3.5
66	MP4B	Mx	.023	3.5
67	MP5C	X	48.009	.25
68	MP5C	Z	0	.25
69	MP5C	Mx	-.024	.25
70	MP5C	X	48.009	3.5
71	MP5C	Z	0	3.5
72	MP5C	Mx	-.024	3.5
73	MP3A	X	56.78	1
74	MP3A	Z	0	1
75	MP3A	Mx	-.036	1
76	MP3B	X	51.025	1
77	MP3B	Z	0	1
78	MP3B	Mx	.003	1
79	MP4C	X	39.623	1
80	MP4C	Z	0	1
81	MP4C	Mx	.02	1
82	MP3A	X	55.791	2.5
83	MP3A	Z	0	2.5
84	MP3A	Mx	.017	2.5
85	MP3B	X	47.912	2.5
86	MP3B	Z	0	2.5
87	MP3B	Mx	-.034	2.5
88	MP4C	X	32.301	2.5
89	MP4C	Z	0	2.5
90	MP4C	Mx	.016	2.5
91	M69	X	4.27	.25



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**Member Point Loads (BLC 6 : Antenna Wo (90 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
92	M69	Z	0	.25
93	M69	Mx	0	.25
94	MP3C	X	36.495	2
95	MP3C	Z	0	2
96	MP3C	Mx	.036	2
97	MP3C	X	36.495	2
98	MP3C	Z	0	2
99	MP3C	Mx	.036	2

**Member Point Loads (BLC 7 : Antenna Wo (120 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	75.921	2.25
2	MP1A	Z	43.833	2.25
3	MP1A	Mx	-.008	2.25
4	MP1A	X	75.921	3.25
5	MP1A	Z	43.833	3.25
6	MP1A	Mx	-.008	3.25
7	MP1B	X	35.783	2.25
8	MP1B	Z	20.66	2.25
9	MP1B	Mx	.019	2.25
10	MP1B	X	35.783	3.25
11	MP1B	Z	20.66	3.25
12	MP1B	Mx	.019	3.25
13	MP1C	X	42.044	2.25
14	MP1C	Z	24.274	2.25
15	MP1C	Mx	-.021	2.25
16	MP1C	X	42.044	3.25
17	MP1C	Z	24.274	3.25
18	MP1C	Mx	-.021	3.25
19	MP2A	X	89.338	1
20	MP2A	Z	51.579	1
21	MP2A	Mx	-.06	1
22	MP2A	X	89.338	5
23	MP2A	Z	51.579	5
24	MP2A	Mx	-.06	5
25	MP2B	X	45.158	1
26	MP2B	Z	26.072	1
27	MP2B	Mx	.033	1
28	MP2B	X	45.158	5
29	MP2B	Z	26.072	5
30	MP2B	Mx	.033	5
31	MP2A	X	89.338	1
32	MP2A	Z	51.579	1
33	MP2A	Mx	.042	1
34	MP2A	X	89.338	5
35	MP2A	Z	51.579	5
36	MP2A	Mx	.042	5
37	MP2B	X	45.158	1
38	MP2B	Z	26.072	1
39	MP2B	Mx	.016	1
40	MP2B	X	45.158	5
41	MP2B	Z	26.072	5
42	MP2B	Mx	.016	5
43	MP3C	X	52.049	1
44	MP3C	Z	30.05	1
45	MP3C	Mx	-.011	1



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**Member Point Loads (BLC 7 : Antenna Wo (120 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
46	MP3C	X	52.049	5
47	MP3C	Z	30.05	5
48	MP3C	Mx	-.011	5
49	MP3C	X	52.049	1
50	MP3C	Z	30.05	1
51	MP3C	Mx	-.041	1
52	MP3C	X	52.049	5
53	MP3C	Z	30.05	5
54	MP3C	Mx	-.041	5
55	MP4A	X	76.868	.25
56	MP4A	Z	44.38	.25
57	MP4A	Mx	-.008	.25
58	MP4A	X	76.868	3.5
59	MP4A	Z	44.38	3.5
60	MP4A	Mx	-.008	3.5
61	MP4B	X	45.833	.25
62	MP4B	Z	26.462	.25
63	MP4B	Mx	.025	.25
64	MP4B	X	45.833	3.5
65	MP4B	Z	26.462	3.5
66	MP4B	Mx	.025	3.5
67	MP5C	X	50.674	.25
68	MP5C	Z	29.257	.25
69	MP5C	Mx	-.025	.25
70	MP5C	X	50.674	3.5
71	MP5C	Z	29.257	3.5
72	MP5C	Mx	-.025	3.5
73	MP3A	X	50.634	1
74	MP3A	Z	29.234	1
75	MP3A	Mx	-.024	1
76	MP3B	X	36.283	1
77	MP3B	Z	20.948	1
78	MP3B	Mx	-.013	1
79	MP4C	X	38.521	1
80	MP4C	Z	22.24	1
81	MP4C	Mx	.03	1
82	MP3A	X	50.317	2.5
83	MP3A	Z	29.05	2.5
84	MP3A	Mx	.034	2.5
85	MP3B	X	30.669	2.5
86	MP3B	Z	17.707	2.5
87	MP3B	Mx	-.023	2.5
88	MP4C	X	33.733	2.5
89	MP4C	Z	19.476	2.5
90	MP4C	Mx	.007	2.5
91	M69	X	3.43	.25
92	M69	Z	1.98	.25
93	M69	Mx	0	.25
94	MP3C	X	31.582	2
95	MP3C	Z	18.234	2
96	MP3C	Mx	.026	2
97	MP3C	X	31.582	2
98	MP3C	Z	18.234	2
99	MP3C	Mx	.038	2

**Member Point Loads (BLC 8 : Antenna Wo (150 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
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**Member Point Loads (BLC 8 : Antenna Wo (150 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	33.426	2.25
2	MP1A	Z	57.895	2.25
3	MP1A	Mx	-.021	2.25
4	MP1A	X	33.426	3.25
5	MP1A	Z	57.895	3.25
6	MP1A	Mx	-.021	3.25
7	MP1B	X	18.3	2.25
8	MP1B	Z	31.697	2.25
9	MP1B	Mx	.018	2.25
10	MP1B	X	18.3	3.25
11	MP1B	Z	31.697	3.25
12	MP1B	Mx	.018	3.25
13	MP1C	X	37.859	2.25
14	MP1C	Z	65.574	2.25
15	MP1C	Mx	-.019	2.25
16	MP1C	X	37.859	3.25
17	MP1C	Z	65.574	3.25
18	MP1C	Mx	-.019	3.25
19	MP2A	X	40.124	1
20	MP2A	Z	69.497	1
21	MP2A	Mx	-.057	1
22	MP2A	X	40.124	5
23	MP2A	Z	69.497	5
24	MP2A	Mx	-.057	5
25	MP2B	X	23.475	1
26	MP2B	Z	40.661	1
27	MP2B	Mx	.019	1
28	MP2B	X	23.475	5
29	MP2B	Z	40.661	5
30	MP2B	Mx	.019	5
31	MP2A	X	40.124	1
32	MP2A	Z	69.497	1
33	MP2A	Mx	.005	1
34	MP2A	X	40.124	5
35	MP2A	Z	69.497	5
36	MP2A	Mx	.005	5
37	MP2B	X	23.475	1
38	MP2B	Z	40.661	1
39	MP2B	Mx	.027	1
40	MP2B	X	23.475	5
41	MP2B	Z	40.661	5
42	MP2B	Mx	.027	5
43	MP3C	X	45.004	1
44	MP3C	Z	77.95	1
45	MP3C	Mx	.016	1
46	MP3C	X	45.004	5
47	MP3C	Z	77.95	5
48	MP3C	Mx	.016	5
49	MP3C	X	45.004	1
50	MP3C	Z	77.95	1
51	MP3C	Mx	-.061	1
52	MP3C	X	45.004	5
53	MP3C	Z	77.95	5
54	MP3C	Mx	-.061	5
55	MP4A	X	36.333	.25
56	MP4A	Z	62.931	.25
57	MP4A	Mx	-.023	.25



**Member Point Loads (BLC 8 : Antenna Wo (150 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
58	MP4A	X	36.333	3.5
59	MP4A	Z	62.931	3.5
60	MP4A	Mx	-.023	3.5
61	MP4B	X	24.638	.25
62	MP4B	Z	42.674	.25
63	MP4B	Mx	.024	.25
64	MP4B	X	24.638	3.5
65	MP4B	Z	42.674	3.5
66	MP4B	Mx	.024	3.5
67	MP5C	X	39.761	.25
68	MP5C	Z	68.868	.25
69	MP5C	Mx	-.02	.25
70	MP5C	X	39.761	3.5
71	MP5C	Z	68.868	3.5
72	MP5C	Mx	-.02	3.5
73	MP3A	X	25.513	1
74	MP3A	Z	44.189	1
75	MP3A	Mx	-.003	1
76	MP3B	X	20.104	1
77	MP3B	Z	34.822	1
78	MP3B	Mx	-.023	1
79	MP4C	X	27.098	1
80	MP4C	Z	46.935	1
81	MP4C	Mx	.037	1
82	MP3A	X	23.956	2.5
83	MP3A	Z	41.493	2.5
84	MP3A	Mx	.034	2.5
85	MP3B	X	16.552	2.5
86	MP3B	Z	28.669	2.5
87	MP3B	Mx	-.013	2.5
88	MP4C	X	26.126	2.5
89	MP4C	Z	45.252	2.5
90	MP4C	Mx	-.01	2.5
91	M69	X	1.671	.25
92	M69	Z	2.894	.25
93	M69	Mx	0	.25
94	MP3C	X	18.207	2
95	MP3C	Z	31.536	2
96	MP3C	Mx	.008	2
97	MP3C	X	18.207	2
98	MP3C	Z	31.536	2
99	MP3C	Mx	.029	2

**Member Point Loads (BLC 9 : Antenna Wo (180 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	0	2.25
2	MP1A	Z	41.319	2.25
3	MP1A	Mx	-.019	2.25
4	MP1A	X	0	3.25
5	MP1A	Z	41.319	3.25
6	MP1A	Mx	-.019	3.25
7	MP1B	X	0	2.25
8	MP1B	Z	57.415	2.25
9	MP1B	Mx	.022	2.25
10	MP1B	X	0	3.25
11	MP1B	Z	57.415	3.25



**Member Point Loads (BLC 9 : Antenna Wo (180 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
12	MP1B	Mx	.022	3.25
13	MP1C	X	0	2.25
14	MP1C	Z	89.304	2.25
15	MP1C	Mx	0	2.25
16	MP1C	X	0	3.25
17	MP1C	Z	89.304	3.25
18	MP1C	Mx	0	3.25
19	MP2A	X	0	1
20	MP2A	Z	52.144	1
21	MP2A	Mx	-.033	1
22	MP2A	X	0	5
23	MP2A	Z	52.144	5
24	MP2A	Mx	-.033	5
25	MP2B	X	0	1
26	MP2B	Z	69.861	1
27	MP2B	Mx	.004	1
28	MP2B	X	0	5
29	MP2B	Z	69.861	5
30	MP2B	Mx	.004	5
31	MP2A	X	0	1
32	MP2A	Z	52.144	1
33	MP2A	Mx	-.016	1
34	MP2A	X	0	5
35	MP2A	Z	52.144	5
36	MP2A	Mx	-.016	5
37	MP2B	X	0	1
38	MP2B	Z	69.861	1
39	MP2B	Mx	.049	1
40	MP2B	X	0	5
41	MP2B	Z	69.861	5
42	MP2B	Mx	.049	5
43	MP3C	X	0	1
44	MP3C	Z	104.962	1
45	MP3C	Mx	.052	1
46	MP3C	X	0	5
47	MP3C	Z	104.962	5
48	MP3C	Mx	.052	5
49	MP3C	X	0	1
50	MP3C	Z	104.962	1
51	MP3C	Mx	-.052	1
52	MP3C	X	0	5
53	MP3C	Z	104.962	5
54	MP3C	Mx	-.052	5
55	MP4A	X	0	.25
56	MP4A	Z	52.924	.25
57	MP4A	Mx	-.025	.25
58	MP4A	X	0	3.5
59	MP4A	Z	52.924	3.5
60	MP4A	Mx	-.025	3.5
61	MP4B	X	0	.25
62	MP4B	Z	65.37	.25
63	MP4B	Mx	.025	.25
64	MP4B	X	0	3.5
65	MP4B	Z	65.37	3.5
66	MP4B	Mx	.025	3.5
67	MP5C	X	0	.25
68	MP5C	Z	90.027	.25



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**Member Point Loads (BLC 9 : Antenna Wo (180 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
69	MP5C	Mx	0	.25
70	MP5C	X	0	3.5
71	MP5C	Z	90.027	3.5
72	MP5C	Mx	0	3.5
73	MP3A	X	0	1
74	MP3A	Z	41.896	1
75	MP3A	Mx	.013	1
76	MP3B	X	0	1
77	MP3B	Z	47.651	1
78	MP3B	Mx	-.034	1
79	MP4C	X	0	1
80	MP4C	Z	59.053	1
81	MP4C	Mx	.03	1
82	MP3A	X	0	2.5
83	MP3A	Z	35.413	2.5
84	MP3A	Mx	.023	2.5
85	MP3B	X	0	2.5
86	MP3B	Z	43.292	2.5
87	MP3B	Mx	-.003	2.5
88	MP4C	X	0	2.5
89	MP4C	Z	58.903	2.5
90	MP4C	Mx	-.029	2.5
91	M69	X	0	.25
92	M69	Z	3.032	.25
93	M69	Mx	0	.25
94	MP3C	X	0	2
95	MP3C	Z	36.388	2
96	MP3C	Mx	-.012	2
97	MP3C	X	0	2
98	MP3C	Z	36.388	2
99	MP3C	Mx	.012	2

**Member Point Loads (BLC 10 : Antenna Wo (210 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-18.3	2.25
2	MP1A	Z	31.697	2.25
3	MP1A	Mx	-.018	2.25
4	MP1A	X	-18.3	3.25
5	MP1A	Z	31.697	3.25
6	MP1A	Mx	-.018	3.25
7	MP1B	X	-41.474	2.25
8	MP1B	Z	71.834	2.25
9	MP1B	Mx	.014	2.25
10	MP1B	X	-41.474	3.25
11	MP1B	Z	71.834	3.25
12	MP1B	Mx	.014	3.25
13	MP1C	X	-37.859	2.25
14	MP1C	Z	65.574	2.25
15	MP1C	Mx	.019	2.25
16	MP1C	X	-37.859	3.25
17	MP1C	Z	65.574	3.25
18	MP1C	Mx	.019	3.25
19	MP2A	X	-23.475	1
20	MP2A	Z	40.661	1
21	MP2A	Mx	-.019	1
22	MP2A	X	-23.475	5



**Member Point Loads (BLC 10 : Antenna Wo (210 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
23	MP2A	Z	40.661	5
24	MP2A	Mx	-.019	5
25	MP2B	X	-48.983	1
26	MP2B	Z	84.84	1
27	MP2B	Mx	-.029	1
28	MP2B	X	-48.983	5
29	MP2B	Z	84.84	5
30	MP2B	Mx	-.029	5
31	MP2A	X	-23.475	1
32	MP2A	Z	40.661	1
33	MP2A	Mx	-.027	1
34	MP2A	X	-23.475	5
35	MP2A	Z	40.661	5
36	MP2A	Mx	-.027	5
37	MP2B	X	-48.983	1
38	MP2B	Z	84.84	1
39	MP2B	Mx	.063	1
40	MP2B	X	-48.983	5
41	MP2B	Z	84.84	5
42	MP2B	Mx	.063	5
43	MP3C	X	-45.004	1
44	MP3C	Z	77.95	1
45	MP3C	Mx	.061	1
46	MP3C	X	-45.004	5
47	MP3C	Z	77.95	5
48	MP3C	Mx	.061	5
49	MP3C	X	-45.004	1
50	MP3C	Z	77.95	1
51	MP3C	Mx	-.016	1
52	MP3C	X	-45.004	5
53	MP3C	Z	77.95	5
54	MP3C	Mx	-.016	5
55	MP4A	X	-24.638	.25
56	MP4A	Z	42.674	.25
57	MP4A	Mx	-.024	.25
58	MP4A	X	-24.638	3.5
59	MP4A	Z	42.674	3.5
60	MP4A	Mx	-.024	3.5
61	MP4B	X	-42.556	.25
62	MP4B	Z	73.709	.25
63	MP4B	Mx	.015	.25
64	MP4B	X	-42.556	3.5
65	MP4B	Z	73.709	3.5
66	MP4B	Mx	.015	3.5
67	MP5C	X	-39.761	.25
68	MP5C	Z	68.868	.25
69	MP5C	Mx	.02	.25
70	MP5C	X	-39.761	3.5
71	MP5C	Z	68.868	3.5
72	MP5C	Mx	.02	3.5
73	MP3A	X	-20.104	1
74	MP3A	Z	34.822	1
75	MP3A	Mx	.023	1
76	MP3B	X	-28.39	1
77	MP3B	Z	49.173	1
78	MP3B	Mx	-.036	1
79	MP4C	X	-27.098	1



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**Member Point Loads (BLC 10 : Antenna Wo (210 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
80	MP4C	Z	46.935	1
81	MP4C	Mx	.01	1
82	MP3A	X	-16.552	2.5
83	MP3A	Z	28.669	2.5
84	MP3A	Mx	.013	2.5
85	MP3B	X	-27.895	2.5
86	MP3B	Z	48.316	2.5
87	MP3B	Mx	.017	2.5
88	MP4C	X	-26.126	2.5
89	MP4C	Z	45.252	2.5
90	MP4C	Mx	-.036	2.5
91	M69	X	-1.671	.25
92	M69	Z	2.894	.25
93	M69	Mx	0	.25
94	MP3C	X	-18.207	2
95	MP3C	Z	31.536	2
96	MP3C	Mx	-.029	2
97	MP3C	X	-18.207	2
98	MP3C	Z	31.536	2
99	MP3C	Mx	-.008	2

**Member Point Loads (BLC 11 : Antenna Wo (240 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-49.723	2.25
2	MP1A	Z	28.708	2.25
3	MP1A	Mx	-.022	2.25
4	MP1A	X	-49.723	3.25
5	MP1A	Z	28.708	3.25
6	MP1A	Mx	-.022	3.25
7	MP1B	X	-75.921	2.25
8	MP1B	Z	43.833	2.25
9	MP1B	Mx	-.008	2.25
10	MP1B	X	-75.921	3.25
11	MP1B	Z	43.833	3.25
12	MP1B	Mx	-.008	3.25
13	MP1C	X	-42.044	2.25
14	MP1C	Z	24.274	2.25
15	MP1C	Mx	.021	2.25
16	MP1C	X	-42.044	3.25
17	MP1C	Z	24.274	3.25
18	MP1C	Mx	.021	3.25
19	MP2A	X	-60.502	1
20	MP2A	Z	34.931	1
21	MP2A	Mx	-.004	1
22	MP2A	X	-60.502	5
23	MP2A	Z	34.931	5
24	MP2A	Mx	-.004	5
25	MP2B	X	-89.338	1
26	MP2B	Z	51.579	1
27	MP2B	Mx	-.06	1
28	MP2B	X	-89.338	5
29	MP2B	Z	51.579	5
30	MP2B	Mx	-.06	5
31	MP2A	X	-60.502	1
32	MP2A	Z	34.931	1
33	MP2A	Mx	-.049	1



**Member Point Loads (BLC 11 : Antenna Wo (240 Deg)) (Continued)**

	Member Label	Direction	Magnitude(lb.k-ft)	Location(ft.%)
34	MP2A	X	-60.502	5
35	MP2A	Z	34.931	5
36	MP2A	Mx	-.049	5
37	MP2B	X	-89.338	1
38	MP2B	Z	51.579	1
39	MP2B	Mx	.042	1
40	MP2B	X	-89.338	5
41	MP2B	Z	51.579	5
42	MP2B	Mx	.042	5
43	MP3C	X	-52.049	1
44	MP3C	Z	30.05	1
45	MP3C	Mx	.041	1
46	MP3C	X	-52.049	5
47	MP3C	Z	30.05	5
48	MP3C	Mx	.041	5
49	MP3C	X	-52.049	1
50	MP3C	Z	30.05	1
51	MP3C	Mx	.011	1
52	MP3C	X	-52.049	5
53	MP3C	Z	30.05	5
54	MP3C	Mx	.011	5
55	MP4A	X	-56.612	.25
56	MP4A	Z	32.685	.25
57	MP4A	Mx	-.025	.25
58	MP4A	X	-56.612	3.5
59	MP4A	Z	32.685	3.5
60	MP4A	Mx	-.025	3.5
61	MP4B	X	-76.868	.25
62	MP4B	Z	44.38	.25
63	MP4B	Mx	-.008	.25
64	MP4B	X	-76.868	3.5
65	MP4B	Z	44.38	3.5
66	MP4B	Mx	-.008	3.5
67	MP5C	X	-50.674	.25
68	MP5C	Z	29.257	.25
69	MP5C	Mx	.025	.25
70	MP5C	X	-50.674	3.5
71	MP5C	Z	29.257	3.5
72	MP5C	Mx	.025	3.5
73	MP3A	X	-41.267	1
74	MP3A	Z	23.825	1
75	MP3A	Mx	.034	1
76	MP3B	X	-50.634	1
77	MP3B	Z	29.234	1
78	MP3B	Mx	-.024	1
79	MP4C	X	-38.521	1
80	MP4C	Z	22.24	1
81	MP4C	Mx	-.008	1
82	MP3A	X	-37.492	2.5
83	MP3A	Z	21.646	2.5
84	MP3A	Mx	.003	2.5
85	MP3B	X	-50.317	2.5
86	MP3B	Z	29.05	2.5
87	MP3B	Mx	.034	2.5
88	MP4C	X	-33.733	2.5
89	MP4C	Z	19.476	2.5
90	MP4C	Mx	-.027	2.5



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**Member Point Loads (BLC 11 : Antenna Wo (240 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
91	M69	X	-3.43	.25
92	M69	Z	1.98	.25
93	M69	Mx	0	.25
94	MP3C	X	-31.582	2
95	MP3C	Z	18.234	2
96	MP3C	Mx	-.038	2
97	MP3C	X	-31.582	2
98	MP3C	Z	18.234	2
99	MP3C	Mx	-.026	2

**Member Point Loads (BLC 12 : Antenna Wo (270 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-82.947	2.25
2	MP1A	Z	0	2.25
3	MP1A	Mx	-.014	2.25
4	MP1A	X	-82.947	3.25
5	MP1A	Z	0	3.25
6	MP1A	Mx	-.014	3.25
7	MP1B	X	-66.851	2.25
8	MP1B	Z	0	2.25
9	MP1B	Mx	-.021	2.25
10	MP1B	X	-66.851	3.25
11	MP1B	Z	0	3.25
12	MP1B	Mx	-.021	3.25
13	MP1C	X	-34.962	2.25
14	MP1C	Z	0	2.25
15	MP1C	Mx	.017	2.25
16	MP1C	X	-34.962	3.25
17	MP1C	Z	0	3.25
18	MP1C	Mx	.017	3.25
19	MP2A	X	-97.965	1
20	MP2A	Z	0	1
21	MP2A	Mx	.029	1
22	MP2A	X	-97.965	5
23	MP2A	Z	0	5
24	MP2A	Mx	.029	5
25	MP2B	X	-80.248	1
26	MP2B	Z	0	1
27	MP2B	Mx	-.057	1
28	MP2B	X	-80.248	5
29	MP2B	Z	0	5
30	MP2B	Mx	-.057	5
31	MP2A	X	-97.965	1
32	MP2A	Z	0	1
33	MP2A	Mx	-.063	1
34	MP2A	X	-97.965	5
35	MP2A	Z	0	5
36	MP2A	Mx	-.063	5
37	MP2B	X	-80.248	1
38	MP2B	Z	0	1
39	MP2B	Mx	.005	1
40	MP2B	X	-80.248	5
41	MP2B	Z	0	5
42	MP2B	Mx	.005	5
43	MP3C	X	-45.147	1
44	MP3C	Z	0	1





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**Member Point Loads (BLC 12 : Antenna Wo (270 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
45	MP3C	Mx	.023	1
46	MP3C	X	-45.147	5
47	MP3C	Z	0	5
48	MP3C	Mx	.023	5
49	MP3C	X	-45.147	1
50	MP3C	Z	0	1
51	MP3C	Mx	.023	1
52	MP3C	X	-45.147	5
53	MP3C	Z	0	5
54	MP3C	Mx	.023	5
55	MP4A	X	-85.112	.25
56	MP4A	Z	0	.25
57	MP4A	Mx	-.015	.25
58	MP4A	X	-85.112	3.5
59	MP4A	Z	0	3.5
60	MP4A	Mx	-.015	3.5
61	MP4B	X	-72.666	.25
62	MP4B	Z	0	.25
63	MP4B	Mx	-.023	.25
64	MP4B	X	-72.666	3.5
65	MP4B	Z	0	3.5
66	MP4B	Mx	-.023	3.5
67	MP5C	X	-48.009	.25
68	MP5C	Z	0	.25
69	MP5C	Mx	.024	.25
70	MP5C	X	-48.009	3.5
71	MP5C	Z	0	3.5
72	MP5C	Mx	.024	3.5
73	MP3A	X	-56.78	1
74	MP3A	Z	0	1
75	MP3A	Mx	.036	1
76	MP3B	X	-51.025	1
77	MP3B	Z	0	1
78	MP3B	Mx	-.003	1
79	MP4C	X	-39.623	1
80	MP4C	Z	0	1
81	MP4C	Mx	-.02	1
82	MP3A	X	-55.791	2.5
83	MP3A	Z	0	2.5
84	MP3A	Mx	-.017	2.5
85	MP3B	X	-47.912	2.5
86	MP3B	Z	0	2.5
87	MP3B	Mx	.034	2.5
88	MP4C	X	-32.301	2.5
89	MP4C	Z	0	2.5
90	MP4C	Mx	-.016	2.5
91	M69	X	-4.27	.25
92	M69	Z	0	.25
93	M69	Mx	0	.25
94	MP3C	X	-36.495	2
95	MP3C	Z	0	2
96	MP3C	Mx	-.036	2
97	MP3C	X	-36.495	2
98	MP3C	Z	0	2
99	MP3C	Mx	-.036	2



**Member Point Loads (BLC 13 : Antenna Wo (300 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
1	MP1A	X	-75.921	2.25
2	MP1A	Z	-43.833	2.25
3	MP1A	Mx	.008	2.25
4	MP1A	X	-75.921	3.25
5	MP1A	Z	-43.833	3.25
6	MP1A	Mx	.008	3.25
7	MP1B	X	-35.783	2.25
8	MP1B	Z	-20.66	2.25
9	MP1B	Mx	-.019	2.25
10	MP1B	X	-35.783	3.25
11	MP1B	Z	-20.66	3.25
12	MP1B	Mx	-.019	3.25
13	MP1C	X	-42.044	2.25
14	MP1C	Z	-24.274	2.25
15	MP1C	Mx	.021	2.25
16	MP1C	X	-42.044	3.25
17	MP1C	Z	-24.274	3.25
18	MP1C	Mx	.021	3.25
19	MP2A	X	-89.338	1
20	MP2A	Z	-51.579	1
21	MP2A	Mx	.06	1
22	MP2A	X	-89.338	5
23	MP2A	Z	-51.579	5
24	MP2A	Mx	.06	5
25	MP2B	X	-45.158	1
26	MP2B	Z	-26.072	1
27	MP2B	Mx	-.033	1
28	MP2B	X	-45.158	5
29	MP2B	Z	-26.072	5
30	MP2B	Mx	-.033	5
31	MP2A	X	-89.338	1
32	MP2A	Z	-51.579	1
33	MP2A	Mx	-.042	1
34	MP2A	X	-89.338	5
35	MP2A	Z	-51.579	5
36	MP2A	Mx	-.042	5
37	MP2B	X	-45.158	1
38	MP2B	Z	-26.072	1
39	MP2B	Mx	-.016	1
40	MP2B	X	-45.158	5
41	MP2B	Z	-26.072	5
42	MP2B	Mx	-.016	5
43	MP3C	X	-52.049	1
44	MP3C	Z	-30.05	1
45	MP3C	Mx	.011	1
46	MP3C	X	-52.049	5
47	MP3C	Z	-30.05	5
48	MP3C	Mx	.011	5
49	MP3C	X	-52.049	1
50	MP3C	Z	-30.05	1
51	MP3C	Mx	.041	1
52	MP3C	X	-52.049	5
53	MP3C	Z	-30.05	5
54	MP3C	Mx	.041	5
55	MP4A	X	-76.868	.25
56	MP4A	Z	-44.38	.25
57	MP4A	Mx	.008	.25



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**Member Point Loads (BLC 13 : Antenna Wo (300 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
58	MP4A	X	-76.868	3.5
59	MP4A	Z	-44.38	3.5
60	MP4A	Mx	.008	3.5
61	MP4B	X	-45.833	.25
62	MP4B	Z	-26.462	.25
63	MP4B	Mx	-.025	.25
64	MP4B	X	-45.833	3.5
65	MP4B	Z	-26.462	3.5
66	MP4B	Mx	-.025	3.5
67	MP5C	X	-50.674	.25
68	MP5C	Z	-29.257	.25
69	MP5C	Mx	.025	.25
70	MP5C	X	-50.674	3.5
71	MP5C	Z	-29.257	3.5
72	MP5C	Mx	.025	3.5
73	MP3A	X	-50.634	1
74	MP3A	Z	-29.234	1
75	MP3A	Mx	.024	1
76	MP3B	X	-36.283	1
77	MP3B	Z	-20.948	1
78	MP3B	Mx	.013	1
79	MP4C	X	-38.521	1
80	MP4C	Z	-22.24	1
81	MP4C	Mx	-.03	1
82	MP3A	X	-50.317	2.5
83	MP3A	Z	-29.05	2.5
84	MP3A	Mx	-.034	2.5
85	MP3B	X	-30.669	2.5
86	MP3B	Z	-17.707	2.5
87	MP3B	Mx	.023	2.5
88	MP4C	X	-33.733	2.5
89	MP4C	Z	-19.476	2.5
90	MP4C	Mx	-.007	2.5
91	M69	X	-3.43	.25
92	M69	Z	-1.98	.25
93	M69	Mx	0	.25
94	MP3C	X	-31.582	2
95	MP3C	Z	-18.234	2
96	MP3C	Mx	-.026	2
97	MP3C	X	-31.582	2
98	MP3C	Z	-18.234	2
99	MP3C	Mx	-.038	2

**Member Point Loads (BLC 14 : Antenna Wo (330 Deg))**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
1	MP1A	X	-33.426	2.25
2	MP1A	Z	-57.895	2.25
3	MP1A	Mx	.021	2.25
4	MP1A	X	-33.426	3.25
5	MP1A	Z	-57.895	3.25
6	MP1A	Mx	.021	3.25
7	MP1B	X	-18.3	2.25
8	MP1B	Z	-31.697	2.25
9	MP1B	Mx	-.018	2.25
10	MP1B	X	-18.3	3.25
11	MP1B	Z	-31.697	3.25



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**Member Point Loads (BLC 14 : Antenna Wo (330 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb,k-ft]	Location[ft,%]
12	MP1B	Mx	-.018	3.25
13	MP1C	X	-37.859	2.25
14	MP1C	Z	-65.574	2.25
15	MP1C	Mx	.019	2.25
16	MP1C	X	-37.859	3.25
17	MP1C	Z	-65.574	3.25
18	MP1C	Mx	.019	3.25
19	MP2A	X	-40.124	1
20	MP2A	Z	-69.497	1
21	MP2A	Mx	.057	1
22	MP2A	X	-40.124	5
23	MP2A	Z	-69.497	5
24	MP2A	Mx	.057	5
25	MP2B	X	-23.475	1
26	MP2B	Z	-40.661	1
27	MP2B	Mx	-.019	1
28	MP2B	X	-23.475	5
29	MP2B	Z	-40.661	5
30	MP2B	Mx	-.019	5
31	MP2A	X	-40.124	1
32	MP2A	Z	-69.497	1
33	MP2A	Mx	-.005	1
34	MP2A	X	-40.124	5
35	MP2A	Z	-69.497	5
36	MP2A	Mx	-.005	5
37	MP2B	X	-23.475	1
38	MP2B	Z	-40.661	1
39	MP2B	Mx	-.027	1
40	MP2B	X	-23.475	5
41	MP2B	Z	-40.661	5
42	MP2B	Mx	-.027	5
43	MP3C	X	-45.004	1
44	MP3C	Z	-77.95	1
45	MP3C	Mx	-.016	1
46	MP3C	X	-45.004	5
47	MP3C	Z	-77.95	5
48	MP3C	Mx	-.016	5
49	MP3C	X	-45.004	1
50	MP3C	Z	-77.95	1
51	MP3C	Mx	.061	1
52	MP3C	X	-45.004	5
53	MP3C	Z	-77.95	5
54	MP3C	Mx	.061	5
55	MP4A	X	-36.333	.25
56	MP4A	Z	-62.931	.25
57	MP4A	Mx	.023	.25
58	MP4A	X	-36.333	3.5
59	MP4A	Z	-62.931	3.5
60	MP4A	Mx	.023	3.5
61	MP4B	X	-24.638	.25
62	MP4B	Z	-42.674	.25
63	MP4B	Mx	-.024	.25
64	MP4B	X	-24.638	3.5
65	MP4B	Z	-42.674	3.5
66	MP4B	Mx	-.024	3.5
67	MP5C	X	-39.761	.25
68	MP5C	Z	-68.868	.25



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**Member Point Loads (BLC 14 : Antenna Wo (330 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
69	MP5C	Mx	.02	.25
70	MP5C	X	-39.761	3.5
71	MP5C	Z	-68.868	3.5
72	MP5C	Mx	.02	3.5
73	MP3A	X	-25.513	1
74	MP3A	Z	-44.189	1
75	MP3A	Mx	.003	1
76	MP3B	X	-20.104	1
77	MP3B	Z	-34.822	1
78	MP3B	Mx	.023	1
79	MP4C	X	-27.098	1
80	MP4C	Z	-46.935	1
81	MP4C	Mx	-.037	1
82	MP3A	X	-23.956	2.5
83	MP3A	Z	-41.493	2.5
84	MP3A	Mx	-.034	2.5
85	MP3B	X	-16.552	2.5
86	MP3B	Z	-28.669	2.5
87	MP3B	Mx	.013	2.5
88	MP4C	X	-26.126	2.5
89	MP4C	Z	-45.252	2.5
90	MP4C	Mx	.01	2.5
91	M69	X	-1.671	.25
92	M69	Z	-2.894	.25
93	M69	Mx	0	.25
94	MP3C	X	-18.207	2
95	MP3C	Z	-31.536	2
96	MP3C	Mx	-.008	2
97	MP3C	X	-18.207	2
98	MP3C	Z	-31.536	2
99	MP3C	Mx	-.029	2

**Member Point Loads (BLC 15 : Antenna Wi (0 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	0	2.25
2	MP1A	Z	-9.327	2.25
3	MP1A	Mx	.004	2.25
4	MP1A	X	0	3.25
5	MP1A	Z	-9.327	3.25
6	MP1A	Mx	.004	3.25
7	MP1B	X	0	2.25
8	MP1B	Z	-12.372	2.25
9	MP1B	Mx	-.005	2.25
10	MP1B	X	0	3.25
11	MP1B	Z	-12.372	3.25
12	MP1B	Mx	-.005	3.25
13	MP1C	X	0	2.25
14	MP1C	Z	-18.406	2.25
15	MP1C	Mx	0	2.25
16	MP1C	X	0	3.25
17	MP1C	Z	-18.406	3.25
18	MP1C	Mx	0	3.25
19	MP2A	X	0	1
20	MP2A	Z	-22.837	1
21	MP2A	Mx	.015	1
22	MP2A	X	0	5



**Member Point Loads (BLC 15 : Antenna Wi (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
23	MP2A	Z	-22.837	5
24	MP2A	Mx	.015	5
25	MP2B	X	0	1
26	MP2B	Z	-25.583	1
27	MP2B	Mx	-.002	1
28	MP2B	X	0	5
29	MP2B	Z	-25.583	5
30	MP2B	Mx	-.002	5
31	MP2A	X	0	1
32	MP2A	Z	-22.837	1
33	MP2A	Mx	.007	1
34	MP2A	X	0	5
35	MP2A	Z	-22.837	5
36	MP2A	Mx	.007	5
37	MP2B	X	0	1
38	MP2B	Z	-25.583	1
39	MP2B	Mx	-.018	1
40	MP2B	X	0	5
41	MP2B	Z	-25.583	5
42	MP2B	Mx	-.018	5
43	MP3C	X	0	1
44	MP3C	Z	-31.022	1
45	MP3C	Mx	-.016	1
46	MP3C	X	0	5
47	MP3C	Z	-31.022	5
48	MP3C	Mx	-.016	5
49	MP3C	X	0	1
50	MP3C	Z	-31.022	1
51	MP3C	Mx	.016	1
52	MP3C	X	0	5
53	MP3C	Z	-31.022	5
54	MP3C	Mx	.016	5
55	MP4A	X	0	.25
56	MP4A	Z	-11.854	.25
57	MP4A	Mx	.006	.25
58	MP4A	X	0	3.5
59	MP4A	Z	-11.854	3.5
60	MP4A	Mx	.006	3.5
61	MP4B	X	0	.25
62	MP4B	Z	-14.108	.25
63	MP4B	Mx	-.005	.25
64	MP4B	X	0	3.5
65	MP4B	Z	-14.108	3.5
66	MP4B	Mx	-.005	3.5
67	MP5C	X	0	.25
68	MP5C	Z	-18.574	.25
69	MP5C	Mx	0	.25
70	MP5C	X	0	3.5
71	MP5C	Z	-18.574	3.5
72	MP5C	Mx	0	3.5
73	MP3A	X	0	1
74	MP3A	Z	-11.806	1
75	MP3A	Mx	-.004	1
76	MP3B	X	0	1
77	MP3B	Z	-13.187	1
78	MP3B	Mx	.009	1
79	MP4C	X	0	1



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**Member Point Loads (BLC 15 : Antenna Wi (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
80	MP4C	Z	-15.923	1
81	MP4C	Mx	-.008	1
82	MP3A	X	0	2.5
83	MP3A	Z	-10.211	2.5
84	MP3A	Mx	-.007	2.5
85	MP3B	X	0	2.5
86	MP3B	Z	-12.112	2.5
87	MP3B	Mx	.000746	2.5
88	MP4C	X	0	2.5
89	MP4C	Z	-15.878	2.5
90	MP4C	Mx	.008	2.5
91	M69	X	0	.25
92	M69	Z	-1.905	.25
93	M69	Mx	0	.25
94	MP3C	X	0	2
95	MP3C	Z	-3.653	2
96	MP3C	Mx	.001	2
97	MP3C	X	0	2
98	MP3C	Z	-3.653	2
99	MP3C	Mx	-.001	2

**Member Point Loads (BLC 16 : Antenna Wi (30 Deg))**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
1	MP1A	X	4.217	2.25
2	MP1A	Z	-7.304	2.25
3	MP1A	Mx	.004	2.25
4	MP1A	X	4.217	3.25
5	MP1A	Z	-7.304	3.25
6	MP1A	Mx	.004	3.25
7	MP1B	X	8.601	2.25
8	MP1B	Z	-14.898	2.25
9	MP1B	Mx	-.003	2.25
10	MP1B	X	8.601	3.25
11	MP1B	Z	-14.898	3.25
12	MP1B	Mx	-.003	3.25
13	MP1C	X	7.918	2.25
14	MP1C	Z	-13.714	2.25
15	MP1C	Mx	-.004	2.25
16	MP1C	X	7.918	3.25
17	MP1C	Z	-13.714	3.25
18	MP1C	Mx	-.004	3.25
19	MP2A	X	11.016	1
20	MP2A	Z	-19.08	1
21	MP2A	Mx	.009	1
22	MP2A	X	11.016	5
23	MP2A	Z	-19.08	5
24	MP2A	Mx	.009	5
25	MP2B	X	14.969	1
26	MP2B	Z	-25.927	1
27	MP2B	Mx	.009	1
28	MP2B	X	14.969	5
29	MP2B	Z	-25.927	5
30	MP2B	Mx	.009	5
31	MP2A	X	11.016	1
32	MP2A	Z	-19.08	1
33	MP2A	Mx	.013	1



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**Member Point Loads (BLC 16 : Antenna Wi (30 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
34	MP2A	X	11.016	5
35	MP2A	Z	-19.08	5
36	MP2A	Mx	.013	5
37	MP2B	X	14.969	1
38	MP2B	Z	-25.927	1
39	MP2B	Mx	-.019	1
40	MP2B	X	14.969	5
41	MP2B	Z	-25.927	5
42	MP2B	Mx	-.019	5
43	MP3C	X	14.352	1
44	MP3C	Z	-24.859	1
45	MP3C	Mx	-.02	1
46	MP3C	X	14.352	5
47	MP3C	Z	-24.859	5
48	MP3C	Mx	-.02	5
49	MP3C	X	14.352	1
50	MP3C	Z	-24.859	1
51	MP3C	Mx	.005	1
52	MP3C	X	14.352	5
53	MP3C	Z	-24.859	5
54	MP3C	Mx	.005	5
55	MP4A	X	5.596	.25
56	MP4A	Z	-9.693	.25
57	MP4A	Mx	.006	.25
58	MP4A	X	5.596	3.5
59	MP4A	Z	-9.693	3.5
60	MP4A	Mx	.006	3.5
61	MP4B	X	8.842	.25
62	MP4B	Z	-15.315	.25
63	MP4B	Mx	-.003	.25
64	MP4B	X	8.842	3.5
65	MP4B	Z	-15.315	3.5
66	MP4B	Mx	-.003	3.5
67	MP5C	X	8.336	.25
68	MP5C	Z	-14.438	.25
69	MP5C	Mx	-.004	.25
70	MP5C	X	8.336	3.5
71	MP5C	Z	-14.438	3.5
72	MP5C	Mx	-.004	3.5
73	MP3A	X	5.701	1
74	MP3A	Z	-9.874	1
75	MP3A	Mx	-.007	1
76	MP3B	X	7.689	1
77	MP3B	Z	-13.318	1
78	MP3B	Mx	.01	1
79	MP4C	X	7.379	1
80	MP4C	Z	-12.78	1
81	MP4C	Mx	-.003	1
82	MP3A	X	4.827	2.5
83	MP3A	Z	-8.361	2.5
84	MP3A	Mx	-.004	2.5
85	MP3B	X	7.564	2.5
86	MP3B	Z	-13.101	2.5
87	MP3B	Mx	-.005	2.5
88	MP4C	X	7.137	2.5
89	MP4C	Z	-12.361	2.5
90	MP4C	Mx	.01	2.5





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**Member Point Loads (BLC 16 : Antenna Wi (30 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
91	M69	X	.952	.25
92	M69	Z	-1.65	.25
93	M69	Mx	0	.25
94	MP3C	X	2.487	2
95	MP3C	Z	-4.308	2
96	MP3C	Mx	.004	2
97	MP3C	X	2.487	2
98	MP3C	Z	-4.308	2
99	MP3C	Mx	.001	2

**Member Point Loads (BLC 17 : Antenna Wi (60 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	10.714	2.25
2	MP1A	Z	-6.186	2.25
3	MP1A	Mx	.005	2.25
4	MP1A	X	10.714	3.25
5	MP1A	Z	-6.186	3.25
6	MP1A	Mx	.005	3.25
7	MP1B	X	15.671	2.25
8	MP1B	Z	-9.048	2.25
9	MP1B	Mx	.002	2.25
10	MP1B	X	15.671	3.25
11	MP1B	Z	-9.048	3.25
12	MP1B	Mx	.002	3.25
13	MP1C	X	9.262	2.25
14	MP1C	Z	-5.347	2.25
15	MP1C	Mx	-.005	2.25
16	MP1C	X	9.262	3.25
17	MP1C	Z	-5.347	3.25
18	MP1C	Mx	-.005	3.25
19	MP2A	X	22.155	1
20	MP2A	Z	-12.791	1
21	MP2A	Mx	.002	1
22	MP2A	X	22.155	5
23	MP2A	Z	-12.791	5
24	MP2A	Mx	.002	5
25	MP2B	X	26.624	1
26	MP2B	Z	-15.371	1
27	MP2B	Mx	.018	1
28	MP2B	X	26.624	5
29	MP2B	Z	-15.371	5
30	MP2B	Mx	.018	5
31	MP2A	X	22.155	1
32	MP2A	Z	-12.791	1
33	MP2A	Mx	.018	1
34	MP2A	X	22.155	5
35	MP2A	Z	-12.791	5
36	MP2A	Mx	.018	5
37	MP2B	X	26.624	1
38	MP2B	Z	-15.371	1
39	MP2B	Mx	-.012	1
40	MP2B	X	26.624	5
41	MP2B	Z	-15.371	5
42	MP2B	Mx	-.012	5
43	MP3C	X	20.845	1
44	MP3C	Z	-12.035	1



**Member Point Loads (BLC 17 : Antenna Wi (60 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
45	MP3C	Mx	-.016	1
46	MP3C	X	20.845	5
47	MP3C	Z	-12.035	5
48	MP3C	Mx	-.016	5
49	MP3C	X	20.845	1
50	MP3C	Z	-12.035	1
51	MP3C	Mx	-.004	1
52	MP3C	X	20.845	5
53	MP3C	Z	-12.035	5
54	MP3C	Mx	-.004	5
55	MP4A	X	12.218	.25
56	MP4A	Z	-7.054	.25
57	MP4A	Mx	.005	.25
58	MP4A	X	12.218	3.5
59	MP4A	Z	-7.054	3.5
60	MP4A	Mx	.005	3.5
61	MP4B	X	15.887	.25
62	MP4B	Z	-9.172	.25
63	MP4B	Mx	.002	.25
64	MP4B	X	15.887	3.5
65	MP4B	Z	-9.172	3.5
66	MP4B	Mx	.002	3.5
67	MP5C	X	11.142	.25
68	MP5C	Z	-6.433	.25
69	MP5C	Mx	-.006	.25
70	MP5C	X	11.142	3.5
71	MP5C	Z	-6.433	3.5
72	MP5C	Mx	-.006	3.5
73	MP3A	X	11.42	1
74	MP3A	Z	-6.594	1
75	MP3A	Mx	-.009	1
76	MP3B	X	13.668	1
77	MP3B	Z	-7.891	1
78	MP3B	Mx	.006	1
79	MP4C	X	10.761	1
80	MP4C	Z	-6.213	1
81	MP4C	Mx	.002	1
82	MP3A	X	10.489	2.5
83	MP3A	Z	-6.056	2.5
84	MP3A	Mx	-.000747	2.5
85	MP3B	X	13.583	2.5
86	MP3B	Z	-7.842	2.5
87	MP3B	Mx	-.009	2.5
88	MP4C	X	9.583	2.5
89	MP4C	Z	-5.532	2.5
90	MP4C	Mx	.008	2.5
91	M69	X	1.65	.25
92	M69	Z	-.952	.25
93	M69	Mx	0	.25
94	MP3C	X	6.596	2
95	MP3C	Z	-3.808	2
96	MP3C	Mx	.008	2
97	MP3C	X	6.596	2
98	MP3C	Z	-3.808	2
99	MP3C	Mx	.005	2



**Member Point Loads (BLC 18 : Antenna Wi (90 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	17.203	2.25
2	MP1A	Z	0	2.25
3	MP1A	Mx	.003	2.25
4	MP1A	X	17.203	3.25
5	MP1A	Z	0	3.25
6	MP1A	Mx	.003	3.25
7	MP1B	X	14.157	2.25
8	MP1B	Z	0	2.25
9	MP1B	Mx	.005	2.25
10	MP1B	X	14.157	3.25
11	MP1B	Z	0	3.25
12	MP1B	Mx	.005	3.25
13	MP1C	X	8.124	2.25
14	MP1C	Z	0	2.25
15	MP1C	Mx	-.004	2.25
16	MP1C	X	8.124	3.25
17	MP1C	Z	0	3.25
18	MP1C	Mx	-.004	3.25
19	MP2A	X	29.938	1
20	MP2A	Z	0	1
21	MP2A	Mx	-.009	1
22	MP2A	X	29.938	5
23	MP2A	Z	0	5
24	MP2A	Mx	-.009	5
25	MP2B	X	27.192	1
26	MP2B	Z	0	1
27	MP2B	Mx	.019	1
28	MP2B	X	27.192	5
29	MP2B	Z	0	5
30	MP2B	Mx	.019	5
31	MP2A	X	29.938	1
32	MP2A	Z	0	1
33	MP2A	Mx	.019	1
34	MP2A	X	29.938	5
35	MP2A	Z	0	5
36	MP2A	Mx	.019	5
37	MP2B	X	27.192	1
38	MP2B	Z	0	1
39	MP2B	Mx	-.002	1
40	MP2B	X	27.192	5
41	MP2B	Z	0	5
42	MP2B	Mx	-.002	5
43	MP3C	X	21.753	1
44	MP3C	Z	0	1
45	MP3C	Mx	-.011	1
46	MP3C	X	21.753	5
47	MP3C	Z	0	5
48	MP3C	Mx	-.011	5
49	MP3C	X	21.753	1
50	MP3C	Z	0	1
51	MP3C	Mx	-.011	1
52	MP3C	X	21.753	5
53	MP3C	Z	0	5
54	MP3C	Mx	-.011	5
55	MP4A	X	17.684	.25
56	MP4A	Z	0	.25
57	MP4A	Mx	.003	.25



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**Member Point Loads (BLC 18 : Antenna Wi (90 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
58	MP4A	X	17.684	3.5
59	MP4A	Z	0	3.5
60	MP4A	Mx	.003	3.5
61	MP4B	X	15.43	.25
62	MP4B	Z	0	.25
63	MP4B	Mx	.005	.25
64	MP4B	X	15.43	3.5
65	MP4B	Z	0	3.5
66	MP4B	Mx	.005	3.5
67	MP5C	X	10.963	.25
68	MP5C	Z	0	.25
69	MP5C	Mx	-.005	.25
70	MP5C	X	10.963	3.5
71	MP5C	Z	0	3.5
72	MP5C	Mx	-.005	3.5
73	MP3A	X	15.378	1
74	MP3A	Z	0	1
75	MP3A	Mx	-.01	1
76	MP3B	X	13.997	1
77	MP3B	Z	0	1
78	MP3B	Mx	.000863	1
79	MP4C	X	11.26	1
80	MP4C	Z	0	1
81	MP4C	Mx	.006	1
82	MP3A	X	15.127	2.5
83	MP3A	Z	0	2.5
84	MP3A	Mx	.005	2.5
85	MP3B	X	13.227	2.5
86	MP3B	Z	0	2.5
87	MP3B	Mx	-.009	2.5
88	MP4C	X	9.461	2.5
89	MP4C	Z	0	2.5
90	MP4C	Mx	.005	2.5
91	M69	X	1.905	.25
92	M69	Z	0	.25
93	M69	Mx	0	.25
94	MP3C	X	8.938	2
95	MP3C	Z	0	2
96	MP3C	Mx	.009	2
97	MP3C	X	8.938	2
98	MP3C	Z	0	2
99	MP3C	Mx	.009	2

**Member Point Loads (BLC 19 : Antenna Wi (120 Deg))**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
1	MP1A	X	15.671	2.25
2	MP1A	Z	9.048	2.25
3	MP1A	Mx	-.002	2.25
4	MP1A	X	15.671	3.25
5	MP1A	Z	9.048	3.25
6	MP1A	Mx	-.002	3.25
7	MP1B	X	8.077	2.25
8	MP1B	Z	4.663	2.25
9	MP1B	Mx	.004	2.25
10	MP1B	X	8.077	3.25
11	MP1B	Z	4.663	3.25



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**Member Point Loads (BLC 19 : Antenna Wi (120 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
12	MP1B	Mx	.004	3.25
13	MP1C	X	9.262	2.25
14	MP1C	Z	5.347	2.25
15	MP1C	Mx	-.005	2.25
16	MP1C	X	9.262	3.25
17	MP1C	Z	5.347	3.25
18	MP1C	Mx	-.005	3.25
19	MP2A	X	26.624	1
20	MP2A	Z	15.371	1
21	MP2A	Mx	-.018	1
22	MP2A	X	26.624	5
23	MP2A	Z	15.371	5
24	MP2A	Mx	-.018	5
25	MP2B	X	19.777	1
26	MP2B	Z	11.418	1
27	MP2B	Mx	.015	1
28	MP2B	X	19.777	5
29	MP2B	Z	11.418	5
30	MP2B	Mx	.015	5
31	MP2A	X	26.624	1
32	MP2A	Z	15.371	1
33	MP2A	Mx	.012	1
34	MP2A	X	26.624	5
35	MP2A	Z	15.371	5
36	MP2A	Mx	.012	5
37	MP2B	X	19.777	1
38	MP2B	Z	11.418	1
39	MP2B	Mx	.007	1
40	MP2B	X	19.777	5
41	MP2B	Z	11.418	5
42	MP2B	Mx	.007	5
43	MP3C	X	20.845	1
44	MP3C	Z	12.035	1
45	MP3C	Mx	-.004	1
46	MP3C	X	20.845	5
47	MP3C	Z	12.035	5
48	MP3C	Mx	-.004	5
49	MP3C	X	20.845	1
50	MP3C	Z	12.035	1
51	MP3C	Mx	-.016	1
52	MP3C	X	20.845	5
53	MP3C	Z	12.035	5
54	MP3C	Mx	-.016	5
55	MP4A	X	15.887	.25
56	MP4A	Z	9.172	.25
57	MP4A	Mx	-.002	.25
58	MP4A	X	15.887	3.5
59	MP4A	Z	9.172	3.5
60	MP4A	Mx	-.002	3.5
61	MP4B	X	10.266	.25
62	MP4B	Z	5.927	.25
63	MP4B	Mx	.006	.25
64	MP4B	X	10.266	3.5
65	MP4B	Z	5.927	3.5
66	MP4B	Mx	.006	3.5
67	MP5C	X	11.142	.25
68	MP5C	Z	6.433	.25



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 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

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**Member Point Loads (BLC 19 : Antenna Wi (120 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
69	MP5C	Mx	-.006	.25
70	MP5C	X	11.142	3.5
71	MP5C	Z	6.433	3.5
72	MP5C	Mx	-.006	3.5
73	MP3A	X	13.668	1
74	MP3A	Z	7.891	1
75	MP3A	Mx	-.006	1
76	MP3B	X	10.224	1
77	MP3B	Z	5.903	1
78	MP3B	Mx	-.004	1
79	MP4C	X	10.761	1
80	MP4C	Z	6.213	1
81	MP4C	Mx	.008	1
82	MP3A	X	13.583	2.5
83	MP3A	Z	7.842	2.5
84	MP3A	Mx	.009	2.5
85	MP3B	X	8.843	2.5
86	MP3B	Z	5.106	2.5
87	MP3B	Mx	-.007	2.5
88	MP4C	X	9.583	2.5
89	MP4C	Z	5.532	2.5
90	MP4C	Mx	.002	2.5
91	M69	X	1.65	.25
92	M69	Z	.952	.25
93	M69	Mx	0	.25
94	MP3C	X	6.596	2
95	MP3C	Z	3.808	2
96	MP3C	Mx	.005	2
97	MP3C	X	6.596	2
98	MP3C	Z	3.808	2
99	MP3C	Mx	.008	2

**Member Point Loads (BLC 20 : Antenna Wi (150 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	7.079	2.25
2	MP1A	Z	12.261	2.25
3	MP1A	Mx	-.005	2.25
4	MP1A	X	7.079	3.25
5	MP1A	Z	12.261	3.25
6	MP1A	Mx	-.005	3.25
7	MP1B	X	4.217	2.25
8	MP1B	Z	7.304	2.25
9	MP1B	Mx	.004	2.25
10	MP1B	X	4.217	3.25
11	MP1B	Z	7.304	3.25
12	MP1B	Mx	.004	3.25
13	MP1C	X	7.918	2.25
14	MP1C	Z	13.714	2.25
15	MP1C	Mx	-.004	2.25
16	MP1C	X	7.918	3.25
17	MP1C	Z	13.714	3.25
18	MP1C	Mx	-.004	3.25
19	MP2A	X	13.596	1
20	MP2A	Z	23.549	1
21	MP2A	Mx	-.019	1
22	MP2A	X	13.596	5



**Member Point Loads (BLC 20 : Antenna Wi (150 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
23	MP2A	Z	23.549	5
24	MP2A	Mx	-.019	5
25	MP2B	X	11.016	1
26	MP2B	Z	19.08	1
27	MP2B	Mx	.009	1
28	MP2B	X	11.016	5
29	MP2B	Z	19.08	5
30	MP2B	Mx	.009	5
31	MP2A	X	13.596	1
32	MP2A	Z	23.549	1
33	MP2A	Mx	.002	1
34	MP2A	X	13.596	5
35	MP2A	Z	23.549	5
36	MP2A	Mx	.002	5
37	MP2B	X	11.016	1
38	MP2B	Z	19.08	1
39	MP2B	Mx	.013	1
40	MP2B	X	11.016	5
41	MP2B	Z	19.08	5
42	MP2B	Mx	.013	5
43	MP3C	X	14.352	1
44	MP3C	Z	24.859	1
45	MP3C	Mx	.005	1
46	MP3C	X	14.352	5
47	MP3C	Z	24.859	5
48	MP3C	Mx	.005	5
49	MP3C	X	14.352	1
50	MP3C	Z	24.859	1
51	MP3C	Mx	-.02	1
52	MP3C	X	14.352	5
53	MP3C	Z	24.859	5
54	MP3C	Mx	-.02	5
55	MP4A	X	7.715	.25
56	MP4A	Z	13.363	.25
57	MP4A	Mx	-.005	.25
58	MP4A	X	7.715	3.5
59	MP4A	Z	13.363	3.5
60	MP4A	Mx	-.005	3.5
61	MP4B	X	5.596	.25
62	MP4B	Z	9.693	.25
63	MP4B	Mx	.006	.25
64	MP4B	X	5.596	3.5
65	MP4B	Z	9.693	3.5
66	MP4B	Mx	.006	3.5
67	MP5C	X	8.336	.25
68	MP5C	Z	14.438	.25
69	MP5C	Mx	-.004	.25
70	MP5C	X	8.336	3.5
71	MP5C	Z	14.438	3.5
72	MP5C	Mx	-.004	3.5
73	MP3A	X	6.998	1
74	MP3A	Z	12.122	1
75	MP3A	Mx	-.000862	1
76	MP3B	X	5.701	1
77	MP3B	Z	9.874	1
78	MP3B	Mx	-.007	1
79	MP4C	X	7.379	1



**Member Point Loads (BLC 20 : Antenna Wi (150 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
80	MP4C	Z	12.78	1
81	MP4C	Mx	.01	1
82	MP3A	X	6.613	2.5
83	MP3A	Z	11.455	2.5
84	MP3A	Mx	.009	2.5
85	MP3B	X	4.827	2.5
86	MP3B	Z	8.361	2.5
87	MP3B	Mx	-.004	2.5
88	MP4C	X	7.137	2.5
89	MP4C	Z	12.361	2.5
90	MP4C	Mx	-.003	2.5
91	M69	X	.952	.25
92	M69	Z	1.65	.25
93	M69	Mx	0	.25
94	MP3C	X	2.487	2
95	MP3C	Z	4.308	2
96	MP3C	Mx	.001	2
97	MP3C	X	2.487	2
98	MP3C	Z	4.308	2
99	MP3C	Mx	.004	2

**Member Point Loads (BLC 21 : Antenna Wi (180 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
1	MP1A	X	0	2.25
2	MP1A	Z	9.327	2.25
3	MP1A	Mx	-.004	2.25
4	MP1A	X	0	3.25
5	MP1A	Z	9.327	3.25
6	MP1A	Mx	-.004	3.25
7	MP1B	X	0	2.25
8	MP1B	Z	12.372	2.25
9	MP1B	Mx	.005	2.25
10	MP1B	X	0	3.25
11	MP1B	Z	12.372	3.25
12	MP1B	Mx	.005	3.25
13	MP1C	X	0	2.25
14	MP1C	Z	18.406	2.25
15	MP1C	Mx	0	2.25
16	MP1C	X	0	3.25
17	MP1C	Z	18.406	3.25
18	MP1C	Mx	0	3.25
19	MP2A	X	0	1
20	MP2A	Z	22.837	1
21	MP2A	Mx	-.015	1
22	MP2A	X	0	5
23	MP2A	Z	22.837	5
24	MP2A	Mx	-.015	5
25	MP2B	X	0	1
26	MP2B	Z	25.583	1
27	MP2B	Mx	.002	1
28	MP2B	X	0	5
29	MP2B	Z	25.583	5
30	MP2B	Mx	.002	5
31	MP2A	X	0	1
32	MP2A	Z	22.837	1
33	MP2A	Mx	-.007	1





**Member Point Loads (BLC 21 : Antenna Wi (180 Deg)) (Continued)**

	Member Label	Direction	Magnitude(lb.k-ft)	Location(ft.%)
34	MP2A	X	0	5
35	MP2A	Z	22.837	5
36	MP2A	Mx	-.007	5
37	MP2B	X	0	1
38	MP2B	Z	25.583	1
39	MP2B	Mx	.018	1
40	MP2B	X	0	5
41	MP2B	Z	25.583	5
42	MP2B	Mx	.018	5
43	MP3C	X	0	1
44	MP3C	Z	31.022	1
45	MP3C	Mx	.016	1
46	MP3C	X	0	5
47	MP3C	Z	31.022	5
48	MP3C	Mx	.016	5
49	MP3C	X	0	1
50	MP3C	Z	31.022	1
51	MP3C	Mx	-.016	1
52	MP3C	X	0	5
53	MP3C	Z	31.022	5
54	MP3C	Mx	-.016	5
55	MP4A	X	0	.25
56	MP4A	Z	11.854	.25
57	MP4A	Mx	-.006	.25
58	MP4A	X	0	3.5
59	MP4A	Z	11.854	3.5
60	MP4A	Mx	-.006	3.5
61	MP4B	X	0	.25
62	MP4B	Z	14.108	.25
63	MP4B	Mx	.005	.25
64	MP4B	X	0	3.5
65	MP4B	Z	14.108	3.5
66	MP4B	Mx	.005	3.5
67	MP5C	X	0	.25
68	MP5C	Z	18.574	.25
69	MP5C	Mx	0	.25
70	MP5C	X	0	3.5
71	MP5C	Z	18.574	3.5
72	MP5C	Mx	0	3.5
73	MP3A	X	0	1
74	MP3A	Z	11.806	1
75	MP3A	Mx	.004	1
76	MP3B	X	0	1
77	MP3B	Z	13.187	1
78	MP3B	Mx	-.009	1
79	MP4C	X	0	1
80	MP4C	Z	15.923	1
81	MP4C	Mx	.008	1
82	MP3A	X	0	2.5
83	MP3A	Z	10.211	2.5
84	MP3A	Mx	.007	2.5
85	MP3B	X	0	2.5
86	MP3B	Z	12.112	2.5
87	MP3B	Mx	-.000746	2.5
88	MP4C	X	0	2.5
89	MP4C	Z	15.878	2.5
90	MP4C	Mx	-.008	2.5



**Member Point Loads (BLC 21 : Antenna Wi (180 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
91	M69	X	0	.25
92	M69	Z	1.905	.25
93	M69	Mx	0	.25
94	MP3C	X	0	2
95	MP3C	Z	3.653	2
96	MP3C	Mx	-.001	2
97	MP3C	X	0	2
98	MP3C	Z	3.653	2
99	MP3C	Mx	.001	2

**Member Point Loads (BLC 22 : Antenna Wi (210 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-4.217	2.25
2	MP1A	Z	7.304	2.25
3	MP1A	Mx	-.004	2.25
4	MP1A	X	-4.217	3.25
5	MP1A	Z	7.304	3.25
6	MP1A	Mx	-.004	3.25
7	MP1B	X	-8.601	2.25
8	MP1B	Z	14.898	2.25
9	MP1B	Mx	.003	2.25
10	MP1B	X	-8.601	3.25
11	MP1B	Z	14.898	3.25
12	MP1B	Mx	.003	3.25
13	MP1C	X	-7.918	2.25
14	MP1C	Z	13.714	2.25
15	MP1C	Mx	.004	2.25
16	MP1C	X	-7.918	3.25
17	MP1C	Z	13.714	3.25
18	MP1C	Mx	.004	3.25
19	MP2A	X	-11.016	1
20	MP2A	Z	19.08	1
21	MP2A	Mx	-.009	1
22	MP2A	X	-11.016	5
23	MP2A	Z	19.08	5
24	MP2A	Mx	-.009	5
25	MP2B	X	-14.969	1
26	MP2B	Z	25.927	1
27	MP2B	Mx	-.009	1
28	MP2B	X	-14.969	5
29	MP2B	Z	25.927	5
30	MP2B	Mx	-.009	5
31	MP2A	X	-11.016	1
32	MP2A	Z	19.08	1
33	MP2A	Mx	-.013	1
34	MP2A	X	-11.016	5
35	MP2A	Z	19.08	5
36	MP2A	Mx	-.013	5
37	MP2B	X	-14.969	1
38	MP2B	Z	25.927	1
39	MP2B	Mx	.019	1
40	MP2B	X	-14.969	5
41	MP2B	Z	25.927	5
42	MP2B	Mx	.019	5
43	MP3C	X	-14.352	1
44	MP3C	Z	24.859	1



Company : Colliers Engineering & Design  
 Designer :  
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**Member Point Loads (BLC 22 : Antenna Wi (210 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
45	MP3C	Mx	.02	1
46	MP3C	X	-14.352	5
47	MP3C	Z	24.859	5
48	MP3C	Mx	.02	5
49	MP3C	X	-14.352	1
50	MP3C	Z	24.859	1
51	MP3C	Mx	-.005	1
52	MP3C	X	-14.352	5
53	MP3C	Z	24.859	5
54	MP3C	Mx	-.005	5
55	MP4A	X	-5.596	.25
56	MP4A	Z	9.693	.25
57	MP4A	Mx	-.006	.25
58	MP4A	X	-5.596	3.5
59	MP4A	Z	9.693	3.5
60	MP4A	Mx	-.006	3.5
61	MP4B	X	-8.842	.25
62	MP4B	Z	15.315	.25
63	MP4B	Mx	.003	.25
64	MP4B	X	-8.842	3.5
65	MP4B	Z	15.315	3.5
66	MP4B	Mx	.003	3.5
67	MP5C	X	-8.336	.25
68	MP5C	Z	14.438	.25
69	MP5C	Mx	.004	.25
70	MP5C	X	-8.336	3.5
71	MP5C	Z	14.438	3.5
72	MP5C	Mx	.004	3.5
73	MP3A	X	-5.701	1
74	MP3A	Z	9.874	1
75	MP3A	Mx	.007	1
76	MP3B	X	-7.689	1
77	MP3B	Z	13.318	1
78	MP3B	Mx	-.01	1
79	MP4C	X	-7.379	1
80	MP4C	Z	12.78	1
81	MP4C	Mx	.003	1
82	MP3A	X	-4.827	2.5
83	MP3A	Z	8.361	2.5
84	MP3A	Mx	.004	2.5
85	MP3B	X	-7.564	2.5
86	MP3B	Z	13.101	2.5
87	MP3B	Mx	.005	2.5
88	MP4C	X	-7.137	2.5
89	MP4C	Z	12.361	2.5
90	MP4C	Mx	-.01	2.5
91	M69	X	-.952	.25
92	M69	Z	1.65	.25
93	M69	Mx	0	.25
94	MP3C	X	-2.487	2
95	MP3C	Z	4.308	2
96	MP3C	Mx	-.004	2
97	MP3C	X	-2.487	2
98	MP3C	Z	4.308	2
99	MP3C	Mx	-.001	2



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

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**Member Point Loads (BLC 23 : Antenna Wi (240 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-10.714	2.25
2	MP1A	Z	6.186	2.25
3	MP1A	Mx	-.005	2.25
4	MP1A	X	-10.714	3.25
5	MP1A	Z	6.186	3.25
6	MP1A	Mx	-.005	3.25
7	MP1B	X	-15.671	2.25
8	MP1B	Z	9.048	2.25
9	MP1B	Mx	-.002	2.25
10	MP1B	X	-15.671	3.25
11	MP1B	Z	9.048	3.25
12	MP1B	Mx	-.002	3.25
13	MP1C	X	-9.262	2.25
14	MP1C	Z	5.347	2.25
15	MP1C	Mx	.005	2.25
16	MP1C	X	-9.262	3.25
17	MP1C	Z	5.347	3.25
18	MP1C	Mx	.005	3.25
19	MP2A	X	-22.155	1
20	MP2A	Z	12.791	1
21	MP2A	Mx	-.002	1
22	MP2A	X	-22.155	5
23	MP2A	Z	12.791	5
24	MP2A	Mx	-.002	5
25	MP2B	X	-26.624	1
26	MP2B	Z	15.371	1
27	MP2B	Mx	-.018	1
28	MP2B	X	-26.624	5
29	MP2B	Z	15.371	5
30	MP2B	Mx	-.018	5
31	MP2A	X	-22.155	1
32	MP2A	Z	12.791	1
33	MP2A	Mx	-.018	1
34	MP2A	X	-22.155	5
35	MP2A	Z	12.791	5
36	MP2A	Mx	-.018	5
37	MP2B	X	-26.624	1
38	MP2B	Z	15.371	1
39	MP2B	Mx	.012	1
40	MP2B	X	-26.624	5
41	MP2B	Z	15.371	5
42	MP2B	Mx	.012	5
43	MP3C	X	-20.845	1
44	MP3C	Z	12.035	1
45	MP3C	Mx	.016	1
46	MP3C	X	-20.845	5
47	MP3C	Z	12.035	5
48	MP3C	Mx	.016	5
49	MP3C	X	-20.845	1
50	MP3C	Z	12.035	1
51	MP3C	Mx	.004	1
52	MP3C	X	-20.845	5
53	MP3C	Z	12.035	5
54	MP3C	Mx	.004	5
55	MP4A	X	-12.218	.25
56	MP4A	Z	7.054	.25
57	MP4A	Mx	-.005	.25



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 Designer :  
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**Member Point Loads (BLC 23 : Antenna Wi (240 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
58	MP4A	X	-12.218	3.5
59	MP4A	Z	7.054	3.5
60	MP4A	Mx	-0.005	3.5
61	MP4B	X	-15.887	.25
62	MP4B	Z	9.172	.25
63	MP4B	Mx	-0.002	.25
64	MP4B	X	-15.887	3.5
65	MP4B	Z	9.172	3.5
66	MP4B	Mx	-0.002	3.5
67	MP5C	X	-11.142	.25
68	MP5C	Z	6.433	.25
69	MP5C	Mx	.006	.25
70	MP5C	X	-11.142	3.5
71	MP5C	Z	6.433	3.5
72	MP5C	Mx	.006	3.5
73	MP3A	X	-11.42	1
74	MP3A	Z	6.594	1
75	MP3A	Mx	.009	1
76	MP3B	X	-13.668	1
77	MP3B	Z	7.891	1
78	MP3B	Mx	-0.006	1
79	MP4C	X	-10.761	1
80	MP4C	Z	6.213	1
81	MP4C	Mx	-0.002	1
82	MP3A	X	-10.489	2.5
83	MP3A	Z	6.056	2.5
84	MP3A	Mx	.000747	2.5
85	MP3B	X	-13.583	2.5
86	MP3B	Z	7.842	2.5
87	MP3B	Mx	.009	2.5
88	MP4C	X	-9.583	2.5
89	MP4C	Z	5.532	2.5
90	MP4C	Mx	-0.008	2.5
91	M69	X	-1.65	.25
92	M69	Z	.952	.25
93	M69	Mx	0	.25
94	MP3C	X	-6.596	2
95	MP3C	Z	3.808	2
96	MP3C	Mx	-0.008	2
97	MP3C	X	-6.596	2
98	MP3C	Z	3.808	2
99	MP3C	Mx	-0.005	2

**Member Point Loads (BLC 24 : Antenna Wi (270 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-17.203	2.25
2	MP1A	Z	0	2.25
3	MP1A	Mx	-0.003	2.25
4	MP1A	X	-17.203	3.25
5	MP1A	Z	0	3.25
6	MP1A	Mx	-0.003	3.25
7	MP1B	X	-14.157	2.25
8	MP1B	Z	0	2.25
9	MP1B	Mx	-0.005	2.25
10	MP1B	X	-14.157	3.25
11	MP1B	Z	0	3.25



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**Member Point Loads (BLC 24 : Antenna Wi (270 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
12	MP1B	Mx	-.005	3.25
13	MP1C	X	-8.124	2.25
14	MP1C	Z	0	2.25
15	MP1C	Mx	.004	2.25
16	MP1C	X	-8.124	3.25
17	MP1C	Z	0	3.25
18	MP1C	Mx	.004	3.25
19	MP2A	X	-29.938	1
20	MP2A	Z	0	1
21	MP2A	Mx	.009	1
22	MP2A	X	-29.938	5
23	MP2A	Z	0	5
24	MP2A	Mx	.009	5
25	MP2B	X	-27.192	1
26	MP2B	Z	0	1
27	MP2B	Mx	-.019	1
28	MP2B	X	-27.192	5
29	MP2B	Z	0	5
30	MP2B	Mx	-.019	5
31	MP2A	X	-29.938	1
32	MP2A	Z	0	1
33	MP2A	Mx	-.019	1
34	MP2A	X	-29.938	5
35	MP2A	Z	0	5
36	MP2A	Mx	-.019	5
37	MP2B	X	-27.192	1
38	MP2B	Z	0	1
39	MP2B	Mx	.002	1
40	MP2B	X	-27.192	5
41	MP2B	Z	0	5
42	MP2B	Mx	.002	5
43	MP3C	X	-21.753	1
44	MP3C	Z	0	1
45	MP3C	Mx	.011	1
46	MP3C	X	-21.753	5
47	MP3C	Z	0	5
48	MP3C	Mx	.011	5
49	MP3C	X	-21.753	1
50	MP3C	Z	0	1
51	MP3C	Mx	.011	1
52	MP3C	X	-21.753	5
53	MP3C	Z	0	5
54	MP3C	Mx	.011	5
55	MP4A	X	-17.684	.25
56	MP4A	Z	0	.25
57	MP4A	Mx	-.003	.25
58	MP4A	X	-17.684	3.5
59	MP4A	Z	0	3.5
60	MP4A	Mx	-.003	3.5
61	MP4B	X	-15.43	.25
62	MP4B	Z	0	.25
63	MP4B	Mx	-.005	.25
64	MP4B	X	-15.43	3.5
65	MP4B	Z	0	3.5
66	MP4B	Mx	-.005	3.5
67	MP5C	X	-10.963	.25
68	MP5C	Z	0	.25



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**Member Point Loads (BLC 24 : Antenna Wi (270 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
69	MP5C	Mx	.005	.25
70	MP5C	X	-10.963	3.5
71	MP5C	Z	0	3.5
72	MP5C	Mx	.005	3.5
73	MP3A	X	-15.378	1
74	MP3A	Z	0	1
75	MP3A	Mx	.01	1
76	MP3B	X	-13.997	1
77	MP3B	Z	0	1
78	MP3B	Mx	-.000863	1
79	MP4C	X	-11.26	1
80	MP4C	Z	0	1
81	MP4C	Mx	-.006	1
82	MP3A	X	-15.127	2.5
83	MP3A	Z	0	2.5
84	MP3A	Mx	-.005	2.5
85	MP3B	X	-13.227	2.5
86	MP3B	Z	0	2.5
87	MP3B	Mx	.009	2.5
88	MP4C	X	-9.461	2.5
89	MP4C	Z	0	2.5
90	MP4C	Mx	-.005	2.5
91	M69	X	-1.905	.25
92	M69	Z	0	.25
93	M69	Mx	0	.25
94	MP3C	X	-8.938	2
95	MP3C	Z	0	2
96	MP3C	Mx	-.009	2
97	MP3C	X	-8.938	2
98	MP3C	Z	0	2
99	MP3C	Mx	-.009	2

**Member Point Loads (BLC 25 : Antenna Wi (300 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-15.671	2.25
2	MP1A	Z	-9.048	2.25
3	MP1A	Mx	.002	2.25
4	MP1A	X	-15.671	3.25
5	MP1A	Z	-9.048	3.25
6	MP1A	Mx	.002	3.25
7	MP1B	X	-8.077	2.25
8	MP1B	Z	-4.663	2.25
9	MP1B	Mx	-.004	2.25
10	MP1B	X	-8.077	3.25
11	MP1B	Z	-4.663	3.25
12	MP1B	Mx	-.004	3.25
13	MP1C	X	-9.262	2.25
14	MP1C	Z	-5.347	2.25
15	MP1C	Mx	.005	2.25
16	MP1C	X	-9.262	3.25
17	MP1C	Z	-5.347	3.25
18	MP1C	Mx	.005	3.25
19	MP2A	X	-26.624	1
20	MP2A	Z	-15.371	1
21	MP2A	Mx	.018	1
22	MP2A	X	-26.624	5



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**Member Point Loads (BLC 25 : Antenna Wi (300 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
23	MP2A	Z	-15.371	5
24	MP2A	Mx	.018	5
25	MP2B	X	-19.777	1
26	MP2B	Z	-11.418	1
27	MP2B	Mx	-.015	1
28	MP2B	X	-19.777	5
29	MP2B	Z	-11.418	5
30	MP2B	Mx	-.015	5
31	MP2A	X	-26.624	1
32	MP2A	Z	-15.371	1
33	MP2A	Mx	-.012	1
34	MP2A	X	-26.624	5
35	MP2A	Z	-15.371	5
36	MP2A	Mx	-.012	5
37	MP2B	X	-19.777	1
38	MP2B	Z	-11.418	1
39	MP2B	Mx	-.007	1
40	MP2B	X	-19.777	5
41	MP2B	Z	-11.418	5
42	MP2B	Mx	-.007	5
43	MP3C	X	-20.845	1
44	MP3C	Z	-12.035	1
45	MP3C	Mx	.004	1
46	MP3C	X	-20.845	5
47	MP3C	Z	-12.035	5
48	MP3C	Mx	.004	5
49	MP3C	X	-20.845	1
50	MP3C	Z	-12.035	1
51	MP3C	Mx	.016	1
52	MP3C	X	-20.845	5
53	MP3C	Z	-12.035	5
54	MP3C	Mx	.016	5
55	MP4A	X	-15.887	.25
56	MP4A	Z	-9.172	.25
57	MP4A	Mx	.002	.25
58	MP4A	X	-15.887	3.5
59	MP4A	Z	-9.172	3.5
60	MP4A	Mx	.002	3.5
61	MP4B	X	-10.266	.25
62	MP4B	Z	-5.927	.25
63	MP4B	Mx	-.006	.25
64	MP4B	X	-10.266	3.5
65	MP4B	Z	-5.927	3.5
66	MP4B	Mx	-.006	3.5
67	MP5C	X	-11.142	.25
68	MP5C	Z	-6.433	.25
69	MP5C	Mx	.006	.25
70	MP5C	X	-11.142	3.5
71	MP5C	Z	-6.433	3.5
72	MP5C	Mx	.006	3.5
73	MP3A	X	-13.668	1
74	MP3A	Z	-7.891	1
75	MP3A	Mx	.006	1
76	MP3B	X	-10.224	1
77	MP3B	Z	-5.903	1
78	MP3B	Mx	.004	1
79	MP4C	X	-10.761	1





**Member Point Loads (BLC 25 : Antenna Wi (300 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
80	MP4C	Z	-6.213	1
81	MP4C	Mx	-.008	1
82	MP3A	X	-13.583	2.5
83	MP3A	Z	-7.842	2.5
84	MP3A	Mx	-.009	2.5
85	MP3B	X	-8.843	2.5
86	MP3B	Z	-5.106	2.5
87	MP3B	Mx	.007	2.5
88	MP4C	X	-9.583	2.5
89	MP4C	Z	-5.532	2.5
90	MP4C	Mx	-.002	2.5
91	M69	X	-1.65	.25
92	M69	Z	-.952	.25
93	M69	Mx	0	.25
94	MP3C	X	-6.596	2
95	MP3C	Z	-3.808	2
96	MP3C	Mx	-.005	2
97	MP3C	X	-6.596	2
98	MP3C	Z	-3.808	2
99	MP3C	Mx	-.008	2

**Member Point Loads (BLC 26 : Antenna Wi (330 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-7.079	2.25
2	MP1A	Z	-12.261	2.25
3	MP1A	Mx	.005	2.25
4	MP1A	X	-7.079	3.25
5	MP1A	Z	-12.261	3.25
6	MP1A	Mx	.005	3.25
7	MP1B	X	-4.217	2.25
8	MP1B	Z	-7.304	2.25
9	MP1B	Mx	-.004	2.25
10	MP1B	X	-4.217	3.25
11	MP1B	Z	-7.304	3.25
12	MP1B	Mx	-.004	3.25
13	MP1C	X	-7.918	2.25
14	MP1C	Z	-13.714	2.25
15	MP1C	Mx	.004	2.25
16	MP1C	X	-7.918	3.25
17	MP1C	Z	-13.714	3.25
18	MP1C	Mx	.004	3.25
19	MP2A	X	-13.596	1
20	MP2A	Z	-23.549	1
21	MP2A	Mx	.019	1
22	MP2A	X	-13.596	5
23	MP2A	Z	-23.549	5
24	MP2A	Mx	.019	5
25	MP2B	X	-11.016	1
26	MP2B	Z	-19.08	1
27	MP2B	Mx	-.009	1
28	MP2B	X	-11.016	5
29	MP2B	Z	-19.08	5
30	MP2B	Mx	-.009	5
31	MP2A	X	-13.596	1
32	MP2A	Z	-23.549	1
33	MP2A	Mx	-.002	1



**Member Point Loads (BLC 26 : Antenna Wi (330 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
34	MP2A	X	-13.596	5
35	MP2A	Z	-23.549	5
36	MP2A	Mx	-.002	5
37	MP2B	X	-11.016	1
38	MP2B	Z	-19.08	1
39	MP2B	Mx	-.013	1
40	MP2B	X	-11.016	5
41	MP2B	Z	-19.08	5
42	MP2B	Mx	-.013	5
43	MP3C	X	-14.352	1
44	MP3C	Z	-24.859	1
45	MP3C	Mx	-.005	1
46	MP3C	X	-14.352	5
47	MP3C	Z	-24.859	5
48	MP3C	Mx	-.005	5
49	MP3C	X	-14.352	1
50	MP3C	Z	-24.859	1
51	MP3C	Mx	.02	1
52	MP3C	X	-14.352	5
53	MP3C	Z	-24.859	5
54	MP3C	Mx	.02	5
55	MP4A	X	-7.715	.25
56	MP4A	Z	-13.363	.25
57	MP4A	Mx	.005	.25
58	MP4A	X	-7.715	3.5
59	MP4A	Z	-13.363	3.5
60	MP4A	Mx	.005	3.5
61	MP4B	X	-5.596	.25
62	MP4B	Z	-9.693	.25
63	MP4B	Mx	-.006	.25
64	MP4B	X	-5.596	3.5
65	MP4B	Z	-9.693	3.5
66	MP4B	Mx	-.006	3.5
67	MP5C	X	-8.336	.25
68	MP5C	Z	-14.438	.25
69	MP5C	Mx	.004	.25
70	MP5C	X	-8.336	3.5
71	MP5C	Z	-14.438	3.5
72	MP5C	Mx	.004	3.5
73	MP3A	X	-6.998	1
74	MP3A	Z	-12.122	1
75	MP3A	Mx	.000862	1
76	MP3B	X	-5.701	1
77	MP3B	Z	-9.874	1
78	MP3B	Mx	.007	1
79	MP4C	X	-7.379	1
80	MP4C	Z	-12.78	1
81	MP4C	Mx	-.01	1
82	MP3A	X	-6.613	2.5
83	MP3A	Z	-11.455	2.5
84	MP3A	Mx	-.009	2.5
85	MP3B	X	-4.827	2.5
86	MP3B	Z	-8.361	2.5
87	MP3B	Mx	.004	2.5
88	MP4C	X	-7.137	2.5
89	MP4C	Z	-12.361	2.5
90	MP4C	Mx	.003	2.5



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**Member Point Loads (BLC 26 : Antenna Wi (330 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
91	M69	X	-.952	.25
92	M69	Z	-1.65	.25
93	M69	Mx	0	.25
94	MP3C	X	-2.487	2
95	MP3C	Z	-4.308	2
96	MP3C	Mx	-.001	2
97	MP3C	X	-2.487	2
98	MP3C	Z	-4.308	2
99	MP3C	Mx	-.004	2

**Member Point Loads (BLC 27 : Antenna Wm (0 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	0	2.25
2	MP1A	Z	-2.582	2.25
3	MP1A	Mx	.001	2.25
4	MP1A	X	0	3.25
5	MP1A	Z	-2.582	3.25
6	MP1A	Mx	.001	3.25
7	MP1B	X	0	2.25
8	MP1B	Z	-3.588	2.25
9	MP1B	Mx	-.001	2.25
10	MP1B	X	0	3.25
11	MP1B	Z	-3.588	3.25
12	MP1B	Mx	-.001	3.25
13	MP1C	X	0	2.25
14	MP1C	Z	-5.582	2.25
15	MP1C	Mx	0	2.25
16	MP1C	X	0	3.25
17	MP1C	Z	-5.582	3.25
18	MP1C	Mx	0	3.25
19	MP2A	X	0	1
20	MP2A	Z	-3.259	1
21	MP2A	Mx	.002	1
22	MP2A	X	0	5
23	MP2A	Z	-3.259	5
24	MP2A	Mx	.002	5
25	MP2B	X	0	1
26	MP2B	Z	-4.366	1
27	MP2B	Mx	-.000269	1
28	MP2B	X	0	5
29	MP2B	Z	-4.366	5
30	MP2B	Mx	-.000269	5
31	MP2A	X	0	1
32	MP2A	Z	-3.259	1
33	MP2A	Mx	.000974	1
34	MP2A	X	0	5
35	MP2A	Z	-3.259	5
36	MP2A	Mx	.000974	5
37	MP2B	X	0	1
38	MP2B	Z	-4.366	1
39	MP2B	Mx	-.003	1
40	MP2B	X	0	5
41	MP2B	Z	-4.366	5
42	MP2B	Mx	-.003	5
43	MP3C	X	0	1
44	MP3C	Z	-6.56	1



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**Member Point Loads (BLC 27 : Antenna Wm (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
45	MP3C	Mx	-.003	1
46	MP3C	X	0	5
47	MP3C	Z	-6.56	5
48	MP3C	Mx	-.003	5
49	MP3C	X	0	1
50	MP3C	Z	-6.56	1
51	MP3C	Mx	.003	1
52	MP3C	X	0	5
53	MP3C	Z	-6.56	5
54	MP3C	Mx	.003	5
55	MP4A	X	0	.25
56	MP4A	Z	-3.308	.25
57	MP4A	Mx	.002	.25
58	MP4A	X	0	3.5
59	MP4A	Z	-3.308	3.5
60	MP4A	Mx	.002	3.5
61	MP4B	X	0	.25
62	MP4B	Z	-4.086	.25
63	MP4B	Mx	-.002	.25
64	MP4B	X	0	3.5
65	MP4B	Z	-4.086	3.5
66	MP4B	Mx	-.002	3.5
67	MP5C	X	0	.25
68	MP5C	Z	-5.627	.25
69	MP5C	Mx	0	.25
70	MP5C	X	0	3.5
71	MP5C	Z	-5.627	3.5
72	MP5C	Mx	0	3.5
73	MP3A	X	0	1
74	MP3A	Z	-2.618	1
75	MP3A	Mx	-.000782	1
76	MP3B	X	0	1
77	MP3B	Z	-2.978	1
78	MP3B	Mx	.002	1
79	MP4C	X	0	1
80	MP4C	Z	-3.691	1
81	MP4C	Mx	-.002	1
82	MP3A	X	0	2.5
83	MP3A	Z	-2.213	2.5
84	MP3A	Mx	-.001	2.5
85	MP3B	X	0	2.5
86	MP3B	Z	-2.706	2.5
87	MP3B	Mx	.000167	2.5
88	MP4C	X	0	2.5
89	MP4C	Z	-3.681	2.5
90	MP4C	Mx	.002	2.5
91	M69	X	0	.25
92	M69	Z	-.19	.25
93	M69	Mx	0	.25
94	MP3C	X	0	2
95	MP3C	Z	-2.274	2
96	MP3C	Mx	.000758	2
97	MP3C	X	0	2
98	MP3C	Z	-2.274	2
99	MP3C	Mx	-.000758	2



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**Member Point Loads (BLC 28 : Antenna Wm (30 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	1.144	2.25
2	MP1A	Z	-1.981	2.25
3	MP1A	Mx	.001	2.25
4	MP1A	X	1.144	3.25
5	MP1A	Z	-1.981	3.25
6	MP1A	Mx	.001	3.25
7	MP1B	X	2.592	2.25
8	MP1B	Z	-4.49	2.25
9	MP1B	Mx	-.000887	2.25
10	MP1B	X	2.592	3.25
11	MP1B	Z	-4.49	3.25
12	MP1B	Mx	-.000887	3.25
13	MP1C	X	2.366	2.25
14	MP1C	Z	-4.098	2.25
15	MP1C	Mx	-.001	2.25
16	MP1C	X	2.366	3.25
17	MP1C	Z	-4.098	3.25
18	MP1C	Mx	-.001	3.25
19	MP2A	X	1.467	1
20	MP2A	Z	-2.541	1
21	MP2A	Mx	.001	1
22	MP2A	X	1.467	5
23	MP2A	Z	-2.541	5
24	MP2A	Mx	.001	5
25	MP2B	X	3.061	1
26	MP2B	Z	-5.303	1
27	MP2B	Mx	.002	1
28	MP2B	X	3.061	5
29	MP2B	Z	-5.303	5
30	MP2B	Mx	.002	5
31	MP2A	X	1.467	1
32	MP2A	Z	-2.541	1
33	MP2A	Mx	.002	1
34	MP2A	X	1.467	5
35	MP2A	Z	-2.541	5
36	MP2A	Mx	.002	5
37	MP2B	X	3.061	1
38	MP2B	Z	-5.303	1
39	MP2B	Mx	-.004	1
40	MP2B	X	3.061	5
41	MP2B	Z	-5.303	5
42	MP2B	Mx	-.004	5
43	MP3C	X	2.813	1
44	MP3C	Z	-4.872	1
45	MP3C	Mx	-.004	1
46	MP3C	X	2.813	5
47	MP3C	Z	-4.872	5
48	MP3C	Mx	-.004	5
49	MP3C	X	2.813	1
50	MP3C	Z	-4.872	1
51	MP3C	Mx	.001	1
52	MP3C	X	2.813	5
53	MP3C	Z	-4.872	5
54	MP3C	Mx	.001	5
55	MP4A	X	1.54	.25
56	MP4A	Z	-2.667	.25
57	MP4A	Mx	.002	.25



**Member Point Loads (BLC 28 : Antenna Wm (30 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
58	MP4A	X	1.54	3.5
59	MP4A	Z	-2.667	3.5
60	MP4A	Mx	.002	3.5
61	MP4B	X	2.66	.25
62	MP4B	Z	-4.607	.25
63	MP4B	Mx	-.00091	.25
64	MP4B	X	2.66	3.5
65	MP4B	Z	-4.607	3.5
66	MP4B	Mx	-.00091	3.5
67	MP5C	X	2.485	.25
68	MP5C	Z	-4.304	.25
69	MP5C	Mx	-.001	.25
70	MP5C	X	2.485	3.5
71	MP5C	Z	-4.304	3.5
72	MP5C	Mx	-.001	3.5
73	MP3A	X	1.257	1
74	MP3A	Z	-2.176	1
75	MP3A	Mx	-.001	1
76	MP3B	X	1.774	1
77	MP3B	Z	-3.073	1
78	MP3B	Mx	.002	1
79	MP4C	X	1.694	1
80	MP4C	Z	-2.933	1
81	MP4C	Mx	-.000619	1
82	MP3A	X	1.034	2.5
83	MP3A	Z	-1.792	2.5
84	MP3A	Mx	-.000839	2.5
85	MP3B	X	1.743	2.5
86	MP3B	Z	-3.02	2.5
87	MP3B	Mx	-.001	2.5
88	MP4C	X	1.633	2.5
89	MP4C	Z	-2.828	2.5
90	MP4C	Mx	.002	2.5
91	M69	X	.104	.25
92	M69	Z	-.181	.25
93	M69	Mx	0	.25
94	MP3C	X	1.138	2
95	MP3C	Z	-1.971	2
96	MP3C	Mx	.002	2
97	MP3C	X	1.138	2
98	MP3C	Z	-1.971	2
99	MP3C	Mx	.000481	2

**Member Point Loads (BLC 29 : Antenna Wm (60 Deg))**

	Member Label	Direction	Magnitude[lb. k-ft]	Location[ft. %]
1	MP1A	X	3.108	2.25
2	MP1A	Z	-1.794	2.25
3	MP1A	Mx	.001	2.25
4	MP1A	X	3.108	3.25
5	MP1A	Z	-1.794	3.25
6	MP1A	Mx	.001	3.25
7	MP1B	X	4.745	2.25
8	MP1B	Z	-2.74	2.25
9	MP1B	Mx	.000476	2.25
10	MP1B	X	4.745	3.25
11	MP1B	Z	-2.74	3.25





**Member Point Loads (BLC 29 : Antenna Wm (60 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
69	MP5C	Mx	-.002	.25
70	MP5C	X	3.167	3.5
71	MP5C	Z	-1.829	3.5
72	MP5C	Mx	-.002	3.5
73	MP3A	X	2.579	1
74	MP3A	Z	-1.489	1
75	MP3A	Mx	-.002	1
76	MP3B	X	3.165	1
77	MP3B	Z	-1.827	1
78	MP3B	Mx	.001	1
79	MP4C	X	2.408	1
80	MP4C	Z	-1.39	1
81	MP4C	Mx	.000509	1
82	MP3A	X	2.343	2.5
83	MP3A	Z	-1.353	2.5
84	MP3A	Mx	-.000167	2.5
85	MP3B	X	3.145	2.5
86	MP3B	Z	-1.816	2.5
87	MP3B	Mx	-.002	2.5
88	MP4C	X	2.108	2.5
89	MP4C	Z	-1.217	2.5
90	MP4C	Mx	.002	2.5
91	M69	X	.214	.25
92	M69	Z	-.124	.25
93	M69	Mx	0	.25
94	MP3C	X	1.974	2
95	MP3C	Z	-1.14	2
96	MP3C	Mx	.002	2
97	MP3C	X	1.974	2
98	MP3C	Z	-1.14	2
99	MP3C	Mx	.002	2

**Member Point Loads (BLC 30 : Antenna Wm (90 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	5.184	2.25
2	MP1A	Z	0	2.25
3	MP1A	Mx	.000887	2.25
4	MP1A	X	5.184	3.25
5	MP1A	Z	0	3.25
6	MP1A	Mx	.000887	3.25
7	MP1B	X	4.178	2.25
8	MP1B	Z	0	2.25
9	MP1B	Mx	.001	2.25
10	MP1B	X	4.178	3.25
11	MP1B	Z	0	3.25
12	MP1B	Mx	.001	3.25
13	MP1C	X	2.185	2.25
14	MP1C	Z	0	2.25
15	MP1C	Mx	-.001	2.25
16	MP1C	X	2.185	3.25
17	MP1C	Z	0	3.25
18	MP1C	Mx	-.001	3.25
19	MP2A	X	6.123	1
20	MP2A	Z	0	1
21	MP2A	Mx	-.002	1
22	MP2A	X	6.123	5





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**Member Point Loads (BLC 30 : Antenna Wm (90 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
23	MP2A	Z	0	5
24	MP2A	Mx	-.002	5
25	MP2B	X	5.016	1
26	MP2B	Z	0	1
27	MP2B	Mx	.004	1
28	MP2B	X	5.016	5
29	MP2B	Z	0	5
30	MP2B	Mx	.004	5
31	MP2A	X	6.123	1
32	MP2A	Z	0	1
33	MP2A	Mx	.004	1
34	MP2A	X	6.123	5
35	MP2A	Z	0	5
36	MP2A	Mx	.004	5
37	MP2B	X	5.016	1
38	MP2B	Z	0	1
39	MP2B	Mx	-.000309	1
40	MP2B	X	5.016	5
41	MP2B	Z	0	5
42	MP2B	Mx	-.000309	5
43	MP3C	X	2.822	1
44	MP3C	Z	0	1
45	MP3C	Mx	-.001	1
46	MP3C	X	2.822	5
47	MP3C	Z	0	5
48	MP3C	Mx	-.001	5
49	MP3C	X	2.822	1
50	MP3C	Z	0	1
51	MP3C	Mx	-.001	1
52	MP3C	X	2.822	5
53	MP3C	Z	0	5
54	MP3C	Mx	-.001	5
55	MP4A	X	5.319	.25
56	MP4A	Z	0	.25
57	MP4A	Mx	.00091	.25
58	MP4A	X	5.319	3.5
59	MP4A	Z	0	3.5
60	MP4A	Mx	.00091	3.5
61	MP4B	X	4.542	.25
62	MP4B	Z	0	.25
63	MP4B	Mx	.001	.25
64	MP4B	X	4.542	3.5
65	MP4B	Z	0	3.5
66	MP4B	Mx	.001	3.5
67	MP5C	X	3.001	.25
68	MP5C	Z	0	.25
69	MP5C	Mx	-.002	.25
70	MP5C	X	3.001	3.5
71	MP5C	Z	0	3.5
72	MP5C	Mx	-.002	3.5
73	MP3A	X	3.549	1
74	MP3A	Z	0	1
75	MP3A	Mx	-.002	1
76	MP3B	X	3.189	1
77	MP3B	Z	0	1
78	MP3B	Mx	.000197	1
79	MP4C	X	2.476	1



**Member Point Loads (BLC 30 : Antenna Wm (90 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
80	MP4C	Z	0	1
81	MP4C	Mx	.001	1
82	MP3A	X	3.487	2.5
83	MP3A	Z	0	2.5
84	MP3A	Mx	.001	2.5
85	MP3B	X	2.994	2.5
86	MP3B	Z	0	2.5
87	MP3B	Mx	-.002	2.5
88	MP4C	X	2.019	2.5
89	MP4C	Z	0	2.5
90	MP4C	Mx	.001	2.5
91	M69	X	.267	.25
92	M69	Z	0	.25
93	M69	Mx	0	.25
94	MP3C	X	2.281	2
95	MP3C	Z	0	2
96	MP3C	Mx	.002	2
97	MP3C	X	2.281	2
98	MP3C	Z	0	2
99	MP3C	Mx	.002	2

**Member Point Loads (BLC 31 : Antenna Wm (120 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	4.745	2.25
2	MP1A	Z	2.74	2.25
3	MP1A	Mx	-.000476	2.25
4	MP1A	X	4.745	3.25
5	MP1A	Z	2.74	3.25
6	MP1A	Mx	-.000476	3.25
7	MP1B	X	2.236	2.25
8	MP1B	Z	1.291	2.25
9	MP1B	Mx	.001	2.25
10	MP1B	X	2.236	3.25
11	MP1B	Z	1.291	3.25
12	MP1B	Mx	.001	3.25
13	MP1C	X	2.628	2.25
14	MP1C	Z	1.517	2.25
15	MP1C	Mx	-.001	2.25
16	MP1C	X	2.628	3.25
17	MP1C	Z	1.517	3.25
18	MP1C	Mx	-.001	3.25
19	MP2A	X	5.584	1
20	MP2A	Z	3.224	1
21	MP2A	Mx	-.004	1
22	MP2A	X	5.584	5
23	MP2A	Z	3.224	5
24	MP2A	Mx	-.004	5
25	MP2B	X	2.822	1
26	MP2B	Z	1.63	1
27	MP2B	Mx	.002	1
28	MP2B	X	2.822	5
29	MP2B	Z	1.63	5
30	MP2B	Mx	.002	5
31	MP2A	X	5.584	1
32	MP2A	Z	3.224	1
33	MP2A	Mx	.003	1



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**Member Point Loads (BLC 31 : Antenna Wm (120 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
34	MP2A	X	5.584	5
35	MP2A	Z	3.224	5
36	MP2A	Mx	.003	5
37	MP2B	X	2.822	1
38	MP2B	Z	1.63	1
39	MP2B	Mx	.000974	1
40	MP2B	X	2.822	5
41	MP2B	Z	1.63	5
42	MP2B	Mx	.000974	5
43	MP3C	X	3.253	1
44	MP3C	Z	1.878	1
45	MP3C	Mx	-.000688	1
46	MP3C	X	3.253	5
47	MP3C	Z	1.878	5
48	MP3C	Mx	-.000688	5
49	MP3C	X	3.253	1
50	MP3C	Z	1.878	1
51	MP3C	Mx	-.003	1
52	MP3C	X	3.253	5
53	MP3C	Z	1.878	5
54	MP3C	Mx	-.003	5
55	MP4A	X	4.804	.25
56	MP4A	Z	2.774	.25
57	MP4A	Mx	-.000482	.25
58	MP4A	X	4.804	3.5
59	MP4A	Z	2.774	3.5
60	MP4A	Mx	-.000482	3.5
61	MP4B	X	2.865	.25
62	MP4B	Z	1.654	.25
63	MP4B	Mx	.002	.25
64	MP4B	X	2.865	3.5
65	MP4B	Z	1.654	3.5
66	MP4B	Mx	.002	3.5
67	MP5C	X	3.167	.25
68	MP5C	Z	1.829	.25
69	MP5C	Mx	-.002	.25
70	MP5C	X	3.167	3.5
71	MP5C	Z	1.829	3.5
72	MP5C	Mx	-.002	3.5
73	MP3A	X	3.165	1
74	MP3A	Z	1.827	1
75	MP3A	Mx	-.001	1
76	MP3B	X	2.268	1
77	MP3B	Z	1.309	1
78	MP3B	Mx	-.000782	1
79	MP4C	X	2.408	1
80	MP4C	Z	1.39	1
81	MP4C	Mx	.002	1
82	MP3A	X	3.145	2.5
83	MP3A	Z	1.816	2.5
84	MP3A	Mx	.002	2.5
85	MP3B	X	1.917	2.5
86	MP3B	Z	1.107	2.5
87	MP3B	Mx	-.001	2.5
88	MP4C	X	2.108	2.5
89	MP4C	Z	1.217	2.5
90	MP4C	Mx	.000445	2.5



**Member Point Loads (BLC 31 : Antenna Wm (120 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
91	M69	X	.214	.25
92	M69	Z	.124	.25
93	M69	Mx	0	.25
94	MP3C	X	1.974	2
95	MP3C	Z	1.14	2
96	MP3C	Mx	.002	2
97	MP3C	X	1.974	2
98	MP3C	Z	1.14	2
99	MP3C	Mx	.002	2

**Member Point Loads (BLC 32 : Antenna Wm (150 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	2.089	2.25
2	MP1A	Z	3.618	2.25
3	MP1A	Mx	-.001	2.25
4	MP1A	X	2.089	3.25
5	MP1A	Z	3.618	3.25
6	MP1A	Mx	-.001	3.25
7	MP1B	X	1.144	2.25
8	MP1B	Z	1.981	2.25
9	MP1B	Mx	.001	2.25
10	MP1B	X	1.144	3.25
11	MP1B	Z	1.981	3.25
12	MP1B	Mx	.001	3.25
13	MP1C	X	2.366	2.25
14	MP1C	Z	4.098	2.25
15	MP1C	Mx	-.001	2.25
16	MP1C	X	2.366	3.25
17	MP1C	Z	4.098	3.25
18	MP1C	Mx	-.001	3.25
19	MP2A	X	2.508	1
20	MP2A	Z	4.344	1
21	MP2A	Mx	-.004	1
22	MP2A	X	2.508	5
23	MP2A	Z	4.344	5
24	MP2A	Mx	-.004	5
25	MP2B	X	1.467	1
26	MP2B	Z	2.541	1
27	MP2B	Mx	.001	1
28	MP2B	X	1.467	5
29	MP2B	Z	2.541	5
30	MP2B	Mx	.001	5
31	MP2A	X	2.508	1
32	MP2A	Z	4.344	1
33	MP2A	Mx	.000309	1
34	MP2A	X	2.508	5
35	MP2A	Z	4.344	5
36	MP2A	Mx	.000309	5
37	MP2B	X	1.467	1
38	MP2B	Z	2.541	1
39	MP2B	Mx	.002	1
40	MP2B	X	1.467	5
41	MP2B	Z	2.541	5
42	MP2B	Mx	.002	5
43	MP3C	X	2.813	1
44	MP3C	Z	4.872	1



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**Member Point Loads (BLC 32 : Antenna Wm (150 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
45	MP3C	Mx	.001	1
46	MP3C	X	2.813	5
47	MP3C	Z	4.872	5
48	MP3C	Mx	.001	5
49	MP3C	X	2.813	1
50	MP3C	Z	4.872	1
51	MP3C	Mx	-.004	1
52	MP3C	X	2.813	5
53	MP3C	Z	4.872	5
54	MP3C	Mx	-.004	5
55	MP4A	X	2.271	.25
56	MP4A	Z	3.933	.25
57	MP4A	Mx	-.001	.25
58	MP4A	X	2.271	3.5
59	MP4A	Z	3.933	3.5
60	MP4A	Mx	-.001	3.5
61	MP4B	X	1.54	.25
62	MP4B	Z	2.667	.25
63	MP4B	Mx	.002	.25
64	MP4B	X	1.54	3.5
65	MP4B	Z	2.667	3.5
66	MP4B	Mx	.002	3.5
67	MP5C	X	2.485	.25
68	MP5C	Z	4.304	.25
69	MP5C	Mx	-.001	.25
70	MP5C	X	2.485	3.5
71	MP5C	Z	4.304	3.5
72	MP5C	Mx	-.001	3.5
73	MP3A	X	1.595	1
74	MP3A	Z	2.762	1
75	MP3A	Mx	-.000197	1
76	MP3B	X	1.257	1
77	MP3B	Z	2.176	1
78	MP3B	Mx	-.001	1
79	MP4C	X	1.694	1
80	MP4C	Z	2.933	1
81	MP4C	Mx	.002	1
82	MP3A	X	1.497	2.5
83	MP3A	Z	2.593	2.5
84	MP3A	Mx	.002	2.5
85	MP3B	X	1.034	2.5
86	MP3B	Z	1.792	2.5
87	MP3B	Mx	-.000839	2.5
88	MP4C	X	1.633	2.5
89	MP4C	Z	2.828	2.5
90	MP4C	Mx	-.000597	2.5
91	M69	X	.104	.25
92	M69	Z	.181	.25
93	M69	Mx	0	.25
94	MP3C	X	1.138	2
95	MP3C	Z	1.971	2
96	MP3C	Mx	.000481	2
97	MP3C	X	1.138	2
98	MP3C	Z	1.971	2
99	MP3C	Mx	.002	2



**Member Point Loads (BLC 33 : Antenna Wm (180 Deg))**

	Member Label	Direction	Magnitude[lb,k-ft]	Location[ft,%]
1	MP1A	X	0	2.25
2	MP1A	Z	2.582	2.25
3	MP1A	Mx	-.001	2.25
4	MP1A	X	0	3.25
5	MP1A	Z	2.582	3.25
6	MP1A	Mx	-.001	3.25
7	MP1B	X	0	2.25
8	MP1B	Z	3.588	2.25
9	MP1B	Mx	.001	2.25
10	MP1B	X	0	3.25
11	MP1B	Z	3.588	3.25
12	MP1B	Mx	.001	3.25
13	MP1C	X	0	2.25
14	MP1C	Z	5.582	2.25
15	MP1C	Mx	0	2.25
16	MP1C	X	0	3.25
17	MP1C	Z	5.582	3.25
18	MP1C	Mx	0	3.25
19	MP2A	X	0	1
20	MP2A	Z	3.259	1
21	MP2A	Mx	-.002	1
22	MP2A	X	0	5
23	MP2A	Z	3.259	5
24	MP2A	Mx	-.002	5
25	MP2B	X	0	1
26	MP2B	Z	4.366	1
27	MP2B	Mx	.000269	1
28	MP2B	X	0	5
29	MP2B	Z	4.366	5
30	MP2B	Mx	.000269	5
31	MP2A	X	0	1
32	MP2A	Z	3.259	1
33	MP2A	Mx	-.000974	1
34	MP2A	X	0	5
35	MP2A	Z	3.259	5
36	MP2A	Mx	-.000974	5
37	MP2B	X	0	1
38	MP2B	Z	4.366	1
39	MP2B	Mx	.003	1
40	MP2B	X	0	5
41	MP2B	Z	4.366	5
42	MP2B	Mx	.003	5
43	MP3C	X	0	1
44	MP3C	Z	6.56	1
45	MP3C	Mx	.003	1
46	MP3C	X	0	5
47	MP3C	Z	6.56	5
48	MP3C	Mx	.003	5
49	MP3C	X	0	1
50	MP3C	Z	6.56	1
51	MP3C	Mx	-.003	1
52	MP3C	X	0	5
53	MP3C	Z	6.56	5
54	MP3C	Mx	-.003	5
55	MP4A	X	0	.25
56	MP4A	Z	3.308	.25
57	MP4A	Mx	-.002	.25



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**Member Point Loads (BLC 33 : Antenna Wm (180 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
58	MP4A	X	0	3.5
59	MP4A	Z	3.308	3.5
60	MP4A	Mx	-.002	3.5
61	MP4B	X	0	.25
62	MP4B	Z	4.086	.25
63	MP4B	Mx	.002	.25
64	MP4B	X	0	3.5
65	MP4B	Z	4.086	3.5
66	MP4B	Mx	.002	3.5
67	MP5C	X	0	.25
68	MP5C	Z	5.627	.25
69	MP5C	Mx	0	.25
70	MP5C	X	0	3.5
71	MP5C	Z	5.627	3.5
72	MP5C	Mx	0	3.5
73	MP3A	X	0	1
74	MP3A	Z	2.618	1
75	MP3A	Mx	.000782	1
76	MP3B	X	0	1
77	MP3B	Z	2.978	1
78	MP3B	Mx	-.002	1
79	MP4C	X	0	1
80	MP4C	Z	3.691	1
81	MP4C	Mx	.002	1
82	MP3A	X	0	2.5
83	MP3A	Z	2.213	2.5
84	MP3A	Mx	.001	2.5
85	MP3B	X	0	2.5
86	MP3B	Z	2.706	2.5
87	MP3B	Mx	-.000167	2.5
88	MP4C	X	0	2.5
89	MP4C	Z	3.681	2.5
90	MP4C	Mx	-.002	2.5
91	M69	X	0	.25
92	M69	Z	.19	.25
93	M69	Mx	0	.25
94	MP3C	X	0	2
95	MP3C	Z	2.274	2
96	MP3C	Mx	-.000758	2
97	MP3C	X	0	2
98	MP3C	Z	2.274	2
99	MP3C	Mx	.000758	2

**Member Point Loads (BLC 34 : Antenna Wm (210 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-1.144	2.25
2	MP1A	Z	1.981	2.25
3	MP1A	Mx	-.001	2.25
4	MP1A	X	-1.144	3.25
5	MP1A	Z	1.981	3.25
6	MP1A	Mx	-.001	3.25
7	MP1B	X	-2.592	2.25
8	MP1B	Z	4.49	2.25
9	MP1B	Mx	.000887	2.25
10	MP1B	X	-2.592	3.25
11	MP1B	Z	4.49	3.25



**Member Point Loads (BLC 34 : Antenna Wm (210 Deg)) (Continued)**

	Member Label	Direction	Magnitude(lb.k-ft)	Location(ft.%)
12	MP1B	Mx	.000887	3.25
13	MP1C	X	-2.366	2.25
14	MP1C	Z	4.098	2.25
15	MP1C	Mx	.001	2.25
16	MP1C	X	-2.366	3.25
17	MP1C	Z	4.098	3.25
18	MP1C	Mx	.001	3.25
19	MP2A	X	-1.467	1
20	MP2A	Z	2.541	1
21	MP2A	Mx	-.001	1
22	MP2A	X	-1.467	5
23	MP2A	Z	2.541	5
24	MP2A	Mx	-.001	5
25	MP2B	X	-3.061	1
26	MP2B	Z	5.303	1
27	MP2B	Mx	-.002	1
28	MP2B	X	-3.061	5
29	MP2B	Z	5.303	5
30	MP2B	Mx	-.002	5
31	MP2A	X	-1.467	1
32	MP2A	Z	2.541	1
33	MP2A	Mx	-.002	1
34	MP2A	X	-1.467	5
35	MP2A	Z	2.541	5
36	MP2A	Mx	-.002	5
37	MP2B	X	-3.061	1
38	MP2B	Z	5.303	1
39	MP2B	Mx	.004	1
40	MP2B	X	-3.061	5
41	MP2B	Z	5.303	5
42	MP2B	Mx	.004	5
43	MP3C	X	-2.813	1
44	MP3C	Z	4.872	1
45	MP3C	Mx	.004	1
46	MP3C	X	-2.813	5
47	MP3C	Z	4.872	5
48	MP3C	Mx	.004	5
49	MP3C	X	-2.813	1
50	MP3C	Z	4.872	1
51	MP3C	Mx	-.001	1
52	MP3C	X	-2.813	5
53	MP3C	Z	4.872	5
54	MP3C	Mx	-.001	5
55	MP4A	X	-1.54	.25
56	MP4A	Z	2.667	.25
57	MP4A	Mx	-.002	.25
58	MP4A	X	-1.54	3.5
59	MP4A	Z	2.667	3.5
60	MP4A	Mx	-.002	3.5
61	MP4B	X	-2.66	.25
62	MP4B	Z	4.607	.25
63	MP4B	Mx	.00091	.25
64	MP4B	X	-2.66	3.5
65	MP4B	Z	4.607	3.5
66	MP4B	Mx	.00091	3.5
67	MP5C	X	-2.485	.25
68	MP5C	Z	4.304	.25





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**Member Point Loads (BLC 34 : Antenna Wm (210 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
69	MP5C	Mx	.001	.25
70	MP5C	X	-2.485	3.5
71	MP5C	Z	4.304	3.5
72	MP5C	Mx	.001	3.5
73	MP3A	X	-1.257	1
74	MP3A	Z	2.176	1
75	MP3A	Mx	.001	1
76	MP3B	X	-1.774	1
77	MP3B	Z	3.073	1
78	MP3B	Mx	-.002	1
79	MP4C	X	-1.694	1
80	MP4C	Z	2.933	1
81	MP4C	Mx	.000619	1
82	MP3A	X	-1.034	2.5
83	MP3A	Z	1.792	2.5
84	MP3A	Mx	.000839	2.5
85	MP3B	X	-1.743	2.5
86	MP3B	Z	3.02	2.5
87	MP3B	Mx	.001	2.5
88	MP4C	X	-1.633	2.5
89	MP4C	Z	2.828	2.5
90	MP4C	Mx	-.002	2.5
91	M69	X	-.104	.25
92	M69	Z	.181	.25
93	M69	Mx	0	.25
94	MP3C	X	-1.138	2
95	MP3C	Z	1.971	2
96	MP3C	Mx	-.002	2
97	MP3C	X	-1.138	2
98	MP3C	Z	1.971	2
99	MP3C	Mx	-.000481	2

**Member Point Loads (BLC 35 : Antenna Wm (240 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-3.108	2.25
2	MP1A	Z	1.794	2.25
3	MP1A	Mx	-.001	2.25
4	MP1A	X	-3.108	3.25
5	MP1A	Z	1.794	3.25
6	MP1A	Mx	-.001	3.25
7	MP1B	X	-4.745	2.25
8	MP1B	Z	2.74	2.25
9	MP1B	Mx	-.000476	2.25
10	MP1B	X	-4.745	3.25
11	MP1B	Z	2.74	3.25
12	MP1B	Mx	-.000476	3.25
13	MP1C	X	-2.628	2.25
14	MP1C	Z	1.517	2.25
15	MP1C	Mx	.001	2.25
16	MP1C	X	-2.628	3.25
17	MP1C	Z	1.517	3.25
18	MP1C	Mx	.001	3.25
19	MP2A	X	-3.781	1
20	MP2A	Z	2.183	1
21	MP2A	Mx	-.000269	1
22	MP2A	X	-3.781	5



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**Member Point Loads (BLC 35 : Antenna Wm (240 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
23	MP2A	Z	2.183	5
24	MP2A	Mx	-0.00269	5
25	MP2B	X	-5.584	1
26	MP2B	Z	3.224	1
27	MP2B	Mx	-.004	1
28	MP2B	X	-5.584	5
29	MP2B	Z	3.224	5
30	MP2B	Mx	-.004	5
31	MP2A	X	-3.781	1
32	MP2A	Z	2.183	1
33	MP2A	Mx	-.003	1
34	MP2A	X	-3.781	5
35	MP2A	Z	2.183	5
36	MP2A	Mx	-.003	5
37	MP2B	X	-5.584	1
38	MP2B	Z	3.224	1
39	MP2B	Mx	.003	1
40	MP2B	X	-5.584	5
41	MP2B	Z	3.224	5
42	MP2B	Mx	.003	5
43	MP3C	X	-3.253	1
44	MP3C	Z	1.878	1
45	MP3C	Mx	.003	1
46	MP3C	X	-3.253	5
47	MP3C	Z	1.878	5
48	MP3C	Mx	.003	5
49	MP3C	X	-3.253	1
50	MP3C	Z	1.878	1
51	MP3C	Mx	.000688	1
52	MP3C	X	-3.253	5
53	MP3C	Z	1.878	5
54	MP3C	Mx	.000688	5
55	MP4A	X	-3.538	.25
56	MP4A	Z	2.043	.25
57	MP4A	Mx	-.002	.25
58	MP4A	X	-3.538	3.5
59	MP4A	Z	2.043	3.5
60	MP4A	Mx	-.002	3.5
61	MP4B	X	-4.804	.25
62	MP4B	Z	2.774	.25
63	MP4B	Mx	-.000481	.25
64	MP4B	X	-4.804	3.5
65	MP4B	Z	2.774	3.5
66	MP4B	Mx	-.000481	3.5
67	MP5C	X	-3.167	.25
68	MP5C	Z	1.829	.25
69	MP5C	Mx	.002	.25
70	MP5C	X	-3.167	3.5
71	MP5C	Z	1.829	3.5
72	MP5C	Mx	.002	3.5
73	MP3A	X	-2.579	1
74	MP3A	Z	1.489	1
75	MP3A	Mx	.002	1
76	MP3B	X	-3.165	1
77	MP3B	Z	1.827	1
78	MP3B	Mx	-.001	1
79	MP4C	X	-2.408	1



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**Member Point Loads (BLC 35 : Antenna Wm (240 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
80	MP4C	Z	1.39	1
81	MP4C	Mx	-0.00509	1
82	MP3A	X	-2.343	2.5
83	MP3A	Z	1.353	2.5
84	MP3A	Mx	.000167	2.5
85	MP3B	X	-3.145	2.5
86	MP3B	Z	1.816	2.5
87	MP3B	Mx	.002	2.5
88	MP4C	X	-2.108	2.5
89	MP4C	Z	1.217	2.5
90	MP4C	Mx	-.002	2.5
91	M69	X	-.214	.25
92	M69	Z	.124	.25
93	M69	Mx	0	.25
94	MP3C	X	-1.974	2
95	MP3C	Z	1.14	2
96	MP3C	Mx	-.002	2
97	MP3C	X	-1.974	2
98	MP3C	Z	1.14	2
99	MP3C	Mx	-.002	2

**Member Point Loads (BLC 36 : Antenna Wm (270 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-5.184	2.25
2	MP1A	Z	0	2.25
3	MP1A	Mx	-.000887	2.25
4	MP1A	X	-5.184	3.25
5	MP1A	Z	0	3.25
6	MP1A	Mx	-.000887	3.25
7	MP1B	X	-4.178	2.25
8	MP1B	Z	0	2.25
9	MP1B	Mx	-.001	2.25
10	MP1B	X	-4.178	3.25
11	MP1B	Z	0	3.25
12	MP1B	Mx	-.001	3.25
13	MP1C	X	-2.185	2.25
14	MP1C	Z	0	2.25
15	MP1C	Mx	.001	2.25
16	MP1C	X	-2.185	3.25
17	MP1C	Z	0	3.25
18	MP1C	Mx	.001	3.25
19	MP2A	X	-6.123	1
20	MP2A	Z	0	1
21	MP2A	Mx	.002	1
22	MP2A	X	-6.123	5
23	MP2A	Z	0	5
24	MP2A	Mx	.002	5
25	MP2B	X	-5.016	1
26	MP2B	Z	0	1
27	MP2B	Mx	-.004	1
28	MP2B	X	-5.016	5
29	MP2B	Z	0	5
30	MP2B	Mx	-.004	5
31	MP2A	X	-6.123	1
32	MP2A	Z	0	1
33	MP2A	Mx	-.004	1



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**Member Point Loads (BLC 36 : Antenna Wm (270 Deg)) (Continued)**

Member Label	Direction	Magnitude(lb.k-ft)	Location(ft.%)	
34	MP2A	X	-6.123	5
35	MP2A	Z	0	5
36	MP2A	Mx	-.004	5
37	MP2B	X	-5.016	1
38	MP2B	Z	0	1
39	MP2B	Mx	.000309	1
40	MP2B	X	-5.016	5
41	MP2B	Z	0	5
42	MP2B	Mx	.000309	5
43	MP3C	X	-2.822	1
44	MP3C	Z	0	1
45	MP3C	Mx	.001	1
46	MP3C	X	-2.822	5
47	MP3C	Z	0	5
48	MP3C	Mx	.001	5
49	MP3C	X	-2.822	1
50	MP3C	Z	0	1
51	MP3C	Mx	.001	1
52	MP3C	X	-2.822	5
53	MP3C	Z	0	5
54	MP3C	Mx	.001	5
55	MP4A	X	-5.319	.25
56	MP4A	Z	0	.25
57	MP4A	Mx	-.00091	.25
58	MP4A	X	-5.319	3.5
59	MP4A	Z	0	3.5
60	MP4A	Mx	-.00091	3.5
61	MP4B	X	-4.542	.25
62	MP4B	Z	0	.25
63	MP4B	Mx	-.001	.25
64	MP4B	X	-4.542	3.5
65	MP4B	Z	0	3.5
66	MP4B	Mx	-.001	3.5
67	MP5C	X	-3.001	.25
68	MP5C	Z	0	.25
69	MP5C	Mx	.002	.25
70	MP5C	X	-3.001	3.5
71	MP5C	Z	0	3.5
72	MP5C	Mx	.002	3.5
73	MP3A	X	-3.549	1
74	MP3A	Z	0	1
75	MP3A	Mx	.002	1
76	MP3B	X	-3.189	1
77	MP3B	Z	0	1
78	MP3B	Mx	-.000197	1
79	MP4C	X	-2.476	1
80	MP4C	Z	0	1
81	MP4C	Mx	-.001	1
82	MP3A	X	-3.487	2.5
83	MP3A	Z	0	2.5
84	MP3A	Mx	-.001	2.5
85	MP3B	X	-2.994	2.5
86	MP3B	Z	0	2.5
87	MP3B	Mx	.002	2.5
88	MP4C	X	-2.019	2.5
89	MP4C	Z	0	2.5
90	MP4C	Mx	-.001	2.5



**Member Point Loads (BLC 36 : Antenna Wm (270 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
91	M69	X	- .267	.25
92	M69	Z	0	.25
93	M69	Mx	0	.25
94	MP3C	X	-2.281	2
95	MP3C	Z	0	2
96	MP3C	Mx	-.002	2
97	MP3C	X	-2.281	2
98	MP3C	Z	0	2
99	MP3C	Mx	-.002	2

**Member Point Loads (BLC 37 : Antenna Wm (300 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft. %]
1	MP1A	X	-4.745	2.25
2	MP1A	Z	-2.74	2.25
3	MP1A	Mx	.000476	2.25
4	MP1A	X	-4.745	3.25
5	MP1A	Z	-2.74	3.25
6	MP1A	Mx	.000476	3.25
7	MP1B	X	-2.236	2.25
8	MP1B	Z	-1.291	2.25
9	MP1B	Mx	-.001	2.25
10	MP1B	X	-2.236	3.25
11	MP1B	Z	-1.291	3.25
12	MP1B	Mx	-.001	3.25
13	MP1C	X	-2.628	2.25
14	MP1C	Z	-1.517	2.25
15	MP1C	Mx	.001	2.25
16	MP1C	X	-2.628	3.25
17	MP1C	Z	-1.517	3.25
18	MP1C	Mx	.001	3.25
19	MP2A	X	-5.584	1
20	MP2A	Z	-3.224	1
21	MP2A	Mx	.004	1
22	MP2A	X	-5.584	5
23	MP2A	Z	-3.224	5
24	MP2A	Mx	.004	5
25	MP2B	X	-2.822	1
26	MP2B	Z	-1.63	1
27	MP2B	Mx	-.002	1
28	MP2B	X	-2.822	5
29	MP2B	Z	-1.63	5
30	MP2B	Mx	-.002	5
31	MP2A	X	-5.584	1
32	MP2A	Z	-3.224	1
33	MP2A	Mx	-.003	1
34	MP2A	X	-5.584	5
35	MP2A	Z	-3.224	5
36	MP2A	Mx	-.003	5
37	MP2B	X	-2.822	1
38	MP2B	Z	-1.63	1
39	MP2B	Mx	-.000974	1
40	MP2B	X	-2.822	5
41	MP2B	Z	-1.63	5
42	MP2B	Mx	-.000974	5
43	MP3C	X	-3.253	1
44	MP3C	Z	-1.878	1



**Member Point Loads (BLC 37 : Antenna Wm (300 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
45	MP3C	Mx	.000688	1
46	MP3C	X	-3.253	5
47	MP3C	Z	-1.878	5
48	MP3C	Mx	.000688	5
49	MP3C	X	-3.253	1
50	MP3C	Z	-1.878	1
51	MP3C	Mx	.003	1
52	MP3C	X	-3.253	5
53	MP3C	Z	-1.878	5
54	MP3C	Mx	.003	5
55	MP4A	X	-4.804	.25
56	MP4A	Z	-2.774	.25
57	MP4A	Mx	.000482	.25
58	MP4A	X	-4.804	3.5
59	MP4A	Z	-2.774	3.5
60	MP4A	Mx	.000482	3.5
61	MP4B	X	-2.865	.25
62	MP4B	Z	-1.654	.25
63	MP4B	Mx	-.002	.25
64	MP4B	X	-2.865	3.5
65	MP4B	Z	-1.654	3.5
66	MP4B	Mx	-.002	3.5
67	MP5C	X	-3.167	.25
68	MP5C	Z	-1.829	.25
69	MP5C	Mx	.002	.25
70	MP5C	X	-3.167	3.5
71	MP5C	Z	-1.829	3.5
72	MP5C	Mx	.002	3.5
73	MP3A	X	-3.165	1
74	MP3A	Z	-1.827	1
75	MP3A	Mx	.001	1
76	MP3B	X	-2.268	1
77	MP3B	Z	-1.309	1
78	MP3B	Mx	.000782	1
79	MP4C	X	-2.408	1
80	MP4C	Z	-1.39	1
81	MP4C	Mx	-.002	1
82	MP3A	X	-3.145	2.5
83	MP3A	Z	-1.816	2.5
84	MP3A	Mx	-.002	2.5
85	MP3B	X	-1.917	2.5
86	MP3B	Z	-1.107	2.5
87	MP3B	Mx	.001	2.5
88	MP4C	X	-2.108	2.5
89	MP4C	Z	-1.217	2.5
90	MP4C	Mx	-.000445	2.5
91	M69	X	-.214	.25
92	M69	Z	-.124	.25
93	M69	Mx	0	.25
94	MP3C	X	-1.974	2
95	MP3C	Z	-1.14	2
96	MP3C	Mx	-.002	2
97	MP3C	X	-1.974	2
98	MP3C	Z	-1.14	2
99	MP3C	Mx	-.002	2



**Member Point Loads (BLC 38 : Antenna Wm (330 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	X	-2.089	2.25
2	MP1A	Z	-3.618	2.25
3	MP1A	Mx	.001	2.25
4	MP1A	X	-2.089	3.25
5	MP1A	Z	-3.618	3.25
6	MP1A	Mx	.001	3.25
7	MP1B	X	-1.144	2.25
8	MP1B	Z	-1.981	2.25
9	MP1B	Mx	-.001	2.25
10	MP1B	X	-1.144	3.25
11	MP1B	Z	-1.981	3.25
12	MP1B	Mx	-.001	3.25
13	MP1C	X	-2.366	2.25
14	MP1C	Z	-4.098	2.25
15	MP1C	Mx	.001	2.25
16	MP1C	X	-2.366	3.25
17	MP1C	Z	-4.098	3.25
18	MP1C	Mx	.001	3.25
19	MP2A	X	-2.508	1
20	MP2A	Z	-4.344	1
21	MP2A	Mx	.004	1
22	MP2A	X	-2.508	5
23	MP2A	Z	-4.344	5
24	MP2A	Mx	.004	5
25	MP2B	X	-1.467	1
26	MP2B	Z	-2.541	1
27	MP2B	Mx	-.001	1
28	MP2B	X	-1.467	5
29	MP2B	Z	-2.541	5
30	MP2B	Mx	-.001	5
31	MP2A	X	-2.508	1
32	MP2A	Z	-4.344	1
33	MP2A	Mx	-.000309	1
34	MP2A	X	-2.508	5
35	MP2A	Z	-4.344	5
36	MP2A	Mx	-.000309	5
37	MP2B	X	-1.467	1
38	MP2B	Z	-2.541	1
39	MP2B	Mx	-.002	1
40	MP2B	X	-1.467	5
41	MP2B	Z	-2.541	5
42	MP2B	Mx	-.002	5
43	MP3C	X	-2.813	1
44	MP3C	Z	-4.872	1
45	MP3C	Mx	-.001	1
46	MP3C	X	-2.813	5
47	MP3C	Z	-4.872	5
48	MP3C	Mx	-.001	5
49	MP3C	X	-2.813	1
50	MP3C	Z	-4.872	1
51	MP3C	Mx	.004	1
52	MP3C	X	-2.813	5
53	MP3C	Z	-4.872	5
54	MP3C	Mx	.004	5
55	MP4A	X	-2.271	.25
56	MP4A	Z	-3.933	.25
57	MP4A	Mx	.001	.25



**Member Point Loads (BLC 38 : Antenna Wm (330 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
58	MP4A	X	-2.271	3.5
59	MP4A	Z	-3.933	3.5
60	MP4A	Mx	.001	3.5
61	MP4B	X	-1.54	.25
62	MP4B	Z	-2.667	.25
63	MP4B	Mx	-.002	.25
64	MP4B	X	-1.54	3.5
65	MP4B	Z	-2.667	3.5
66	MP4B	Mx	-.002	3.5
67	MP5C	X	-2.485	.25
68	MP5C	Z	-4.304	.25
69	MP5C	Mx	.001	.25
70	MP5C	X	-2.485	3.5
71	MP5C	Z	-4.304	3.5
72	MP5C	Mx	.001	3.5
73	MP3A	X	-1.595	1
74	MP3A	Z	-2.762	1
75	MP3A	Mx	.000197	1
76	MP3B	X	-1.257	1
77	MP3B	Z	-2.176	1
78	MP3B	Mx	.001	1
79	MP4C	X	-1.694	1
80	MP4C	Z	-2.933	1
81	MP4C	Mx	-.002	1
82	MP3A	X	-1.497	2.5
83	MP3A	Z	-2.593	2.5
84	MP3A	Mx	-.002	2.5
85	MP3B	X	-1.034	2.5
86	MP3B	Z	-1.792	2.5
87	MP3B	Mx	.000839	2.5
88	MP4C	X	-1.633	2.5
89	MP4C	Z	-2.828	2.5
90	MP4C	Mx	.000597	2.5
91	M69	X	-.104	.25
92	M69	Z	-.181	.25
93	M69	Mx	0	.25
94	MP3C	X	-1.138	2
95	MP3C	Z	-1.971	2
96	MP3C	Mx	-.000481	2
97	MP3C	X	-1.138	2
98	MP3C	Z	-1.971	2
99	MP3C	Mx	-.002	2

**Member Point Loads (BLC 77 : Lm1)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	M37	Y	-500	%100

**Member Point Loads (BLC 78 : Lm2)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	M41	Y	-500	%100

**Member Point Loads (BLC 79 : Lv1)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	M20A	Y	-250	%50





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**Member Point Loads (BLC 80 : Lv2)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	M20A	Y	-250	%100

**Member Point Loads (BLC 81 : Antenna Ev)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	Y	-1.775	2.25
2	MP1A	My	.000303	2.25
3	MP1A	Mz	-.000834	2.25
4	MP1A	Y	-1.775	3.25
5	MP1A	My	.000303	3.25
6	MP1A	Mz	-.000834	3.25
7	MP1B	Y	-1.775	2.25
8	MP1B	My	.00057	2.25
9	MP1B	Mz	.00068	2.25
10	MP1B	Y	-1.775	3.25
11	MP1B	My	.00057	3.25
12	MP1B	Mz	.00068	3.25
13	MP1C	Y	-1.775	2.25
14	MP1C	My	-.000887	2.25
15	MP1C	Mz	0	2.25
16	MP1C	Y	-1.775	3.25
17	MP1C	My	-.000887	3.25
18	MP1C	Mz	0	3.25
19	MP2A	Y	-.815	1
20	MP2A	My	-.000244	1
21	MP2A	Mz	-.000522	1
22	MP2A	Y	-.815	5
23	MP2A	My	-.000244	5
24	MP2A	Mz	-.000522	5
25	MP2B	Y	-.815	1
26	MP2B	My	.000574	1
27	MP2B	Mz	5e-5	1
28	MP2B	Y	-.815	5
29	MP2B	My	.000574	5
30	MP2B	Mz	5e-5	5
31	MP2A	Y	-.815	1
32	MP2A	My	.000522	1
33	MP2A	Mz	-.000244	1
34	MP2A	Y	-.815	5
35	MP2A	My	.000522	5
36	MP2A	Mz	-.000244	5
37	MP2B	Y	-.815	1
38	MP2B	My	-5e-5	1
39	MP2B	Mz	.000574	1
40	MP2B	Y	-.815	5
41	MP2B	My	-5e-5	5
42	MP2B	Mz	.000574	5
43	MP3C	Y	-.815	1
44	MP3C	My	-.000407	1
45	MP3C	Mz	.000407	1
46	MP3C	Y	-.815	5
47	MP3C	My	-.000407	5
48	MP3C	Mz	.000407	5
49	MP3C	Y	-.815	1
50	MP3C	My	-.000407	1
51	MP3C	Mz	-.000407	1
52	MP3C	Y	-.815	5



**Member Point Loads (BLC 81 : Antenna Ev) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
53	MP3C	My	-.000407	5
54	MP3C	Mz	-.000407	5
55	MP4A	Y	-.202	.25
56	MP4A	My	3.4e-5	.25
57	MP4A	Mz	-9.5e-5	.25
58	MP4A	Y	-.202	3.5
59	MP4A	My	3.4e-5	3.5
60	MP4A	Mz	-9.5e-5	3.5
61	MP4B	Y	-.202	.25
62	MP4B	My	6.5e-5	.25
63	MP4B	Mz	7.7e-5	.25
64	MP4B	Y	-.202	3.5
65	MP4B	My	6.5e-5	3.5
66	MP4B	Mz	7.7e-5	3.5
67	MP5C	Y	-.202	.25
68	MP5C	My	-.000101	.25
69	MP5C	Mz	0	.25
70	MP5C	Y	-.202	3.5
71	MP5C	My	-.000101	3.5
72	MP5C	Mz	0	3.5
73	MP3A	Y	-3.439	1
74	MP3A	My	-.002	1
75	MP3A	Mz	.001	1
76	MP3B	Y	-3.439	1
77	MP3B	My	.000212	1
78	MP3B	Mz	-.002	1
79	MP4C	Y	-3.439	1
80	MP4C	My	.002	1
81	MP4C	Mz	.002	1
82	MP3A	Y	-2.864	2.5
83	MP3A	Mv	.000856	2.5
84	MP3A	Mz	.002	2.5
85	MP3B	Y	-2.864	2.5
86	MP3B	My	-.002	2.5
87	MP3B	Mz	-.000177	2.5
88	MP4C	Y	-2.864	2.5
89	MP4C	My	.001	2.5
90	MP4C	Mz	-.001	2.5
91	M69	Y	-.02	.25
92	M69	My	0	.25
93	M69	Mz	0	.25
94	MP3C	Y	-.717	2
95	MP3C	Mv	.000717	2
96	MP3C	Mz	-.000239	2
97	MP3C	Y	-.717	2
98	MP3C	My	.000717	2
99	MP3C	Mz	.000239	2

**Member Point Loads (BLC 82 : Antenna Eh (0 Deg))**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
1	MP1A	Z	-4.436	2.25
2	MP1A	Mx	.002	2.25
3	MP1A	Z	-4.436	3.25
4	MP1A	Mx	.002	3.25
5	MP1B	Z	-4.436	2.25
6	MP1B	Mx	-.002	2.25



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**Member Point Loads (BLC 82 : Antenna Eh (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
7	MP1B	Z	-4.436	3.25
8	MP1B	Mx	-.002	3.25
9	MP1C	Z	-4.436	2.25
10	MP1C	Mx	0	2.25
11	MP1C	Z	-4.436	3.25
12	MP1C	Mx	0	3.25
13	MP2A	Z	-2.037	1
14	MP2A	Mx	.001	1
15	MP2A	Z	-2.037	5
16	MP2A	Mx	.001	5
17	MP2B	Z	-2.037	1
18	MP2B	Mx	-.000126	1
19	MP2B	Z	-2.037	5
20	MP2B	Mx	-.000126	5
21	MP2A	Z	-2.037	1
22	MP2A	Mx	.000609	1
23	MP2A	Z	-2.037	5
24	MP2A	Mx	.000609	5
25	MP2B	Z	-2.037	1
26	MP2B	Mx	-.001	1
27	MP2B	Z	-2.037	5
28	MP2B	Mx	-.001	5
29	MP3C	Z	-2.037	1
30	MP3C	Mx	-.001	1
31	MP3C	Z	-2.037	5
32	MP3C	Mx	-.001	5
33	MP3C	Z	-2.037	1
34	MP3C	Mx	.001	1
35	MP3C	Z	-2.037	5
36	MP3C	Mx	.001	5
37	MP4A	Z	-.504	.25
38	MP4A	Mx	.000237	.25
39	MP4A	Z	-.504	3.5
40	MP4A	Mx	.000237	3.5
41	MP4B	Z	-.504	.25
42	MP4B	Mx	-.000193	.25
43	MP4B	Z	-.504	3.5
44	MP4B	Mx	-.000193	3.5
45	MP5C	Z	-.504	.25
46	MP5C	Mx	0	.25
47	MP5C	Z	-.504	3.5
48	MP5C	Mx	0	3.5
49	MP3A	Z	-8.598	1
50	MP3A	Mx	-.003	1
51	MP3B	Z	-8.598	1
52	MP3B	Mx	.006	1
53	MP4C	Z	-8.598	1
54	MP4C	Mx	-.004	1
55	MP3A	Z	-7.161	2.5
56	MP3A	Mx	-.005	2.5
57	MP3B	Z	-7.161	2.5
58	MP3B	Mx	.000441	2.5
59	MP4C	Z	-7.161	2.5
60	MP4C	Mx	.004	2.5
61	M69	Z	-.051	.25
62	M69	Mx	0	.25
63	MP3C	Z	-1.793	2



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**Member Point Loads (BLC 82 : Antenna Eh (0 Deg)) (Continued)**

	Member Label	Direction	Magnitude(lb.k-ft)	Location(ft.%)
64	MP3C	Mx	.000598	2
65	MP3C	Z	-1.793	2
66	MP3C	Mx	-.000598	2

**Member Point Loads (BLC 83 : Antenna Eh (90 Deg))**

	Member Label	Direction	Magnitude(lb.k-ft)	Location(ft.%)
1	MP1A	X	4.436	2.25
2	MP1A	Mx	.000759	2.25
3	MP1A	X	4.436	3.25
4	MP1A	Mx	.000759	3.25
5	MP1B	X	4.436	2.25
6	MP1B	Mx	.001	2.25
7	MP1B	X	4.436	3.25
8	MP1B	Mx	.001	3.25
9	MP1C	X	4.436	2.25
10	MP1C	Mx	-.002	2.25
11	MP1C	X	4.436	3.25
12	MP1C	Mx	-.002	3.25
13	MP2A	X	2.037	1
14	MP2A	Mx	-.000609	1
15	MP2A	X	2.037	5
16	MP2A	Mx	-.000609	5
17	MP2B	X	2.037	1
18	MP2B	Mx	.001	1
19	MP2B	X	2.037	5
20	MP2B	Mx	.001	5
21	MP2A	X	2.037	1
22	MP2A	Mx	.001	1
23	MP2A	X	2.037	5
24	MP2A	Mx	.001	5
25	MP2B	X	2.037	1
26	MP2B	Mx	-.000126	1
27	MP2B	X	2.037	5
28	MP2B	Mx	-.000126	5
29	MP3C	X	2.037	1
30	MP3C	Mx	-.001	1
31	MP3C	X	2.037	5
32	MP3C	Mx	-.001	5
33	MP3C	X	2.037	1
34	MP3C	Mx	-.001	1
35	MP3C	X	2.037	5
36	MP3C	Mx	-.001	5
37	MP4A	X	.504	.25
38	MP4A	Mx	8.6e-5	.25
39	MP4A	X	.504	3.5
40	MP4A	Mx	8.6e-5	3.5
41	MP4B	X	.504	.25
42	MP4B	Mx	.000162	.25
43	MP4B	X	.504	3.5
44	MP4B	Mx	.000162	3.5
45	MP5C	X	.504	.25
46	MP5C	Mx	-.000252	.25
47	MP5C	X	.504	3.5
48	MP5C	Mx	-.000252	3.5
49	MP3A	X	8.598	1
50	MP3A	Mx	-.006	1



**Member Point Loads (BLC 83 : Antenna Eh (90 Deg)) (Continued)**

	Member Label	Direction	Magnitude[lb.k-ft]	Location[ft.%]
51	MP3B	X	8.598	1
52	MP3B	Mx	.00053	1
53	MP4C	X	8.598	1
54	MP4C	Mx	.004	1
55	MP3A	X	7.161	2.5
56	MP3A	Mx	.002	2.5
57	MP3B	X	7.161	2.5
58	MP3B	Mx	-.005	2.5
59	MP4C	X	7.161	2.5
60	MP4C	Mx	.004	2.5
61	M69	X	.051	.25
62	M69	Mx	0	.25
63	MP3C	X	1.793	2
64	MP3C	Mx	.002	2
65	MP3C	X	1.793	2
66	MP3C	Mx	.002	2

**Member Distributed Loads (BLC 40 : Structure Di)**

	Member Label	Direction	Start Magnitude[lb/ft. ...]	End Magnitude[lb/ft. F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	Y	-14.63	-14.63	0	%100
2	M13	Y	-14.63	-14.63	0	%100
3	M14	Y	-14.63	-14.63	0	%100
4	M21	Y	-14.63	-14.63	0	%100
5	M19	Y	-14.63	-14.63	0	%100
6	M20A	Y	-14.63	-14.63	0	%100
7	M21A	Y	-8.96	-8.96	0	%100
8	M15A	Y	-8.96	-8.96	0	%100
9	M17A	Y	-8.96	-8.96	0	%100
10	M19A	Y	-8.96	-8.96	0	%100
11	M21B	Y	-8.96	-8.96	0	%100
12	M23	Y	-8.96	-8.96	0	%100
13	M25	Y	-8.96	-8.96	0	%100
14	M27	Y	-8.96	-8.96	0	%100
15	M29	Y	-8.96	-8.96	0	%100
16	M31	Y	-8.96	-8.96	0	%100
17	M33	Y	-8.96	-8.96	0	%100
18	M35	Y	-8.96	-8.96	0	%100
19	MP1A	Y	-8.051	-8.051	0	%100
20	MP2A	Y	-8.051	-8.051	0	%100
21	MP3A	Y	-8.051	-8.051	0	%100
22	MP4A	Y	-8.051	-8.051	0	%100
23	MP1B	Y	-8.051	-8.051	0	%100
24	MP2B	Y	-8.051	-8.051	0	%100
25	MP3B	Y	-8.051	-8.051	0	%100
26	MP4B	Y	-8.051	-8.051	0	%100
27	MP1C	Y	-8.051	-8.051	0	%100
28	MP2C	Y	-8.051	-8.051	0	%100
29	MP3C	Y	-8.051	-8.051	0	%100
30	MP4C	Y	-8.051	-8.051	0	%100
31	MP5C	Y	-8.051	-8.051	0	%100
32	M67	Y	-4.292	-4.292	0	%100
33	M68	Y	-4.292	-4.292	0	%100
34	M69	Y	-7.099	-7.099	0	%100
35	M70	Y	-16.822	-16.822	0	%100
36	M71	Y	-16.822	-16.822	0	%100



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**Member Distributed Loads (BLC 40 : Structure Di) (Continued)**

Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
37	M72	Y	-16.822	-16.822	0 %100

**Member Distributed Loads (BLC 41 : Structure Wo (0 Deg))**

Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	0	0	0 %100
2	M40	Z	0	0	0 %100
3	M13	X	0	0	0 %100
4	M13	Z	-11.845	-11.845	0 %100
5	M14	X	0	0	0 %100
6	M14	Z	-11.845	-11.845	0 %100
7	M21	X	0	0	0 %100
8	M21	Z	-3.948	-3.948	0 %100
9	M19	X	0	0	0 %100
10	M19	Z	-3.948	-3.948	0 %100
11	M20A	X	0	0	0 %100
12	M20A	Z	-15.793	-15.793	0 %100
13	M21A	X	0	0	0 %100
14	M21A	Z	0	0	0 %100
15	M15A	X	0	0	0 %100
16	M15A	Z	0	0	0 %100
17	M17A	X	0	0	0 %100
18	M17A	Z	0	0	0 %100
19	M19A	X	0	0	0 %100
20	M19A	Z	0	0	0 %100
21	M21B	X	0	0	0 %100
22	M21B	Z	-6.423	-6.423	0 %100
23	M23	X	0	0	0 %100
24	M23	Z	-6.423	-6.423	0 %100
25	M25	X	0	0	0 %100
26	M25	Z	-6.423	-6.423	0 %100
27	M27	X	0	0	0 %100
28	M27	Z	-6.423	-6.423	0 %100
29	M29	X	0	0	0 %100
30	M29	Z	-6.423	-6.423	0 %100
31	M31	X	0	0	0 %100
32	M31	Z	-6.423	-6.423	0 %100
33	M33	X	0	0	0 %100
34	M33	Z	-6.423	-6.423	0 %100
35	M35	X	0	0	0 %100
36	M35	Z	-6.423	-6.423	0 %100
37	MP1A	X	0	0	0 %100
38	MP1A	Z	-9.002	-9.002	0 %100
39	MP2A	X	0	0	0 %100
40	MP2A	Z	-9.002	-9.002	0 %100
41	MP3A	X	0	0	0 %100
42	MP3A	Z	-9.002	-9.002	0 %100
43	MP4A	X	0	0	0 %100
44	MP4A	Z	-9.002	-9.002	0 %100
45	MP1B	X	0	0	0 %100
46	MP1B	Z	-9.002	-9.002	0 %100
47	MP2B	X	0	0	0 %100
48	MP2B	Z	-9.002	-9.002	0 %100
49	MP3B	X	0	0	0 %100
50	MP3B	Z	-9.002	-9.002	0 %100
51	MP4B	X	0	0	0 %100
52	MP4B	Z	-9.002	-9.002	0 %100



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**Member Distributed Loads (BLC 41 : Structure Wo (0 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
53	MP1C	X	0	0	0	%100
54	MP1C	Z	-9.002	-9.002	0	%100
55	MP2C	X	0	0	0	%100
56	MP2C	Z	-9.002	-9.002	0	%100
57	MP3C	X	0	0	0	%100
58	MP3C	Z	-9.002	-9.002	0	%100
59	MP4C	X	0	0	0	%100
60	MP4C	Z	-9.002	-9.002	0	%100
61	MP5C	X	0	0	0	%100
62	MP5C	Z	-9.002	-9.002	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	-.342	-.342	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	-.342	-.342	0	%100
67	M69	X	0	0	0	%100
68	M69	Z	-5.973	-5.973	0	%100
69	M70	X	0	0	0	%100
70	M70	Z	-10.611	-10.611	0	%100
71	M71	X	0	0	0	%100
72	M71	Z	-16.76	-16.76	0	%100
73	M72	X	0	0	0	%100
74	M72	Z	-16.76	-16.76	0	%100

**Member Distributed Loads (BLC 42 : Structure Wo (30 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	1.974	1.974	0	%100
2	M40	Z	-3.419	-3.419	0	%100
3	M13	X	1.974	1.974	0	%100
4	M13	Z	-3.419	-3.419	0	%100
5	M14	X	7.897	7.897	0	%100
6	M14	Z	-13.677	-13.677	0	%100
7	M21	X	5.922	5.922	0	%100
8	M21	Z	-10.258	-10.258	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	5.922	5.922	0	%100
12	M20A	Z	-10.258	-10.258	0	%100
13	M21A	X	1.07	1.07	0	%100
14	M21A	Z	-1.854	-1.854	0	%100
15	M15A	X	1.07	1.07	0	%100
16	M15A	Z	-1.854	-1.854	0	%100
17	M17A	X	1.07	1.07	0	%100
18	M17A	Z	-1.854	-1.854	0	%100
19	M19A	X	1.07	1.07	0	%100
20	M19A	Z	-1.854	-1.854	0	%100
21	M21B	X	1.07	1.07	0	%100
22	M21B	Z	-1.854	-1.854	0	%100
23	M23	X	1.07	1.07	0	%100
24	M23	Z	-1.854	-1.854	0	%100
25	M25	X	1.07	1.07	0	%100
26	M25	Z	-1.854	-1.854	0	%100
27	M27	X	1.07	1.07	0	%100
28	M27	Z	-1.854	-1.854	0	%100
29	M29	X	4.282	4.282	0	%100
30	M29	Z	-7.416	-7.416	0	%100
31	M31	X	4.282	4.282	0	%100



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**Member Distributed Loads (BLC 42 : Structure Wo (30 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
32	M31	Z	-7.416	-7.416	0	%100
33	M33	X	4.282	4.282	0	%100
34	M33	Z	-7.416	-7.416	0	%100
35	M35	X	4.282	4.282	0	%100
36	M35	Z	-7.416	-7.416	0	%100
37	MP1A	X	4.501	4.501	0	%100
38	MP1A	Z	-7.796	-7.796	0	%100
39	MP2A	X	4.501	4.501	0	%100
40	MP2A	Z	-7.796	-7.796	0	%100
41	MP3A	X	4.501	4.501	0	%100
42	MP3A	Z	-7.796	-7.796	0	%100
43	MP4A	X	4.501	4.501	0	%100
44	MP4A	Z	-7.796	-7.796	0	%100
45	MP1B	X	4.501	4.501	0	%100
46	MP1B	Z	-7.796	-7.796	0	%100
47	MP2B	X	4.501	4.501	0	%100
48	MP2B	Z	-7.796	-7.796	0	%100
49	MP3B	X	4.501	4.501	0	%100
50	MP3B	Z	-7.796	-7.796	0	%100
51	MP4B	X	4.501	4.501	0	%100
52	MP4B	Z	-7.796	-7.796	0	%100
53	MP1C	X	4.501	4.501	0	%100
54	MP1C	Z	-7.796	-7.796	0	%100
55	MP2C	X	4.501	4.501	0	%100
56	MP2C	Z	-7.796	-7.796	0	%100
57	MP3C	X	4.501	4.501	0	%100
58	MP3C	Z	-7.796	-7.796	0	%100
59	MP4C	X	4.501	4.501	0	%100
60	MP4C	Z	-7.796	-7.796	0	%100
61	MP5C	X	4.501	4.501	0	%100
62	MP5C	Z	-7.796	-7.796	0	%100
63	M67	X	.513	.513	0	%100
64	M67	Z	-.889	-.889	0	%100
65	M68	X	.513	.513	0	%100
66	M68	Z	-.889	-.889	0	%100
67	M69	X	2.987	2.987	0	%100
68	M69	Z	-5.173	-5.173	0	%100
69	M70	X	6.33	6.33	0	%100
70	M70	Z	-10.964	-10.964	0	%100
71	M71	X	6.33	6.33	0	%100
72	M71	Z	-10.964	-10.964	0	%100
73	M72	X	9.405	9.405	0	%100
74	M72	Z	-16.29	-16.29	0	%100

**Member Distributed Loads (BLC 43 : Structure Wo (60 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	10.258	10.258	0	%100
2	M40	Z	-5.922	-5.922	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	10.258	10.258	0	%100
6	M14	Z	-5.922	-5.922	0	%100
7	M21	X	13.677	13.677	0	%100
8	M21	Z	-7.897	-7.897	0	%100
9	M19	X	3.419	3.419	0	%100
10	M19	Z	-1.974	-1.974	0	%100





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**Member Distributed Loads (BLC 43 : Structure Wo (60 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
11	M20A	X	3.419	3.419	0	%100
12	M20A	Z	-1.974	-1.974	0	%100
13	M21A	X	5.562	5.562	0	%100
14	M21A	Z	-3.211	-3.211	0	%100
15	M15A	X	5.562	5.562	0	%100
16	M15A	Z	-3.211	-3.211	0	%100
17	M17A	X	5.562	5.562	0	%100
18	M17A	Z	-3.211	-3.211	0	%100
19	M19A	X	5.562	5.562	0	%100
20	M19A	Z	-3.211	-3.211	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	5.562	5.562	0	%100
30	M29	Z	-3.211	-3.211	0	%100
31	M31	X	5.562	5.562	0	%100
32	M31	Z	-3.211	-3.211	0	%100
33	M33	X	5.562	5.562	0	%100
34	M33	Z	-3.211	-3.211	0	%100
35	M35	X	5.562	5.562	0	%100
36	M35	Z	-3.211	-3.211	0	%100
37	MP1A	X	7.796	7.796	0	%100
38	MP1A	Z	-4.501	-4.501	0	%100
39	MP2A	X	7.796	7.796	0	%100
40	MP2A	Z	-4.501	-4.501	0	%100
41	MP3A	X	7.796	7.796	0	%100
42	MP3A	Z	-4.501	-4.501	0	%100
43	MP4A	X	7.796	7.796	0	%100
44	MP4A	Z	-4.501	-4.501	0	%100
45	MP1B	X	7.796	7.796	0	%100
46	MP1B	Z	-4.501	-4.501	0	%100
47	MP2B	X	7.796	7.796	0	%100
48	MP2B	Z	-4.501	-4.501	0	%100
49	MP3B	X	7.796	7.796	0	%100
50	MP3B	Z	-4.501	-4.501	0	%100
51	MP4B	X	7.796	7.796	0	%100
52	MP4B	Z	-4.501	-4.501	0	%100
53	MP1C	X	7.796	7.796	0	%100
54	MP1C	Z	-4.501	-4.501	0	%100
55	MP2C	X	7.796	7.796	0	%100
56	MP2C	Z	-4.501	-4.501	0	%100
57	MP3C	X	7.796	7.796	0	%100
58	MP3C	Z	-4.501	-4.501	0	%100
59	MP4C	X	7.796	7.796	0	%100
60	MP4C	Z	-4.501	-4.501	0	%100
61	MP5C	X	7.796	7.796	0	%100
62	MP5C	Z	-4.501	-4.501	0	%100
63	M67	X	1.185	1.185	0	%100
64	M67	Z	-0.684	-0.684	0	%100
65	M68	X	1.185	1.185	0	%100
66	M68	Z	-0.684	-0.684	0	%100
67	M69	X	5.173	5.173	0	%100



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**Member Distributed Loads (BLC 43 : Structure Wo (60 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
68	M69	Z	-2.987	-2.987	0	%100
69	M70	X	14.515	14.515	0	%100
70	M70	Z	-8.38	-8.38	0	%100
71	M71	X	9.189	9.189	0	%100
72	M71	Z	-5.306	-5.306	0	%100
73	M72	X	14.515	14.515	0	%100
74	M72	Z	-8.38	-8.38	0	%100

**Member Distributed Loads (BLC 44 : Structure Wo (90 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	15.793	15.793	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	3.948	3.948	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	3.948	3.948	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	11.845	11.845	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	11.845	11.845	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	0	0	0	%100
13	M21A	X	8.563	8.563	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	8.563	8.563	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	8.563	8.563	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	8.563	8.563	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	2.141	2.141	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	2.141	2.141	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	2.141	2.141	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	2.141	2.141	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	2.141	2.141	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	2.141	2.141	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	2.141	2.141	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	2.141	2.141	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	9.002	9.002	0	%100
38	MP1A	Z	0	0	0	%100
39	MP2A	X	9.002	9.002	0	%100
40	MP2A	Z	0	0	0	%100
41	MP3A	X	9.002	9.002	0	%100
42	MP3A	Z	0	0	0	%100
43	MP4A	X	9.002	9.002	0	%100
44	MP4A	Z	0	0	0	%100
45	MP1B	X	9.002	9.002	0	%100
46	MP1B	Z	0	0	0	%100



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**Member Distributed Loads (BLC 44 : Structure Wo (90 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
47	MP2B	X	9.002	9.002	0	%100
48	MP2B	Z	0	0	0	%100
49	MP3B	X	9.002	9.002	0	%100
50	MP3B	Z	0	0	0	%100
51	MP4B	X	9.002	9.002	0	%100
52	MP4B	Z	0	0	0	%100
53	MP1C	X	9.002	9.002	0	%100
54	MP1C	Z	0	0	0	%100
55	MP2C	X	9.002	9.002	0	%100
56	MP2C	Z	0	0	0	%100
57	MP3C	X	9.002	9.002	0	%100
58	MP3C	Z	0	0	0	%100
59	MP4C	X	9.002	9.002	0	%100
60	MP4C	Z	0	0	0	%100
61	MP5C	X	9.002	9.002	0	%100
62	MP5C	Z	0	0	0	%100
63	M67	X	1.027	1.027	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	1.027	1.027	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	5.973	5.973	0	%100
68	M69	Z	0	0	0	%100
69	M70	X	18.81	18.81	0	%100
70	M70	Z	0	0	0	%100
71	M71	X	12.661	12.661	0	%100
72	M71	Z	0	0	0	%100
73	M72	X	12.661	12.661	0	%100
74	M72	Z	0	0	0	%100

**Member Distributed Loads (BLC 45 : Structure Wo (120 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	10.258	10.258	0	%100
2	M40	Z	5.922	5.922	0	%100
3	M13	X	10.258	10.258	0	%100
4	M13	Z	5.922	5.922	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	3.419	3.419	0	%100
8	M21	Z	1.974	1.974	0	%100
9	M19	X	13.677	13.677	0	%100
10	M19	Z	7.897	7.897	0	%100
11	M20A	X	3.419	3.419	0	%100
12	M20A	Z	1.974	1.974	0	%100
13	M21A	X	5.562	5.562	0	%100
14	M21A	Z	3.211	3.211	0	%100
15	M15A	X	5.562	5.562	0	%100
16	M15A	Z	3.211	3.211	0	%100
17	M17A	X	5.562	5.562	0	%100
18	M17A	Z	3.211	3.211	0	%100
19	M19A	X	5.562	5.562	0	%100
20	M19A	Z	3.211	3.211	0	%100
21	M21B	X	5.562	5.562	0	%100
22	M21B	Z	3.211	3.211	0	%100
23	M23	X	5.562	5.562	0	%100
24	M23	Z	3.211	3.211	0	%100
25	M25	X	5.562	5.562	0	%100



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**Member Distributed Loads (BLC 45 : Structure Wo (120 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
26	M25	Z	3.211	3.211	0	%100
27	M27	X	5.562	5.562	0	%100
28	M27	Z	3.211	3.211	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	7.796	7.796	0	%100
38	MP1A	Z	4.501	4.501	0	%100
39	MP2A	X	7.796	7.796	0	%100
40	MP2A	Z	4.501	4.501	0	%100
41	MP3A	X	7.796	7.796	0	%100
42	MP3A	Z	4.501	4.501	0	%100
43	MP4A	X	7.796	7.796	0	%100
44	MP4A	Z	4.501	4.501	0	%100
45	MP1B	X	7.796	7.796	0	%100
46	MP1B	Z	4.501	4.501	0	%100
47	MP2B	X	7.796	7.796	0	%100
48	MP2B	Z	4.501	4.501	0	%100
49	MP3B	X	7.796	7.796	0	%100
50	MP3B	Z	4.501	4.501	0	%100
51	MP4B	X	7.796	7.796	0	%100
52	MP4B	Z	4.501	4.501	0	%100
53	MP1C	X	7.796	7.796	0	%100
54	MP1C	Z	4.501	4.501	0	%100
55	MP2C	X	7.796	7.796	0	%100
56	MP2C	Z	4.501	4.501	0	%100
57	MP3C	X	7.796	7.796	0	%100
58	MP3C	Z	4.501	4.501	0	%100
59	MP4C	X	7.796	7.796	0	%100
60	MP4C	Z	4.501	4.501	0	%100
61	MP5C	X	7.796	7.796	0	%100
62	MP5C	Z	4.501	4.501	0	%100
63	M67	X	.296	.296	0	%100
64	M67	Z	.171	.171	0	%100
65	M68	X	.296	.296	0	%100
66	M68	Z	.171	.171	0	%100
67	M69	X	5.173	5.173	0	%100
68	M69	Z	2.987	2.987	0	%100
69	M70	X	14.515	14.515	0	%100
70	M70	Z	8.38	8.38	0	%100
71	M71	X	14.515	14.515	0	%100
72	M71	Z	8.38	8.38	0	%100
73	M72	X	9.189	9.189	0	%100
74	M72	Z	5.306	5.306	0	%100

**Member Distributed Loads (BLC 46 : Structure Wo (150 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	1.974	1.974	0	%100
2	M40	Z	3.419	3.419	0	%100
3	M13	X	7.897	7.897	0	%100
4	M13	Z	13.677	13.677	0	%100



**Member Distributed Loads (BLC 46 : Structure Wo (150 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
5	M14	X	1.974	1.974	0	%100
6	M14	Z	3.419	3.419	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	5.922	5.922	0	%100
10	M19	Z	10.258	10.258	0	%100
11	M20A	X	5.922	5.922	0	%100
12	M20A	Z	10.258	10.258	0	%100
13	M21A	X	1.07	1.07	0	%100
14	M21A	Z	1.854	1.854	0	%100
15	M15A	X	1.07	1.07	0	%100
16	M15A	Z	1.854	1.854	0	%100
17	M17A	X	1.07	1.07	0	%100
18	M17A	Z	1.854	1.854	0	%100
19	M19A	X	1.07	1.07	0	%100
20	M19A	Z	1.854	1.854	0	%100
21	M21B	X	4.282	4.282	0	%100
22	M21B	Z	7.416	7.416	0	%100
23	M23	X	4.282	4.282	0	%100
24	M23	Z	7.416	7.416	0	%100
25	M25	X	4.282	4.282	0	%100
26	M25	Z	7.416	7.416	0	%100
27	M27	X	4.282	4.282	0	%100
28	M27	Z	7.416	7.416	0	%100
29	M29	X	1.07	1.07	0	%100
30	M29	Z	1.854	1.854	0	%100
31	M31	X	1.07	1.07	0	%100
32	M31	Z	1.854	1.854	0	%100
33	M33	X	1.07	1.07	0	%100
34	M33	Z	1.854	1.854	0	%100
35	M35	X	1.07	1.07	0	%100
36	M35	Z	1.854	1.854	0	%100
37	MP1A	X	4.501	4.501	0	%100
38	MP1A	Z	7.796	7.796	0	%100
39	MP2A	X	4.501	4.501	0	%100
40	MP2A	Z	7.796	7.796	0	%100
41	MP3A	X	4.501	4.501	0	%100
42	MP3A	Z	7.796	7.796	0	%100
43	MP4A	X	4.501	4.501	0	%100
44	MP4A	Z	7.796	7.796	0	%100
45	MP1B	X	4.501	4.501	0	%100
46	MP1B	Z	7.796	7.796	0	%100
47	MP2B	X	4.501	4.501	0	%100
48	MP2B	Z	7.796	7.796	0	%100
49	MP3B	X	4.501	4.501	0	%100
50	MP3B	Z	7.796	7.796	0	%100
51	MP4B	X	4.501	4.501	0	%100
52	MP4B	Z	7.796	7.796	0	%100
53	MP1C	X	4.501	4.501	0	%100
54	MP1C	Z	7.796	7.796	0	%100
55	MP2C	X	4.501	4.501	0	%100
56	MP2C	Z	7.796	7.796	0	%100
57	MP3C	X	4.501	4.501	0	%100
58	MP3C	Z	7.796	7.796	0	%100
59	MP4C	X	4.501	4.501	0	%100
60	MP4C	Z	7.796	7.796	0	%100
61	MP5C	X	4.501	4.501	0	%100



**Member Distributed Loads (BLC 46 : Structure Wo (150 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
62	MP5C	Z	7.796	7.796	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	2.987	2.987	0	%100
68	M69	Z	5.173	5.173	0	%100
69	M70	X	6.33	6.33	0	%100
70	M70	Z	10.964	10.964	0	%100
71	M71	X	9.405	9.405	0	%100
72	M71	Z	16.29	16.29	0	%100
73	M72	X	6.33	6.33	0	%100
74	M72	Z	10.964	10.964	0	%100

**Member Distributed Loads (BLC 47 : Structure Wo (180 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	0	0	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	11.845	11.845	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	11.845	11.845	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	3.948	3.948	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	3.948	3.948	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	15.793	15.793	0	%100
13	M21A	X	0	0	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	0	0	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	0	0	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	0	0	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	6.423	6.423	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	6.423	6.423	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	6.423	6.423	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	6.423	6.423	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	6.423	6.423	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	6.423	6.423	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	6.423	6.423	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	6.423	6.423	0	%100
37	MP1A	X	0	0	0	%100
38	MP1A	Z	9.002	9.002	0	%100
39	MP2A	X	0	0	0	%100
40	MP2A	Z	9.002	9.002	0	%100



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**Member Distributed Loads (BLC 47 : Structure Wo (180 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
41	MP3A	X	0	0	0	%100
42	MP3A	Z	9.002	9.002	0	%100
43	MP4A	X	0	0	0	%100
44	MP4A	Z	9.002	9.002	0	%100
45	MP1B	X	0	0	0	%100
46	MP1B	Z	9.002	9.002	0	%100
47	MP2B	X	0	0	0	%100
48	MP2B	Z	9.002	9.002	0	%100
49	MP3B	X	0	0	0	%100
50	MP3B	Z	9.002	9.002	0	%100
51	MP4B	X	0	0	0	%100
52	MP4B	Z	9.002	9.002	0	%100
53	MP1C	X	0	0	0	%100
54	MP1C	Z	9.002	9.002	0	%100
55	MP2C	X	0	0	0	%100
56	MP2C	Z	9.002	9.002	0	%100
57	MP3C	X	0	0	0	%100
58	MP3C	Z	9.002	9.002	0	%100
59	MP4C	X	0	0	0	%100
60	MP4C	Z	9.002	9.002	0	%100
61	MP5C	X	0	0	0	%100
62	MP5C	Z	9.002	9.002	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	.342	.342	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	.342	.342	0	%100
67	M69	X	0	0	0	%100
68	M69	Z	5.973	5.973	0	%100
69	M70	X	0	0	0	%100
70	M70	Z	10.611	10.611	0	%100
71	M71	X	0	0	0	%100
72	M71	Z	16.76	16.76	0	%100
73	M72	X	0	0	0	%100
74	M72	Z	16.76	16.76	0	%100

**Member Distributed Loads (BLC 48 : Structure Wo (210 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-1.974	-1.974	0	%100
2	M40	Z	3.419	3.419	0	%100
3	M13	X	-1.974	-1.974	0	%100
4	M13	Z	3.419	3.419	0	%100
5	M14	X	-7.897	-7.897	0	%100
6	M14	Z	13.677	13.677	0	%100
7	M21	X	-5.922	-5.922	0	%100
8	M21	Z	10.258	10.258	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	-5.922	-5.922	0	%100
12	M20A	Z	10.258	10.258	0	%100
13	M21A	X	-1.07	-1.07	0	%100
14	M21A	Z	1.854	1.854	0	%100
15	M15A	X	-1.07	-1.07	0	%100
16	M15A	Z	1.854	1.854	0	%100
17	M17A	X	-1.07	-1.07	0	%100
18	M17A	Z	1.854	1.854	0	%100
19	M19A	X	-1.07	-1.07	0	%100



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**Member Distributed Loads (BLC 48 : Structure Wo (210 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft...]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
20	M19A	Z	1.854	1.854	0	%100
21	M21B	X	-1.07	-1.07	0	%100
22	M21B	Z	1.854	1.854	0	%100
23	M23	X	-1.07	-1.07	0	%100
24	M23	Z	1.854	1.854	0	%100
25	M25	X	-1.07	-1.07	0	%100
26	M25	Z	1.854	1.854	0	%100
27	M27	X	-1.07	-1.07	0	%100
28	M27	Z	1.854	1.854	0	%100
29	M29	X	-4.282	-4.282	0	%100
30	M29	Z	7.416	7.416	0	%100
31	M31	X	-4.282	-4.282	0	%100
32	M31	Z	7.416	7.416	0	%100
33	M33	X	-4.282	-4.282	0	%100
34	M33	Z	7.416	7.416	0	%100
35	M35	X	-4.282	-4.282	0	%100
36	M35	Z	7.416	7.416	0	%100
37	MP1A	X	-4.501	-4.501	0	%100
38	MP1A	Z	7.796	7.796	0	%100
39	MP2A	X	-4.501	-4.501	0	%100
40	MP2A	Z	7.796	7.796	0	%100
41	MP3A	X	-4.501	-4.501	0	%100
42	MP3A	Z	7.796	7.796	0	%100
43	MP4A	X	-4.501	-4.501	0	%100
44	MP4A	Z	7.796	7.796	0	%100
45	MP1B	X	-4.501	-4.501	0	%100
46	MP1B	Z	7.796	7.796	0	%100
47	MP2B	X	-4.501	-4.501	0	%100
48	MP2B	Z	7.796	7.796	0	%100
49	MP3B	X	-4.501	-4.501	0	%100
50	MP3B	Z	7.796	7.796	0	%100
51	MP4B	X	-4.501	-4.501	0	%100
52	MP4B	Z	7.796	7.796	0	%100
53	MP1C	X	-4.501	-4.501	0	%100
54	MP1C	Z	7.796	7.796	0	%100
55	MP2C	X	-4.501	-4.501	0	%100
56	MP2C	Z	7.796	7.796	0	%100
57	MP3C	X	-4.501	-4.501	0	%100
58	MP3C	Z	7.796	7.796	0	%100
59	MP4C	X	-4.501	-4.501	0	%100
60	MP4C	Z	7.796	7.796	0	%100
61	MP5C	X	-4.501	-4.501	0	%100
62	MP5C	Z	7.796	7.796	0	%100
63	M67	X	-.513	-.513	0	%100
64	M67	Z	.889	.889	0	%100
65	M68	X	-.513	-.513	0	%100
66	M68	Z	.889	.889	0	%100
67	M69	X	-2.987	-2.987	0	%100
68	M69	Z	5.173	5.173	0	%100
69	M70	X	-6.33	-6.33	0	%100
70	M70	Z	10.964	10.964	0	%100
71	M71	X	-6.33	-6.33	0	%100
72	M71	Z	10.964	10.964	0	%100
73	M72	X	-9.405	-9.405	0	%100
74	M72	Z	16.29	16.29	0	%100





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**Member Distributed Loads (BLC 49 : Structure Wo (240 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-10.258	-10.258	0	%100
2	M40	Z	5.922	5.922	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	-10.258	-10.258	0	%100
6	M14	Z	5.922	5.922	0	%100
7	M21	X	-13.677	-13.677	0	%100
8	M21	Z	7.897	7.897	0	%100
9	M19	X	-3.419	-3.419	0	%100
10	M19	Z	1.974	1.974	0	%100
11	M20A	X	-3.419	-3.419	0	%100
12	M20A	Z	1.974	1.974	0	%100
13	M21A	X	-5.562	-5.562	0	%100
14	M21A	Z	3.211	3.211	0	%100
15	M15A	X	-5.562	-5.562	0	%100
16	M15A	Z	3.211	3.211	0	%100
17	M17A	X	-5.562	-5.562	0	%100
18	M17A	Z	3.211	3.211	0	%100
19	M19A	X	-5.562	-5.562	0	%100
20	M19A	Z	3.211	3.211	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	-5.562	-5.562	0	%100
30	M29	Z	3.211	3.211	0	%100
31	M31	X	-5.562	-5.562	0	%100
32	M31	Z	3.211	3.211	0	%100
33	M33	X	-5.562	-5.562	0	%100
34	M33	Z	3.211	3.211	0	%100
35	M35	X	-5.562	-5.562	0	%100
36	M35	Z	3.211	3.211	0	%100
37	MP1A	X	-7.796	-7.796	0	%100
38	MP1A	Z	4.501	4.501	0	%100
39	MP2A	X	-7.796	-7.796	0	%100
40	MP2A	Z	4.501	4.501	0	%100
41	MP3A	X	-7.796	-7.796	0	%100
42	MP3A	Z	4.501	4.501	0	%100
43	MP4A	X	-7.796	-7.796	0	%100
44	MP4A	Z	4.501	4.501	0	%100
45	MP1B	X	-7.796	-7.796	0	%100
46	MP1B	Z	4.501	4.501	0	%100
47	MP2B	X	-7.796	-7.796	0	%100
48	MP2B	Z	4.501	4.501	0	%100
49	MP3B	X	-7.796	-7.796	0	%100
50	MP3B	Z	4.501	4.501	0	%100
51	MP4B	X	-7.796	-7.796	0	%100
52	MP4B	Z	4.501	4.501	0	%100
53	MP1C	X	-7.796	-7.796	0	%100
54	MP1C	Z	4.501	4.501	0	%100
55	MP2C	X	-7.796	-7.796	0	%100
56	MP2C	Z	4.501	4.501	0	%100
57	MP3C	X	-7.796	-7.796	0	%100



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**Member Distributed Loads (BLC 49 : Structure Wo (240 Deg)) (Continued)**

Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
58	MP3C	Z	4.501	4.501	0 %100
59	MP4C	X	-7.796	-7.796	0 %100
60	MP4C	Z	4.501	4.501	0 %100
61	MP5C	X	-7.796	-7.796	0 %100
62	MP5C	Z	4.501	4.501	0 %100
63	M67	X	-1.185	-1.185	0 %100
64	M67	Z	.684	.684	0 %100
65	M68	X	-1.185	-1.185	0 %100
66	M68	Z	.684	.684	0 %100
67	M69	X	-5.173	-5.173	0 %100
68	M69	Z	2.987	2.987	0 %100
69	M70	X	-14.515	-14.515	0 %100
70	M70	Z	8.38	8.38	0 %100
71	M71	X	-9.189	-9.189	0 %100
72	M71	Z	5.306	5.306	0 %100
73	M72	X	-14.515	-14.515	0 %100
74	M72	Z	8.38	8.38	0 %100

**Member Distributed Loads (BLC 50 : Structure Wo (270 Deg))**

Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-15.793	-15.793	0 %100
2	M40	Z	0	0	0 %100
3	M13	X	-3.948	-3.948	0 %100
4	M13	Z	0	0	0 %100
5	M14	X	-3.948	-3.948	0 %100
6	M14	Z	0	0	0 %100
7	M21	X	-11.845	-11.845	0 %100
8	M21	Z	0	0	0 %100
9	M19	X	-11.845	-11.845	0 %100
10	M19	Z	0	0	0 %100
11	M20A	X	0	0	0 %100
12	M20A	Z	0	0	0 %100
13	M21A	X	-8.563	-8.563	0 %100
14	M21A	Z	0	0	0 %100
15	M15A	X	-8.563	-8.563	0 %100
16	M15A	Z	0	0	0 %100
17	M17A	X	-8.563	-8.563	0 %100
18	M17A	Z	0	0	0 %100
19	M19A	X	-8.563	-8.563	0 %100
20	M19A	Z	0	0	0 %100
21	M21B	X	-2.141	-2.141	0 %100
22	M21B	Z	0	0	0 %100
23	M23	X	-2.141	-2.141	0 %100
24	M23	Z	0	0	0 %100
25	M25	X	-2.141	-2.141	0 %100
26	M25	Z	0	0	0 %100
27	M27	X	-2.141	-2.141	0 %100
28	M27	Z	0	0	0 %100
29	M29	X	-2.141	-2.141	0 %100
30	M29	Z	0	0	0 %100
31	M31	X	-2.141	-2.141	0 %100
32	M31	Z	0	0	0 %100
33	M33	X	-2.141	-2.141	0 %100
34	M33	Z	0	0	0 %100
35	M35	X	-2.141	-2.141	0 %100
36	M35	Z	0	0	0 %100



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**Member Distributed Loads (BLC 50 : Structure Wo (270 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
37	MP1A	X	-9.002	-9.002	0	%100
38	MP1A	Z	0	0	0	%100
39	MP2A	X	-9.002	-9.002	0	%100
40	MP2A	Z	0	0	0	%100
41	MP3A	X	-9.002	-9.002	0	%100
42	MP3A	Z	0	0	0	%100
43	MP4A	X	-9.002	-9.002	0	%100
44	MP4A	Z	0	0	0	%100
45	MP1B	X	-9.002	-9.002	0	%100
46	MP1B	Z	0	0	0	%100
47	MP2B	X	-9.002	-9.002	0	%100
48	MP2B	Z	0	0	0	%100
49	MP3B	X	-9.002	-9.002	0	%100
50	MP3B	Z	0	0	0	%100
51	MP4B	X	-9.002	-9.002	0	%100
52	MP4B	Z	0	0	0	%100
53	MP1C	X	-9.002	-9.002	0	%100
54	MP1C	Z	0	0	0	%100
55	MP2C	X	-9.002	-9.002	0	%100
56	MP2C	Z	0	0	0	%100
57	MP3C	X	-9.002	-9.002	0	%100
58	MP3C	Z	0	0	0	%100
59	MP4C	X	-9.002	-9.002	0	%100
60	MP4C	Z	0	0	0	%100
61	MP5C	X	-9.002	-9.002	0	%100
62	MP5C	Z	0	0	0	%100
63	M67	X	-1.027	-1.027	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	-1.027	-1.027	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	-5.973	-5.973	0	%100
68	M69	Z	0	0	0	%100
69	M70	X	-18.81	-18.81	0	%100
70	M70	Z	0	0	0	%100
71	M71	X	-12.661	-12.661	0	%100
72	M71	Z	0	0	0	%100
73	M72	X	-12.661	-12.661	0	%100
74	M72	Z	0	0	0	%100

**Member Distributed Loads (BLC 51 : Structure Wo (300 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-10.258	-10.258	0	%100
2	M40	Z	-5.922	-5.922	0	%100
3	M13	X	-10.258	-10.258	0	%100
4	M13	Z	-5.922	-5.922	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	-3.419	-3.419	0	%100
8	M21	Z	-1.974	-1.974	0	%100
9	M19	X	-13.677	-13.677	0	%100
10	M19	Z	-7.897	-7.897	0	%100
11	M20A	X	-3.419	-3.419	0	%100
12	M20A	Z	-1.974	-1.974	0	%100
13	M21A	X	-5.562	-5.562	0	%100
14	M21A	Z	-3.211	-3.211	0	%100
15	M15A	X	-5.562	-5.562	0	%100



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**Member Distributed Loads (BLC 51 : Structure Wo (300 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
16	M15A	Z	-3.211	-3.211	0	%100
17	M17A	X	-5.562	-5.562	0	%100
18	M17A	Z	-3.211	-3.211	0	%100
19	M19A	X	-5.562	-5.562	0	%100
20	M19A	Z	-3.211	-3.211	0	%100
21	M21B	X	-5.562	-5.562	0	%100
22	M21B	Z	-3.211	-3.211	0	%100
23	M23	X	-5.562	-5.562	0	%100
24	M23	Z	-3.211	-3.211	0	%100
25	M25	X	-5.562	-5.562	0	%100
26	M25	Z	-3.211	-3.211	0	%100
27	M27	X	-5.562	-5.562	0	%100
28	M27	Z	-3.211	-3.211	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	-7.796	-7.796	0	%100
38	MP1A	Z	-4.501	-4.501	0	%100
39	MP2A	X	-7.796	-7.796	0	%100
40	MP2A	Z	-4.501	-4.501	0	%100
41	MP3A	X	-7.796	-7.796	0	%100
42	MP3A	Z	-4.501	-4.501	0	%100
43	MP4A	X	-7.796	-7.796	0	%100
44	MP4A	Z	-4.501	-4.501	0	%100
45	MP1B	X	-7.796	-7.796	0	%100
46	MP1B	Z	-4.501	-4.501	0	%100
47	MP2B	X	-7.796	-7.796	0	%100
48	MP2B	Z	-4.501	-4.501	0	%100
49	MP3B	X	-7.796	-7.796	0	%100
50	MP3B	Z	-4.501	-4.501	0	%100
51	MP4B	X	-7.796	-7.796	0	%100
52	MP4B	Z	-4.501	-4.501	0	%100
53	MP1C	X	-7.796	-7.796	0	%100
54	MP1C	Z	-4.501	-4.501	0	%100
55	MP2C	X	-7.796	-7.796	0	%100
56	MP2C	Z	-4.501	-4.501	0	%100
57	MP3C	X	-7.796	-7.796	0	%100
58	MP3C	Z	-4.501	-4.501	0	%100
59	MP4C	X	-7.796	-7.796	0	%100
60	MP4C	Z	-4.501	-4.501	0	%100
61	MP5C	X	-7.796	-7.796	0	%100
62	MP5C	Z	-4.501	-4.501	0	%100
63	M67	X	-2.96	-2.96	0	%100
64	M67	Z	-1.71	-1.71	0	%100
65	M68	X	-2.96	-2.96	0	%100
66	M68	Z	-1.71	-1.71	0	%100
67	M69	X	-5.173	-5.173	0	%100
68	M69	Z	-2.987	-2.987	0	%100
69	M70	X	-14.515	-14.515	0	%100
70	M70	Z	-8.38	-8.38	0	%100
71	M71	X	-14.515	-14.515	0	%100
72	M71	Z	-8.38	-8.38	0	%100



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**Member Distributed Loads (BLC 51 : Structure Wo (300 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
73	M72	X	-9.189	-9.189	0	%100
74	M72	Z	-5.306	-5.306	0	%100

**Member Distributed Loads (BLC 52 : Structure Wo (330 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-1.974	-1.974	0	%100
2	M40	Z	-3.419	-3.419	0	%100
3	M13	X	-7.897	-7.897	0	%100
4	M13	Z	-13.677	-13.677	0	%100
5	M14	X	-1.974	-1.974	0	%100
6	M14	Z	-3.419	-3.419	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	-5.922	-5.922	0	%100
10	M19	Z	-10.258	-10.258	0	%100
11	M20A	X	-5.922	-5.922	0	%100
12	M20A	Z	-10.258	-10.258	0	%100
13	M21A	X	-1.07	-1.07	0	%100
14	M21A	Z	-1.854	-1.854	0	%100
15	M15A	X	-1.07	-1.07	0	%100
16	M15A	Z	-1.854	-1.854	0	%100
17	M17A	X	-1.07	-1.07	0	%100
18	M17A	Z	-1.854	-1.854	0	%100
19	M19A	X	-1.07	-1.07	0	%100
20	M19A	Z	-1.854	-1.854	0	%100
21	M21B	X	-4.282	-4.282	0	%100
22	M21B	Z	-7.416	-7.416	0	%100
23	M23	X	-4.282	-4.282	0	%100
24	M23	Z	-7.416	-7.416	0	%100
25	M25	X	-4.282	-4.282	0	%100
26	M25	Z	-7.416	-7.416	0	%100
27	M27	X	-4.282	-4.282	0	%100
28	M27	Z	-7.416	-7.416	0	%100
29	M29	X	-1.07	-1.07	0	%100
30	M29	Z	-1.854	-1.854	0	%100
31	M31	X	-1.07	-1.07	0	%100
32	M31	Z	-1.854	-1.854	0	%100
33	M33	X	-1.07	-1.07	0	%100
34	M33	Z	-1.854	-1.854	0	%100
35	M35	X	-1.07	-1.07	0	%100
36	M35	Z	-1.854	-1.854	0	%100
37	MP1A	X	-4.501	-4.501	0	%100
38	MP1A	Z	-7.796	-7.796	0	%100
39	MP2A	X	-4.501	-4.501	0	%100
40	MP2A	Z	-7.796	-7.796	0	%100
41	MP3A	X	-4.501	-4.501	0	%100
42	MP3A	Z	-7.796	-7.796	0	%100
43	MP4A	X	-4.501	-4.501	0	%100
44	MP4A	Z	-7.796	-7.796	0	%100
45	MP1B	X	-4.501	-4.501	0	%100
46	MP1B	Z	-7.796	-7.796	0	%100
47	MP2B	X	-4.501	-4.501	0	%100
48	MP2B	Z	-7.796	-7.796	0	%100
49	MP3B	X	-4.501	-4.501	0	%100
50	MP3B	Z	-7.796	-7.796	0	%100
51	MP4B	X	-4.501	-4.501	0	%100



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**Member Distributed Loads (BLC 52 : Structure Wo (330 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
52	MP4B	Z	-7.796	-7.796	0	%100
53	MP1C	X	-4.501	-4.501	0	%100
54	MP1C	Z	-7.796	-7.796	0	%100
55	MP2C	X	-4.501	-4.501	0	%100
56	MP2C	Z	-7.796	-7.796	0	%100
57	MP3C	X	-4.501	-4.501	0	%100
58	MP3C	Z	-7.796	-7.796	0	%100
59	MP4C	X	-4.501	-4.501	0	%100
60	MP4C	Z	-7.796	-7.796	0	%100
61	MP5C	X	-4.501	-4.501	0	%100
62	MP5C	Z	-7.796	-7.796	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	-2.987	-2.987	0	%100
68	M69	Z	-5.173	-5.173	0	%100
69	M70	X	-6.33	-6.33	0	%100
70	M70	Z	-10.964	-10.964	0	%100
71	M71	X	-9.405	-9.405	0	%100
72	M71	Z	-16.29	-16.29	0	%100
73	M72	X	-6.33	-6.33	0	%100
74	M72	Z	-10.964	-10.964	0	%100

**Member Distributed Loads (BLC 53 : Structure Wi (0 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	0	0	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	-3.676	-3.676	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	-3.676	-3.676	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	-1.225	-1.225	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	-1.225	-1.225	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	-4.901	-4.901	0	%100
13	M21A	X	0	0	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	0	0	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	0	0	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	0	0	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	-2.095	-2.095	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	-2.095	-2.095	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	-2.095	-2.095	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	-2.095	-2.095	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	-2.095	-2.095	0	%100



**Member Distributed Loads (BLC 53 : Structure Wi (0 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
31	M31	X	0	0	0	%100
32	M31	Z	-2.095	-2.095	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	-2.095	-2.095	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	-2.095	-2.095	0	%100
37	MP1A	X	0	0	0	%100
38	MP1A	Z	-3.722	-3.722	0	%100
39	MP2A	X	0	0	0	%100
40	MP2A	Z	-3.722	-3.722	0	%100
41	MP3A	X	0	0	0	%100
42	MP3A	Z	-3.722	-3.722	0	%100
43	MP4A	X	0	0	0	%100
44	MP4A	Z	-3.722	-3.722	0	%100
45	MP1B	X	0	0	0	%100
46	MP1B	Z	-3.722	-3.722	0	%100
47	MP2B	X	0	0	0	%100
48	MP2B	Z	-3.722	-3.722	0	%100
49	MP3B	X	0	0	0	%100
50	MP3B	Z	-3.722	-3.722	0	%100
51	MP4B	X	0	0	0	%100
52	MP4B	Z	-3.722	-3.722	0	%100
53	MP1C	X	0	0	0	%100
54	MP1C	Z	-3.722	-3.722	0	%100
55	MP2C	X	0	0	0	%100
56	MP2C	Z	-3.722	-3.722	0	%100
57	MP3C	X	0	0	0	%100
58	MP3C	Z	-3.722	-3.722	0	%100
59	MP4C	X	0	0	0	%100
60	MP4C	Z	-3.722	-3.722	0	%100
61	MP5C	X	0	0	0	%100
62	MP5C	Z	-3.722	-3.722	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	-.374	-.374	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	-.374	-.374	0	%100
67	M69	X	0	0	0	%100
68	M69	Z	-2.562	-2.562	0	%100
69	M70	X	0	0	0	%100
70	M70	Z	-2.511	-2.511	0	%100
71	M71	X	0	0	0	%100
72	M71	Z	-4.62	-4.62	0	%100
73	M72	X	0	0	0	%100
74	M72	Z	-4.62	-4.62	0	%100

**Member Distributed Loads (BLC 54 : Structure Wi (30 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.613	.613	0	%100
2	M40	Z	-1.061	-1.061	0	%100
3	M13	X	.613	.613	0	%100
4	M13	Z	-1.061	-1.061	0	%100
5	M14	X	2.451	2.451	0	%100
6	M14	Z	-4.245	-4.245	0	%100
7	M21	X	1.838	1.838	0	%100
8	M21	Z	-3.184	-3.184	0	%100
9	M19	X	0	0	0	%100



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**Member Distributed Loads (BLC 54 : Structure Wi (30 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
10	M19	Z	0	0	0	%100
11	M20A	X	1.838	1.838	0	%100
12	M20A	Z	-3.184	-3.184	0	%100
13	M21A	X	.349	.349	0	%100
14	M21A	Z	-605	-605	0	%100
15	M15A	X	.349	.349	0	%100
16	M15A	Z	-605	-605	0	%100
17	M17A	X	.349	.349	0	%100
18	M17A	Z	-605	-605	0	%100
19	M19A	X	.349	.349	0	%100
20	M19A	Z	-605	-605	0	%100
21	M21B	X	.349	.349	0	%100
22	M21B	Z	-605	-605	0	%100
23	M23	X	.349	.349	0	%100
24	M23	Z	-605	-605	0	%100
25	M25	X	.349	.349	0	%100
26	M25	Z	-605	-605	0	%100
27	M27	X	.349	.349	0	%100
28	M27	Z	-605	-605	0	%100
29	M29	X	1.396	1.396	0	%100
30	M29	Z	-2.419	-2.419	0	%100
31	M31	X	1.396	1.396	0	%100
32	M31	Z	-2.419	-2.419	0	%100
33	M33	X	1.396	1.396	0	%100
34	M33	Z	-2.419	-2.419	0	%100
35	M35	X	1.396	1.396	0	%100
36	M35	Z	-2.419	-2.419	0	%100
37	MP1A	X	1.861	1.861	0	%100
38	MP1A	Z	-3.224	-3.224	0	%100
39	MP2A	X	1.861	1.861	0	%100
40	MP2A	Z	-3.224	-3.224	0	%100
41	MP3A	X	1.861	1.861	0	%100
42	MP3A	Z	-3.224	-3.224	0	%100
43	MP4A	X	1.861	1.861	0	%100
44	MP4A	Z	-3.224	-3.224	0	%100
45	MP1B	X	1.861	1.861	0	%100
46	MP1B	Z	-3.224	-3.224	0	%100
47	MP2B	X	1.861	1.861	0	%100
48	MP2B	Z	-3.224	-3.224	0	%100
49	MP3B	X	1.861	1.861	0	%100
50	MP3B	Z	-3.224	-3.224	0	%100
51	MP4B	X	1.861	1.861	0	%100
52	MP4B	Z	-3.224	-3.224	0	%100
53	MP1C	X	1.861	1.861	0	%100
54	MP1C	Z	-3.224	-3.224	0	%100
55	MP2C	X	1.861	1.861	0	%100
56	MP2C	Z	-3.224	-3.224	0	%100
57	MP3C	X	1.861	1.861	0	%100
58	MP3C	Z	-3.224	-3.224	0	%100
59	MP4C	X	1.861	1.861	0	%100
60	MP4C	Z	-3.224	-3.224	0	%100
61	MP5C	X	1.861	1.861	0	%100
62	MP5C	Z	-3.224	-3.224	0	%100
63	M67	X	.562	.562	0	%100
64	M67	Z	-.973	-.973	0	%100
65	M68	X	.562	.562	0	%100
66	M68	Z	-.973	-.973	0	%100





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**Member Distributed Loads (BLC 54 : Structure Wi (30 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
67	M69	X	1.281	1.281	0	%100
68	M69	Z	-2.219	-2.219	0	%100
69	M70	X	1.607	1.607	0	%100
70	M70	Z	-2.784	-2.784	0	%100
71	M71	X	1.607	1.607	0	%100
72	M71	Z	-2.784	-2.784	0	%100
73	M72	X	2.661	2.661	0	%100
74	M72	Z	-4.61	-4.61	0	%100

**Member Distributed Loads (BLC 55 : Structure Wi (60 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	3.184	3.184	0	%100
2	M40	Z	-1.838	-1.838	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	3.184	3.184	0	%100
6	M14	Z	-1.838	-1.838	0	%100
7	M21	X	4.245	4.245	0	%100
8	M21	Z	-2.451	-2.451	0	%100
9	M19	X	1.061	1.061	0	%100
10	M19	Z	-0.613	-0.613	0	%100
11	M20A	X	1.061	1.061	0	%100
12	M20A	Z	-0.613	-0.613	0	%100
13	M21A	X	1.814	1.814	0	%100
14	M21A	Z	-1.047	-1.047	0	%100
15	M15A	X	1.814	1.814	0	%100
16	M15A	Z	-1.047	-1.047	0	%100
17	M17A	X	1.814	1.814	0	%100
18	M17A	Z	-1.047	-1.047	0	%100
19	M19A	X	1.814	1.814	0	%100
20	M19A	Z	-1.047	-1.047	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	1.814	1.814	0	%100
30	M29	Z	-1.047	-1.047	0	%100
31	M31	X	1.814	1.814	0	%100
32	M31	Z	-1.047	-1.047	0	%100
33	M33	X	1.814	1.814	0	%100
34	M33	Z	-1.047	-1.047	0	%100
35	M35	X	1.814	1.814	0	%100
36	M35	Z	-1.047	-1.047	0	%100
37	MP1A	X	3.224	3.224	0	%100
38	MP1A	Z	-1.861	-1.861	0	%100
39	MP2A	X	3.224	3.224	0	%100
40	MP2A	Z	-1.861	-1.861	0	%100
41	MP3A	X	3.224	3.224	0	%100
42	MP3A	Z	-1.861	-1.861	0	%100
43	MP4A	X	3.224	3.224	0	%100
44	MP4A	Z	-1.861	-1.861	0	%100
45	MP1B	X	3.224	3.224	0	%100



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**Member Distributed Loads (BLC 55 : Structure Wi (60 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
46	MP1B	Z	-1.861	-1.861	0	%100
47	MP2B	X	3.224	3.224	0	%100
48	MP2B	Z	-1.861	-1.861	0	%100
49	MP3B	X	3.224	3.224	0	%100
50	MP3B	Z	-1.861	-1.861	0	%100
51	MP4B	X	3.224	3.224	0	%100
52	MP4B	Z	-1.861	-1.861	0	%100
53	MP1C	X	3.224	3.224	0	%100
54	MP1C	Z	-1.861	-1.861	0	%100
55	MP2C	X	3.224	3.224	0	%100
56	MP2C	Z	-1.861	-1.861	0	%100
57	MP3C	X	3.224	3.224	0	%100
58	MP3C	Z	-1.861	-1.861	0	%100
59	MP4C	X	3.224	3.224	0	%100
60	MP4C	Z	-1.861	-1.861	0	%100
61	MP5C	X	3.224	3.224	0	%100
62	MP5C	Z	-1.861	-1.861	0	%100
63	M67	X	1.297	1.297	0	%100
64	M67	Z	-0.749	-0.749	0	%100
65	M68	X	1.297	1.297	0	%100
66	M68	Z	-0.749	-0.749	0	%100
67	M69	X	2.219	2.219	0	%100
68	M69	Z	-1.281	-1.281	0	%100
69	M70	X	4.001	4.001	0	%100
70	M70	Z	-2.31	-2.31	0	%100
71	M71	X	2.175	2.175	0	%100
72	M71	Z	-1.256	-1.256	0	%100
73	M72	X	4.001	4.001	0	%100
74	M72	Z	-2.31	-2.31	0	%100

**Member Distributed Loads (BLC 56 : Structure Wi (90 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	4.901	4.901	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	1.225	1.225	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	1.225	1.225	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	3.676	3.676	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	3.676	3.676	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	0	0	0	%100
13	M21A	X	2.793	2.793	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	2.793	2.793	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	2.793	2.793	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	2.793	2.793	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	.698	.698	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	.698	.698	0	%100
24	M23	Z	0	0	0	%100



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**Member Distributed Loads (BLC 56 : Structure Wi (90 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
25	M25	X	.698	.698	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	.698	.698	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	.698	.698	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	.698	.698	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	.698	.698	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	.698	.698	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	3.722	3.722	0	%100
38	MP1A	Z	0	0	0	%100
39	MP2A	X	3.722	3.722	0	%100
40	MP2A	Z	0	0	0	%100
41	MP3A	X	3.722	3.722	0	%100
42	MP3A	Z	0	0	0	%100
43	MP4A	X	3.722	3.722	0	%100
44	MP4A	Z	0	0	0	%100
45	MP1B	X	3.722	3.722	0	%100
46	MP1B	Z	0	0	0	%100
47	MP2B	X	3.722	3.722	0	%100
48	MP2B	Z	0	0	0	%100
49	MP3B	X	3.722	3.722	0	%100
50	MP3B	Z	0	0	0	%100
51	MP4B	X	3.722	3.722	0	%100
52	MP4B	Z	0	0	0	%100
53	MP1C	X	3.722	3.722	0	%100
54	MP1C	Z	0	0	0	%100
55	MP2C	X	3.722	3.722	0	%100
56	MP2C	Z	0	0	0	%100
57	MP3C	X	3.722	3.722	0	%100
58	MP3C	Z	0	0	0	%100
59	MP4C	X	3.722	3.722	0	%100
60	MP4C	Z	0	0	0	%100
61	MP5C	X	3.722	3.722	0	%100
62	MP5C	Z	0	0	0	%100
63	M67	X	1.123	1.123	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	1.123	1.123	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	2.562	2.562	0	%100
68	M69	Z	0	0	0	%100
69	M70	X	5.323	5.323	0	%100
70	M70	Z	0	0	0	%100
71	M71	X	3.214	3.214	0	%100
72	M71	Z	0	0	0	%100
73	M72	X	3.214	3.214	0	%100
74	M72	Z	0	0	0	%100

**Member Distributed Loads (BLC 57 : Structure Wi (120 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	3.184	3.184	0	%100
2	M40	Z	1.838	1.838	0	%100
3	M13	X	3.184	3.184	0	%100



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**Member Distributed Loads (BLC 57 : Structure Wi (120 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
4	M13	Z	1.838	1.838	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	1.061	1.061	0	%100
8	M21	Z	.613	.613	0	%100
9	M19	X	4.245	4.245	0	%100
10	M19	Z	2.451	2.451	0	%100
11	M20A	X	1.061	1.061	0	%100
12	M20A	Z	.613	.613	0	%100
13	M21A	X	1.814	1.814	0	%100
14	M21A	Z	1.047	1.047	0	%100
15	M15A	X	1.814	1.814	0	%100
16	M15A	Z	1.047	1.047	0	%100
17	M17A	X	1.814	1.814	0	%100
18	M17A	Z	1.047	1.047	0	%100
19	M19A	X	1.814	1.814	0	%100
20	M19A	Z	1.047	1.047	0	%100
21	M21B	X	1.814	1.814	0	%100
22	M21B	Z	1.047	1.047	0	%100
23	M23	X	1.814	1.814	0	%100
24	M23	Z	1.047	1.047	0	%100
25	M25	X	1.814	1.814	0	%100
26	M25	Z	1.047	1.047	0	%100
27	M27	X	1.814	1.814	0	%100
28	M27	Z	1.047	1.047	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	3.224	3.224	0	%100
38	MP1A	Z	1.861	1.861	0	%100
39	MP2A	X	3.224	3.224	0	%100
40	MP2A	Z	1.861	1.861	0	%100
41	MP3A	X	3.224	3.224	0	%100
42	MP3A	Z	1.861	1.861	0	%100
43	MP4A	X	3.224	3.224	0	%100
44	MP4A	Z	1.861	1.861	0	%100
45	MP1B	X	3.224	3.224	0	%100
46	MP1B	Z	1.861	1.861	0	%100
47	MP2B	X	3.224	3.224	0	%100
48	MP2B	Z	1.861	1.861	0	%100
49	MP3B	X	3.224	3.224	0	%100
50	MP3B	Z	1.861	1.861	0	%100
51	MP4B	X	3.224	3.224	0	%100
52	MP4B	Z	1.861	1.861	0	%100
53	MP1C	X	3.224	3.224	0	%100
54	MP1C	Z	1.861	1.861	0	%100
55	MP2C	X	3.224	3.224	0	%100
56	MP2C	Z	1.861	1.861	0	%100
57	MP3C	X	3.224	3.224	0	%100
58	MP3C	Z	1.861	1.861	0	%100
59	MP4C	X	3.224	3.224	0	%100
60	MP4C	Z	1.861	1.861	0	%100



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**Member Distributed Loads (BLC 57 : Structure Wi (120 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
61	MP5C	X	3.224	3.224	0	%100
62	MP5C	Z	1.861	1.861	0	%100
63	M67	X	.324	.324	0	%100
64	M67	Z	.187	.187	0	%100
65	M68	X	.324	.324	0	%100
66	M68	Z	.187	.187	0	%100
67	M69	X	2.219	2.219	0	%100
68	M69	Z	1.281	1.281	0	%100
69	M70	X	4.001	4.001	0	%100
70	M70	Z	2.31	2.31	0	%100
71	M71	X	4.001	4.001	0	%100
72	M71	Z	2.31	2.31	0	%100
73	M72	X	2.175	2.175	0	%100
74	M72	Z	1.256	1.256	0	%100

**Member Distributed Loads (BLC 58 : Structure Wi (150 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.613	.613	0	%100
2	M40	Z	1.061	1.061	0	%100
3	M13	X	2.451	2.451	0	%100
4	M13	Z	4.245	4.245	0	%100
5	M14	X	.613	.613	0	%100
6	M14	Z	1.061	1.061	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	1.838	1.838	0	%100
10	M19	Z	3.184	3.184	0	%100
11	M20A	X	1.838	1.838	0	%100
12	M20A	Z	3.184	3.184	0	%100
13	M21A	X	.349	.349	0	%100
14	M21A	Z	.605	.605	0	%100
15	M15A	X	.349	.349	0	%100
16	M15A	Z	.605	.605	0	%100
17	M17A	X	.349	.349	0	%100
18	M17A	Z	.605	.605	0	%100
19	M19A	X	.349	.349	0	%100
20	M19A	Z	.605	.605	0	%100
21	M21B	X	1.396	1.396	0	%100
22	M21B	Z	2.419	2.419	0	%100
23	M23	X	1.396	1.396	0	%100
24	M23	Z	2.419	2.419	0	%100
25	M25	X	1.396	1.396	0	%100
26	M25	Z	2.419	2.419	0	%100
27	M27	X	1.396	1.396	0	%100
28	M27	Z	2.419	2.419	0	%100
29	M29	X	.349	.349	0	%100
30	M29	Z	.605	.605	0	%100
31	M31	X	.349	.349	0	%100
32	M31	Z	.605	.605	0	%100
33	M33	X	.349	.349	0	%100
34	M33	Z	.605	.605	0	%100
35	M35	X	.349	.349	0	%100
36	M35	Z	.605	.605	0	%100
37	MP1A	X	1.861	1.861	0	%100
38	MP1A	Z	3.224	3.224	0	%100
39	MP2A	X	1.861	1.861	0	%100



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**Member Distributed Loads (BLC 58 : Structure Wi (150 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
40	MP2A	Z	3.224	3.224	0	%100
41	MP3A	X	1.861	1.861	0	%100
42	MP3A	Z	3.224	3.224	0	%100
43	MP4A	X	1.861	1.861	0	%100
44	MP4A	Z	3.224	3.224	0	%100
45	MP1B	X	1.861	1.861	0	%100
46	MP1B	Z	3.224	3.224	0	%100
47	MP2B	X	1.861	1.861	0	%100
48	MP2B	Z	3.224	3.224	0	%100
49	MP3B	X	1.861	1.861	0	%100
50	MP3B	Z	3.224	3.224	0	%100
51	MP4B	X	1.861	1.861	0	%100
52	MP4B	Z	3.224	3.224	0	%100
53	MP1C	X	1.861	1.861	0	%100
54	MP1C	Z	3.224	3.224	0	%100
55	MP2C	X	1.861	1.861	0	%100
56	MP2C	Z	3.224	3.224	0	%100
57	MP3C	X	1.861	1.861	0	%100
58	MP3C	Z	3.224	3.224	0	%100
59	MP4C	X	1.861	1.861	0	%100
60	MP4C	Z	3.224	3.224	0	%100
61	MP5C	X	1.861	1.861	0	%100
62	MP5C	Z	3.224	3.224	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	1.281	1.281	0	%100
68	M69	Z	2.219	2.219	0	%100
69	M70	X	1.607	1.607	0	%100
70	M70	Z	2.784	2.784	0	%100
71	M71	X	2.661	2.661	0	%100
72	M71	Z	4.61	4.61	0	%100
73	M72	X	1.607	1.607	0	%100
74	M72	Z	2.784	2.784	0	%100

**Member Distributed Loads (BLC 59 : Structure Wi (180 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	0	0	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	3.676	3.676	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	3.676	3.676	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	1.225	1.225	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	1.225	1.225	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	4.901	4.901	0	%100
13	M21A	X	0	0	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	0	0	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	0	0	0	%100
18	M17A	Z	0	0	0	%100



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**Member Distributed Loads (BLC 59 : Structure Wi (180 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
19	M19A	X	0	0	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	2.095	2.095	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	2.095	2.095	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	2.095	2.095	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	2.095	2.095	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	2.095	2.095	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	2.095	2.095	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	2.095	2.095	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	2.095	2.095	0	%100
37	MP1A	X	0	0	0	%100
38	MP1A	Z	3.722	3.722	0	%100
39	MP2A	X	0	0	0	%100
40	MP2A	Z	3.722	3.722	0	%100
41	MP3A	X	0	0	0	%100
42	MP3A	Z	3.722	3.722	0	%100
43	MP4A	X	0	0	0	%100
44	MP4A	Z	3.722	3.722	0	%100
45	MP1B	X	0	0	0	%100
46	MP1B	Z	3.722	3.722	0	%100
47	MP2B	X	0	0	0	%100
48	MP2B	Z	3.722	3.722	0	%100
49	MP3B	X	0	0	0	%100
50	MP3B	Z	3.722	3.722	0	%100
51	MP4B	X	0	0	0	%100
52	MP4B	Z	3.722	3.722	0	%100
53	MP1C	X	0	0	0	%100
54	MP1C	Z	3.722	3.722	0	%100
55	MP2C	X	0	0	0	%100
56	MP2C	Z	3.722	3.722	0	%100
57	MP3C	X	0	0	0	%100
58	MP3C	Z	3.722	3.722	0	%100
59	MP4C	X	0	0	0	%100
60	MP4C	Z	3.722	3.722	0	%100
61	MP5C	X	0	0	0	%100
62	MP5C	Z	3.722	3.722	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	.374	.374	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	.374	.374	0	%100
67	M69	X	0	0	0	%100
68	M69	Z	2.562	2.562	0	%100
69	M70	X	0	0	0	%100
70	M70	Z	2.511	2.511	0	%100
71	M71	X	0	0	0	%100
72	M71	Z	4.62	4.62	0	%100
73	M72	X	0	0	0	%100
74	M72	Z	4.62	4.62	0	%100



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**Member Distributed Loads (BLC 60 : Structure Wi (210 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	- .613	- .613	0	%100
2	M40	Z	1.061	1.061	0	%100
3	M13	X	- .613	- .613	0	%100
4	M13	Z	1.061	1.061	0	%100
5	M14	X	-2.451	-2.451	0	%100
6	M14	Z	4.245	4.245	0	%100
7	M21	X	-1.838	-1.838	0	%100
8	M21	Z	3.184	3.184	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	-1.838	-1.838	0	%100
12	M20A	Z	3.184	3.184	0	%100
13	M21A	X	- .349	- .349	0	%100
14	M21A	Z	.605	.605	0	%100
15	M15A	X	- .349	- .349	0	%100
16	M15A	Z	.605	.605	0	%100
17	M17A	X	- .349	- .349	0	%100
18	M17A	Z	.605	.605	0	%100
19	M19A	X	- .349	- .349	0	%100
20	M19A	Z	.605	.605	0	%100
21	M21B	X	- .349	- .349	0	%100
22	M21B	Z	.605	.605	0	%100
23	M23	X	- .349	- .349	0	%100
24	M23	Z	.605	.605	0	%100
25	M25	X	- .349	- .349	0	%100
26	M25	Z	.605	.605	0	%100
27	M27	X	- .349	- .349	0	%100
28	M27	Z	.605	.605	0	%100
29	M29	X	-1.396	-1.396	0	%100
30	M29	Z	2.419	2.419	0	%100
31	M31	X	-1.396	-1.396	0	%100
32	M31	Z	2.419	2.419	0	%100
33	M33	X	-1.396	-1.396	0	%100
34	M33	Z	2.419	2.419	0	%100
35	M35	X	-1.396	-1.396	0	%100
36	M35	Z	2.419	2.419	0	%100
37	MP1A	X	-1.861	-1.861	0	%100
38	MP1A	Z	3.224	3.224	0	%100
39	MP2A	X	-1.861	-1.861	0	%100
40	MP2A	Z	3.224	3.224	0	%100
41	MP3A	X	-1.861	-1.861	0	%100
42	MP3A	Z	3.224	3.224	0	%100
43	MP4A	X	-1.861	-1.861	0	%100
44	MP4A	Z	3.224	3.224	0	%100
45	MP1B	X	-1.861	-1.861	0	%100
46	MP1B	Z	3.224	3.224	0	%100
47	MP2B	X	-1.861	-1.861	0	%100
48	MP2B	Z	3.224	3.224	0	%100
49	MP3B	X	-1.861	-1.861	0	%100
50	MP3B	Z	3.224	3.224	0	%100
51	MP4B	X	-1.861	-1.861	0	%100
52	MP4B	Z	3.224	3.224	0	%100
53	MP1C	X	-1.861	-1.861	0	%100
54	MP1C	Z	3.224	3.224	0	%100
55	MP2C	X	-1.861	-1.861	0	%100
56	MP2C	Z	3.224	3.224	0	%100
57	MP3C	X	-1.861	-1.861	0	%100





Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

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**Member Distributed Loads (BLC 60 : Structure Wi (210 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
58	MP3C	Z	3.224	3.224	0	%100
59	MP4C	X	-1.861	-1.861	0	%100
60	MP4C	Z	3.224	3.224	0	%100
61	MP5C	X	-1.861	-1.861	0	%100
62	MP5C	Z	3.224	3.224	0	%100
63	M67	X	-.562	-.562	0	%100
64	M67	Z	.973	.973	0	%100
65	M68	X	-.562	-.562	0	%100
66	M68	Z	.973	.973	0	%100
67	M69	X	-1.281	-1.281	0	%100
68	M69	Z	2.219	2.219	0	%100
69	M70	X	-1.607	-1.607	0	%100
70	M70	Z	2.784	2.784	0	%100
71	M71	X	-1.607	-1.607	0	%100
72	M71	Z	2.784	2.784	0	%100
73	M72	X	-2.661	-2.661	0	%100
74	M72	Z	4.61	4.61	0	%100

**Member Distributed Loads (BLC 61 : Structure Wi (240 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-3.184	-3.184	0	%100
2	M40	Z	1.838	1.838	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	-3.184	-3.184	0	%100
6	M14	Z	1.838	1.838	0	%100
7	M21	X	-4.245	-4.245	0	%100
8	M21	Z	2.451	2.451	0	%100
9	M19	X	-1.061	-1.061	0	%100
10	M19	Z	.613	.613	0	%100
11	M20A	X	-1.061	-1.061	0	%100
12	M20A	Z	.613	.613	0	%100
13	M21A	X	-1.814	-1.814	0	%100
14	M21A	Z	1.047	1.047	0	%100
15	M15A	X	-1.814	-1.814	0	%100
16	M15A	Z	1.047	1.047	0	%100
17	M17A	X	-1.814	-1.814	0	%100
18	M17A	Z	1.047	1.047	0	%100
19	M19A	X	-1.814	-1.814	0	%100
20	M19A	Z	1.047	1.047	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	-1.814	-1.814	0	%100
30	M29	Z	1.047	1.047	0	%100
31	M31	X	-1.814	-1.814	0	%100
32	M31	Z	1.047	1.047	0	%100
33	M33	X	-1.814	-1.814	0	%100
34	M33	Z	1.047	1.047	0	%100
35	M35	X	-1.814	-1.814	0	%100
36	M35	Z	1.047	1.047	0	%100



**Member Distributed Loads (BLC 61 : Structure Wi (240 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
37	MP1A	X	-3.224	-3.224	0	%100
38	MP1A	Z	1.861	1.861	0	%100
39	MP2A	X	-3.224	-3.224	0	%100
40	MP2A	Z	1.861	1.861	0	%100
41	MP3A	X	-3.224	-3.224	0	%100
42	MP3A	Z	1.861	1.861	0	%100
43	MP4A	X	-3.224	-3.224	0	%100
44	MP4A	Z	1.861	1.861	0	%100
45	MP1B	X	-3.224	-3.224	0	%100
46	MP1B	Z	1.861	1.861	0	%100
47	MP2B	X	-3.224	-3.224	0	%100
48	MP2B	Z	1.861	1.861	0	%100
49	MP3B	X	-3.224	-3.224	0	%100
50	MP3B	Z	1.861	1.861	0	%100
51	MP4B	X	-3.224	-3.224	0	%100
52	MP4B	Z	1.861	1.861	0	%100
53	MP1C	X	-3.224	-3.224	0	%100
54	MP1C	Z	1.861	1.861	0	%100
55	MP2C	X	-3.224	-3.224	0	%100
56	MP2C	Z	1.861	1.861	0	%100
57	MP3C	X	-3.224	-3.224	0	%100
58	MP3C	Z	1.861	1.861	0	%100
59	MP4C	X	-3.224	-3.224	0	%100
60	MP4C	Z	1.861	1.861	0	%100
61	MP5C	X	-3.224	-3.224	0	%100
62	MP5C	Z	1.861	1.861	0	%100
63	M67	X	-1.297	-1.297	0	%100
64	M67	Z	.749	.749	0	%100
65	M68	X	-1.297	-1.297	0	%100
66	M68	Z	.749	.749	0	%100
67	M69	X	-2.219	-2.219	0	%100
68	M69	Z	1.281	1.281	0	%100
69	M70	X	-4.001	-4.001	0	%100
70	M70	Z	2.31	2.31	0	%100
71	M71	X	-2.175	-2.175	0	%100
72	M71	Z	1.256	1.256	0	%100
73	M72	X	-4.001	-4.001	0	%100
74	M72	Z	2.31	2.31	0	%100

**Member Distributed Loads (BLC 62 : Structure Wi (270 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-4.901	-4.901	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	-1.225	-1.225	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	-1.225	-1.225	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	-3.676	-3.676	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	-3.676	-3.676	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	0	0	0	%100
13	M21A	X	-2.793	-2.793	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	-2.793	-2.793	0	%100



**Member Distributed Loads (BLC 62 : Structure Wi (270 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
16	M15A	Z	0	0	0	%100
17	M17A	X	-2.793	-2.793	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	-2.793	-2.793	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	-.698	-.698	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	-.698	-.698	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	-.698	-.698	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	-.698	-.698	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	-.698	-.698	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	-.698	-.698	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	-.698	-.698	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	-.698	-.698	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	-3.722	-3.722	0	%100
38	MP1A	Z	0	0	0	%100
39	MP2A	X	-3.722	-3.722	0	%100
40	MP2A	Z	0	0	0	%100
41	MP3A	X	-3.722	-3.722	0	%100
42	MP3A	Z	0	0	0	%100
43	MP4A	X	-3.722	-3.722	0	%100
44	MP4A	Z	0	0	0	%100
45	MP1B	X	-3.722	-3.722	0	%100
46	MP1B	Z	0	0	0	%100
47	MP2B	X	-3.722	-3.722	0	%100
48	MP2B	Z	0	0	0	%100
49	MP3B	X	-3.722	-3.722	0	%100
50	MP3B	Z	0	0	0	%100
51	MP4B	X	-3.722	-3.722	0	%100
52	MP4B	Z	0	0	0	%100
53	MP1C	X	-3.722	-3.722	0	%100
54	MP1C	Z	0	0	0	%100
55	MP2C	X	-3.722	-3.722	0	%100
56	MP2C	Z	0	0	0	%100
57	MP3C	X	-3.722	-3.722	0	%100
58	MP3C	Z	0	0	0	%100
59	MP4C	X	-3.722	-3.722	0	%100
60	MP4C	Z	0	0	0	%100
61	MP5C	X	-3.722	-3.722	0	%100
62	MP5C	Z	0	0	0	%100
63	M67	X	-1.123	-1.123	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	-1.123	-1.123	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	-2.562	-2.562	0	%100
68	M69	Z	0	0	0	%100
69	M70	X	-5.323	-5.323	0	%100
70	M70	Z	0	0	0	%100
71	M71	X	-3.214	-3.214	0	%100
72	M71	Z	0	0	0	%100



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 Designer :  
 Job Number :  
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**Member Distributed Loads (BLC 62 : Structure Wi (270 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
73	M72	X	-3.214	-3.214	0	%100
74	M72	Z	0	0	0	%100

**Member Distributed Loads (BLC 63 : Structure Wi (300 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-3.184	-3.184	0	%100
2	M40	Z	-1.838	-1.838	0	%100
3	M13	X	-3.184	-3.184	0	%100
4	M13	Z	-1.838	-1.838	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	-1.061	-1.061	0	%100
8	M21	Z	-.613	-.613	0	%100
9	M19	X	-4.245	-4.245	0	%100
10	M19	Z	-2.451	-2.451	0	%100
11	M20A	X	-1.061	-1.061	0	%100
12	M20A	Z	-.613	-.613	0	%100
13	M21A	X	-1.814	-1.814	0	%100
14	M21A	Z	-1.047	-1.047	0	%100
15	M15A	X	-1.814	-1.814	0	%100
16	M15A	Z	-1.047	-1.047	0	%100
17	M17A	X	-1.814	-1.814	0	%100
18	M17A	Z	-1.047	-1.047	0	%100
19	M19A	X	-1.814	-1.814	0	%100
20	M19A	Z	-1.047	-1.047	0	%100
21	M21B	X	-1.814	-1.814	0	%100
22	M21B	Z	-1.047	-1.047	0	%100
23	M23	X	-1.814	-1.814	0	%100
24	M23	Z	-1.047	-1.047	0	%100
25	M25	X	-1.814	-1.814	0	%100
26	M25	Z	-1.047	-1.047	0	%100
27	M27	X	-1.814	-1.814	0	%100
28	M27	Z	-1.047	-1.047	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	-3.224	-3.224	0	%100
38	MP1A	Z	-1.861	-1.861	0	%100
39	MP2A	X	-3.224	-3.224	0	%100
40	MP2A	Z	-1.861	-1.861	0	%100
41	MP3A	X	-3.224	-3.224	0	%100
42	MP3A	Z	-1.861	-1.861	0	%100
43	MP4A	X	-3.224	-3.224	0	%100
44	MP4A	Z	-1.861	-1.861	0	%100
45	MP1B	X	-3.224	-3.224	0	%100
46	MP1B	Z	-1.861	-1.861	0	%100
47	MP2B	X	-3.224	-3.224	0	%100
48	MP2B	Z	-1.861	-1.861	0	%100
49	MP3B	X	-3.224	-3.224	0	%100
50	MP3B	Z	-1.861	-1.861	0	%100
51	MP4B	X	-3.224	-3.224	0	%100



**Member Distributed Loads (BLC 63 : Structure Wi (300 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F....]	Start Location[ft.%]	End Location[ft.%]
52	MP4B	Z	-1.861	-1.861	0	%100
53	MP1C	X	-3.224	-3.224	0	%100
54	MP1C	Z	-1.861	-1.861	0	%100
55	MP2C	X	-3.224	-3.224	0	%100
56	MP2C	Z	-1.861	-1.861	0	%100
57	MP3C	X	-3.224	-3.224	0	%100
58	MP3C	Z	-1.861	-1.861	0	%100
59	MP4C	X	-3.224	-3.224	0	%100
60	MP4C	Z	-1.861	-1.861	0	%100
61	MP5C	X	-3.224	-3.224	0	%100
62	MP5C	Z	-1.861	-1.861	0	%100
63	M67	X	-.324	-.324	0	%100
64	M67	Z	-.187	-.187	0	%100
65	M68	X	-.324	-.324	0	%100
66	M68	Z	-.187	-.187	0	%100
67	M69	X	-2.219	-2.219	0	%100
68	M69	Z	-1.281	-1.281	0	%100
69	M70	X	-4.001	-4.001	0	%100
70	M70	Z	-2.31	-2.31	0	%100
71	M71	X	-4.001	-4.001	0	%100
72	M71	Z	-2.31	-2.31	0	%100
73	M72	X	-2.175	-2.175	0	%100
74	M72	Z	-1.256	-1.256	0	%100

**Member Distributed Loads (BLC 64 : Structure Wi (330 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F....]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-.613	-.613	0	%100
2	M40	Z	-1.061	-1.061	0	%100
3	M13	X	-2.451	-2.451	0	%100
4	M13	Z	-4.245	-4.245	0	%100
5	M14	X	-.613	-.613	0	%100
6	M14	Z	-1.061	-1.061	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	-1.838	-1.838	0	%100
10	M19	Z	-3.184	-3.184	0	%100
11	M20A	X	-1.838	-1.838	0	%100
12	M20A	Z	-3.184	-3.184	0	%100
13	M21A	X	-.349	-.349	0	%100
14	M21A	Z	-.605	-.605	0	%100
15	M15A	X	-.349	-.349	0	%100
16	M15A	Z	-.605	-.605	0	%100
17	M17A	X	-.349	-.349	0	%100
18	M17A	Z	-.605	-.605	0	%100
19	M19A	X	-.349	-.349	0	%100
20	M19A	Z	-.605	-.605	0	%100
21	M21B	X	-1.396	-1.396	0	%100
22	M21B	Z	-2.419	-2.419	0	%100
23	M23	X	-1.396	-1.396	0	%100
24	M23	Z	-2.419	-2.419	0	%100
25	M25	X	-1.396	-1.396	0	%100
26	M25	Z	-2.419	-2.419	0	%100
27	M27	X	-1.396	-1.396	0	%100
28	M27	Z	-2.419	-2.419	0	%100
29	M29	X	-.349	-.349	0	%100
30	M29	Z	-.605	-.605	0	%100



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
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**Member Distributed Loads (BLC 64 : Structure Wi (330 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
31	M31	X	-349	-349	0	%100
32	M31	Z	-605	-605	0	%100
33	M33	X	-349	-349	0	%100
34	M33	Z	-605	-605	0	%100
35	M35	X	-349	-349	0	%100
36	M35	Z	-605	-605	0	%100
37	MP1A	X	-1.861	-1.861	0	%100
38	MP1A	Z	-3.224	-3.224	0	%100
39	MP2A	X	-1.861	-1.861	0	%100
40	MP2A	Z	-3.224	-3.224	0	%100
41	MP3A	X	-1.861	-1.861	0	%100
42	MP3A	Z	-3.224	-3.224	0	%100
43	MP4A	X	-1.861	-1.861	0	%100
44	MP4A	Z	-3.224	-3.224	0	%100
45	MP1B	X	-1.861	-1.861	0	%100
46	MP1B	Z	-3.224	-3.224	0	%100
47	MP2B	X	-1.861	-1.861	0	%100
48	MP2B	Z	-3.224	-3.224	0	%100
49	MP3B	X	-1.861	-1.861	0	%100
50	MP3B	Z	-3.224	-3.224	0	%100
51	MP4B	X	-1.861	-1.861	0	%100
52	MP4B	Z	-3.224	-3.224	0	%100
53	MP1C	X	-1.861	-1.861	0	%100
54	MP1C	Z	-3.224	-3.224	0	%100
55	MP2C	X	-1.861	-1.861	0	%100
56	MP2C	Z	-3.224	-3.224	0	%100
57	MP3C	X	-1.861	-1.861	0	%100
58	MP3C	Z	-3.224	-3.224	0	%100
59	MP4C	X	-1.861	-1.861	0	%100
60	MP4C	Z	-3.224	-3.224	0	%100
61	MP5C	X	-1.861	-1.861	0	%100
62	MP5C	Z	-3.224	-3.224	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	-1.281	-1.281	0	%100
68	M69	Z	-2.219	-2.219	0	%100
69	M70	X	-1.607	-1.607	0	%100
70	M70	Z	-2.784	-2.784	0	%100
71	M71	X	-2.661	-2.661	0	%100
72	M71	Z	-4.61	-4.61	0	%100
73	M72	X	-1.607	-1.607	0	%100
74	M72	Z	-2.784	-2.784	0	%100

**Member Distributed Loads (BLC 65 : Structure Wm (0 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	0	0	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	-74	-74	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	-74	-74	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	-.247	-.247	0	%100
9	M19	X	0	0	0	%100



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 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

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**Member Distributed Loads (BLC 65 : Structure Wm (0 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
10	M19	Z	-247	-247	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	-987	-987	0	%100
13	M21A	X	0	0	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	0	0	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	0	0	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	0	0	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	-401	-401	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	-401	-401	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	-401	-401	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	-401	-401	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	-401	-401	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	-401	-401	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	-401	-401	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	-401	-401	0	%100
37	MP1A	X	0	0	0	%100
38	MP1A	Z	-563	-563	0	%100
39	MP2A	X	0	0	0	%100
40	MP2A	Z	-563	-563	0	%100
41	MP3A	X	0	0	0	%100
42	MP3A	Z	-563	-563	0	%100
43	MP4A	X	0	0	0	%100
44	MP4A	Z	-563	-563	0	%100
45	MP1B	X	0	0	0	%100
46	MP1B	Z	-563	-563	0	%100
47	MP2B	X	0	0	0	%100
48	MP2B	Z	-563	-563	0	%100
49	MP3B	X	0	0	0	%100
50	MP3B	Z	-563	-563	0	%100
51	MP4B	X	0	0	0	%100
52	MP4B	Z	-563	-563	0	%100
53	MP1C	X	0	0	0	%100
54	MP1C	Z	-563	-563	0	%100
55	MP2C	X	0	0	0	%100
56	MP2C	Z	-563	-563	0	%100
57	MP3C	X	0	0	0	%100
58	MP3C	Z	-563	-563	0	%100
59	MP4C	X	0	0	0	%100
60	MP4C	Z	-563	-563	0	%100
61	MP5C	X	0	0	0	%100
62	MP5C	Z	-563	-563	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	-021	-021	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	-021	-021	0	%100



**Member Distributed Loads (BLC 65 : Structure Wm (0 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
67	M69	X	0	0	0	%100
68	M69	Z	- .373	- .373	0	%100
69	M70	X	0	0	0	%100
70	M70	Z	- .663	- .663	0	%100
71	M71	X	0	0	0	%100
72	M71	Z	-1.048	-1.048	0	%100
73	M72	X	0	0	0	%100
74	M72	Z	-1.048	-1.048	0	%100

**Member Distributed Loads (BLC 66 : Structure Wm (30 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.123	.123	0	%100
2	M40	Z	- .214	- .214	0	%100
3	M13	X	.123	.123	0	%100
4	M13	Z	- .214	- .214	0	%100
5	M14	X	.494	.494	0	%100
6	M14	Z	- .855	- .855	0	%100
7	M21	X	.37	.37	0	%100
8	M21	Z	- .641	- .641	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	.37	.37	0	%100
12	M20A	Z	- .641	- .641	0	%100
13	M21A	X	.067	.067	0	%100
14	M21A	Z	- .116	- .116	0	%100
15	M15A	X	.067	.067	0	%100
16	M15A	Z	- .116	- .116	0	%100
17	M17A	X	.067	.067	0	%100
18	M17A	Z	- .116	- .116	0	%100
19	M19A	X	.067	.067	0	%100
20	M19A	Z	- .116	- .116	0	%100
21	M21B	X	.067	.067	0	%100
22	M21B	Z	- .116	- .116	0	%100
23	M23	X	.067	.067	0	%100
24	M23	Z	- .116	- .116	0	%100
25	M25	X	.067	.067	0	%100
26	M25	Z	- .116	- .116	0	%100
27	M27	X	.067	.067	0	%100
28	M27	Z	- .116	- .116	0	%100
29	M29	X	.268	.268	0	%100
30	M29	Z	- .464	- .464	0	%100
31	M31	X	.268	.268	0	%100
32	M31	Z	- .464	- .464	0	%100
33	M33	X	.268	.268	0	%100
34	M33	Z	- .464	- .464	0	%100
35	M35	X	.268	.268	0	%100
36	M35	Z	- .464	- .464	0	%100
37	MP1A	X	.281	.281	0	%100
38	MP1A	Z	- .487	- .487	0	%100
39	MP2A	X	.281	.281	0	%100
40	MP2A	Z	- .487	- .487	0	%100
41	MP3A	X	.281	.281	0	%100
42	MP3A	Z	- .487	- .487	0	%100
43	MP4A	X	.281	.281	0	%100
44	MP4A	Z	- .487	- .487	0	%100
45	MP1B	X	.281	.281	0	%100





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**Member Distributed Loads (BLC 66 : Structure Wm (30 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
46	MP1B	Z	-.487	-.487	0	%100
47	MP2B	X	.281	.281	0	%100
48	MP2B	Z	-.487	-.487	0	%100
49	MP3B	X	.281	.281	0	%100
50	MP3B	Z	-.487	-.487	0	%100
51	MP4B	X	.281	.281	0	%100
52	MP4B	Z	-.487	-.487	0	%100
53	MP1C	X	.281	.281	0	%100
54	MP1C	Z	-.487	-.487	0	%100
55	MP2C	X	.281	.281	0	%100
56	MP2C	Z	-.487	-.487	0	%100
57	MP3C	X	.281	.281	0	%100
58	MP3C	Z	-.487	-.487	0	%100
59	MP4C	X	.281	.281	0	%100
60	MP4C	Z	-.487	-.487	0	%100
61	MP5C	X	.281	.281	0	%100
62	MP5C	Z	-.487	-.487	0	%100
63	M67	X	.032	.032	0	%100
64	M67	Z	-.056	-.056	0	%100
65	M68	X	.032	.032	0	%100
66	M68	Z	-.056	-.056	0	%100
67	M69	X	.187	.187	0	%100
68	M69	Z	-.323	-.323	0	%100
69	M70	X	.396	.396	0	%100
70	M70	Z	-.685	-.685	0	%100
71	M71	X	.396	.396	0	%100
72	M71	Z	-.685	-.685	0	%100
73	M72	X	.588	.588	0	%100
74	M72	Z	-1.018	-1.018	0	%100

**Member Distributed Loads (BLC 67 : Structure Wm (60 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.641	.641	0	%100
2	M40	Z	-.37	-.37	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	.641	.641	0	%100
6	M14	Z	-.37	-.37	0	%100
7	M21	X	.855	.855	0	%100
8	M21	Z	-.494	-.494	0	%100
9	M19	X	.214	.214	0	%100
10	M19	Z	-.123	-.123	0	%100
11	M20A	X	.214	.214	0	%100
12	M20A	Z	-.123	-.123	0	%100
13	M21A	X	.348	.348	0	%100
14	M21A	Z	-.201	-.201	0	%100
15	M15A	X	.348	.348	0	%100
16	M15A	Z	-.201	-.201	0	%100
17	M17A	X	.348	.348	0	%100
18	M17A	Z	-.201	-.201	0	%100
19	M19A	X	.348	.348	0	%100
20	M19A	Z	-.201	-.201	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	0	0	0	%100



**Member Distributed Loads (BLC 67 : Structure Wm (60 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
25	M25	X	0	0	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	.348	.348	0	%100
30	M29	Z	-.201	-.201	0	%100
31	M31	X	.348	.348	0	%100
32	M31	Z	-.201	-.201	0	%100
33	M33	X	.348	.348	0	%100
34	M33	Z	-.201	-.201	0	%100
35	M35	X	.348	.348	0	%100
36	M35	Z	-.201	-.201	0	%100
37	MP1A	X	.487	.487	0	%100
38	MP1A	Z	-.281	-.281	0	%100
39	MP2A	X	.487	.487	0	%100
40	MP2A	Z	-.281	-.281	0	%100
41	MP3A	X	.487	.487	0	%100
42	MP3A	Z	-.281	-.281	0	%100
43	MP4A	X	.487	.487	0	%100
44	MP4A	Z	-.281	-.281	0	%100
45	MP1B	X	.487	.487	0	%100
46	MP1B	Z	-.281	-.281	0	%100
47	MP2B	X	.487	.487	0	%100
48	MP2B	Z	-.281	-.281	0	%100
49	MP3B	X	.487	.487	0	%100
50	MP3B	Z	-.281	-.281	0	%100
51	MP4B	X	.487	.487	0	%100
52	MP4B	Z	-.281	-.281	0	%100
53	MP1C	X	.487	.487	0	%100
54	MP1C	Z	-.281	-.281	0	%100
55	MP2C	X	.487	.487	0	%100
56	MP2C	Z	-.281	-.281	0	%100
57	MP3C	X	.487	.487	0	%100
58	MP3C	Z	-.281	-.281	0	%100
59	MP4C	X	.487	.487	0	%100
60	MP4C	Z	-.281	-.281	0	%100
61	MP5C	X	.487	.487	0	%100
62	MP5C	Z	-.281	-.281	0	%100
63	M67	X	.074	.074	0	%100
64	M67	Z	-.043	-.043	0	%100
65	M68	X	.074	.074	0	%100
66	M68	Z	-.043	-.043	0	%100
67	M69	X	.323	.323	0	%100
68	M69	Z	-.187	-.187	0	%100
69	M70	X	.907	.907	0	%100
70	M70	Z	-.524	-.524	0	%100
71	M71	X	.574	.574	0	%100
72	M71	Z	-.332	-.332	0	%100
73	M72	X	.907	.907	0	%100
74	M72	Z	-.524	-.524	0	%100

**Member Distributed Loads (BLC 68 : Structure Wm (90 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.987	.987	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	.247	.247	0	%100



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**Member Distributed Loads (BLC 68 : Structure Wm (90 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
4	M13	Z	0	0	0	%100
5	M14	X	.247	.247	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	.74	.74	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	.74	.74	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	0	0	0	%100
13	M21A	X	.535	.535	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	.535	.535	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	.535	.535	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	.535	.535	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	.134	.134	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	.134	.134	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	.134	.134	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	.134	.134	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	.134	.134	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	.134	.134	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	.134	.134	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	.134	.134	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	.563	.563	0	%100
38	MP1A	Z	0	0	0	%100
39	MP2A	X	.563	.563	0	%100
40	MP2A	Z	0	0	0	%100
41	MP3A	X	.563	.563	0	%100
42	MP3A	Z	0	0	0	%100
43	MP4A	X	.563	.563	0	%100
44	MP4A	Z	0	0	0	%100
45	MP1B	X	.563	.563	0	%100
46	MP1B	Z	0	0	0	%100
47	MP2B	X	.563	.563	0	%100
48	MP2B	Z	0	0	0	%100
49	MP3B	X	.563	.563	0	%100
50	MP3B	Z	0	0	0	%100
51	MP4B	X	.563	.563	0	%100
52	MP4B	Z	0	0	0	%100
53	MP1C	X	.563	.563	0	%100
54	MP1C	Z	0	0	0	%100
55	MP2C	X	.563	.563	0	%100
56	MP2C	Z	0	0	0	%100
57	MP3C	X	.563	.563	0	%100
58	MP3C	Z	0	0	0	%100
59	MP4C	X	.563	.563	0	%100
60	MP4C	Z	0	0	0	%100



**Member Distributed Loads (BLC 68 : Structure Wm (90 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
61	MP5C	X	.563	.563	0	%100
62	MP5C	Z	0	0	0	%100
63	M67	X	.064	.064	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	.064	.064	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	.373	.373	0	%100
68	M69	Z	0	0	0	%100
69	M70	X	1.176	1.176	0	%100
70	M70	Z	0	0	0	%100
71	M71	X	.791	.791	0	%100
72	M71	Z	0	0	0	%100
73	M72	X	.791	.791	0	%100
74	M72	Z	0	0	0	%100

**Member Distributed Loads (BLC 69 : Structure Wm (120 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.641	.641	0	%100
2	M40	Z	.37	.37	0	%100
3	M13	X	.641	.641	0	%100
4	M13	Z	.37	.37	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	.214	.214	0	%100
8	M21	Z	.123	.123	0	%100
9	M19	X	.855	.855	0	%100
10	M19	Z	.494	.494	0	%100
11	M20A	X	.214	.214	0	%100
12	M20A	Z	.123	.123	0	%100
13	M21A	X	.348	.348	0	%100
14	M21A	Z	.201	.201	0	%100
15	M15A	X	.348	.348	0	%100
16	M15A	Z	.201	.201	0	%100
17	M17A	X	.348	.348	0	%100
18	M17A	Z	.201	.201	0	%100
19	M19A	X	.348	.348	0	%100
20	M19A	Z	.201	.201	0	%100
21	M21B	X	.348	.348	0	%100
22	M21B	Z	.201	.201	0	%100
23	M23	X	.348	.348	0	%100
24	M23	Z	.201	.201	0	%100
25	M25	X	.348	.348	0	%100
26	M25	Z	.201	.201	0	%100
27	M27	X	.348	.348	0	%100
28	M27	Z	.201	.201	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	.487	.487	0	%100
38	MP1A	Z	.281	.281	0	%100
39	MP2A	X	.487	.487	0	%100



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

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**Member Distributed Loads (BLC 69 : Structure Wm (120 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
40	MP2A	Z	.281	.281	0	%100
41	MP3A	X	.487	.487	0	%100
42	MP3A	Z	.281	.281	0	%100
43	MP4A	X	.487	.487	0	%100
44	MP4A	Z	.281	.281	0	%100
45	MP1B	X	.487	.487	0	%100
46	MP1B	Z	.281	.281	0	%100
47	MP2B	X	.487	.487	0	%100
48	MP2B	Z	.281	.281	0	%100
49	MP3B	X	.487	.487	0	%100
50	MP3B	Z	.281	.281	0	%100
51	MP4B	X	.487	.487	0	%100
52	MP4B	Z	.281	.281	0	%100
53	MP1C	X	.487	.487	0	%100
54	MP1C	Z	.281	.281	0	%100
55	MP2C	X	.487	.487	0	%100
56	MP2C	Z	.281	.281	0	%100
57	MP3C	X	.487	.487	0	%100
58	MP3C	Z	.281	.281	0	%100
59	MP4C	X	.487	.487	0	%100
60	MP4C	Z	.281	.281	0	%100
61	MP5C	X	.487	.487	0	%100
62	MP5C	Z	.281	.281	0	%100
63	M67	X	.019	.019	0	%100
64	M67	Z	.011	.011	0	%100
65	M68	X	.019	.019	0	%100
66	M68	Z	.011	.011	0	%100
67	M69	X	.323	.323	0	%100
68	M69	Z	.187	.187	0	%100
69	M70	X	.907	.907	0	%100
70	M70	Z	.524	.524	0	%100
71	M71	X	.907	.907	0	%100
72	M71	Z	.524	.524	0	%100
73	M72	X	.574	.574	0	%100
74	M72	Z	.332	.332	0	%100

**Member Distributed Loads (BLC 70 : Structure Wm (150 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	.123	.123	0	%100
2	M40	Z	.214	.214	0	%100
3	M13	X	.494	.494	0	%100
4	M13	Z	.855	.855	0	%100
5	M14	X	.123	.123	0	%100
6	M14	Z	.214	.214	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	.37	.37	0	%100
10	M19	Z	.641	.641	0	%100
11	M20A	X	.37	.37	0	%100
12	M20A	Z	.641	.641	0	%100
13	M21A	X	.067	.067	0	%100
14	M21A	Z	.116	.116	0	%100
15	M15A	X	.067	.067	0	%100
16	M15A	Z	.116	.116	0	%100
17	M17A	X	.067	.067	0	%100
18	M17A	Z	.116	.116	0	%100



**Member Distributed Loads (BLC 70 : Structure Wm (150 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
19	M19A	X	.067	.067	0	%100
20	M19A	Z	.116	.116	0	%100
21	M21B	X	.268	.268	0	%100
22	M21B	Z	.464	.464	0	%100
23	M23	X	.268	.268	0	%100
24	M23	Z	.464	.464	0	%100
25	M25	X	.268	.268	0	%100
26	M25	Z	.464	.464	0	%100
27	M27	X	.268	.268	0	%100
28	M27	Z	.464	.464	0	%100
29	M29	X	.067	.067	0	%100
30	M29	Z	.116	.116	0	%100
31	M31	X	.067	.067	0	%100
32	M31	Z	.116	.116	0	%100
33	M33	X	.067	.067	0	%100
34	M33	Z	.116	.116	0	%100
35	M35	X	.067	.067	0	%100
36	M35	Z	.116	.116	0	%100
37	MP1A	X	.281	.281	0	%100
38	MP1A	Z	.487	.487	0	%100
39	MP2A	X	.281	.281	0	%100
40	MP2A	Z	.487	.487	0	%100
41	MP3A	X	.281	.281	0	%100
42	MP3A	Z	.487	.487	0	%100
43	MP4A	X	.281	.281	0	%100
44	MP4A	Z	.487	.487	0	%100
45	MP1B	X	.281	.281	0	%100
46	MP1B	Z	.487	.487	0	%100
47	MP2B	X	.281	.281	0	%100
48	MP2B	Z	.487	.487	0	%100
49	MP3B	X	.281	.281	0	%100
50	MP3B	Z	.487	.487	0	%100
51	MP4B	X	.281	.281	0	%100
52	MP4B	Z	.487	.487	0	%100
53	MP1C	X	.281	.281	0	%100
54	MP1C	Z	.487	.487	0	%100
55	MP2C	X	.281	.281	0	%100
56	MP2C	Z	.487	.487	0	%100
57	MP3C	X	.281	.281	0	%100
58	MP3C	Z	.487	.487	0	%100
59	MP4C	X	.281	.281	0	%100
60	MP4C	Z	.487	.487	0	%100
61	MP5C	X	.281	.281	0	%100
62	MP5C	Z	.487	.487	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	.187	.187	0	%100
68	M69	Z	.323	.323	0	%100
69	M70	X	.396	.396	0	%100
70	M70	Z	.685	.685	0	%100
71	M71	X	.588	.588	0	%100
72	M71	Z	1.018	1.018	0	%100
73	M72	X	.396	.396	0	%100
74	M72	Z	.685	.685	0	%100



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**Member Distributed Loads (BLC 71 : Structure Wm (180 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	0	0	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	.74	.74	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	.74	.74	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	.247	.247	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	.247	.247	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	.987	.987	0	%100
13	M21A	X	0	0	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	0	0	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	0	0	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	0	0	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	.401	.401	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	.401	.401	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	.401	.401	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	.401	.401	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	.401	.401	0	%100
31	M31	X	0	0	0	%100
32	M31	Z	.401	.401	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	.401	.401	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	.401	.401	0	%100
37	MP1A	X	0	0	0	%100
38	MP1A	Z	.563	.563	0	%100
39	MP2A	X	0	0	0	%100
40	MP2A	Z	.563	.563	0	%100
41	MP3A	X	0	0	0	%100
42	MP3A	Z	.563	.563	0	%100
43	MP4A	X	0	0	0	%100
44	MP4A	Z	.563	.563	0	%100
45	MP1B	X	0	0	0	%100
46	MP1B	Z	.563	.563	0	%100
47	MP2B	X	0	0	0	%100
48	MP2B	Z	.563	.563	0	%100
49	MP3B	X	0	0	0	%100
50	MP3B	Z	.563	.563	0	%100
51	MP4B	X	0	0	0	%100
52	MP4B	Z	.563	.563	0	%100
53	MP1C	X	0	0	0	%100
54	MP1C	Z	.563	.563	0	%100
55	MP2C	X	0	0	0	%100
56	MP2C	Z	.563	.563	0	%100
57	MP3C	X	0	0	0	%100

**Member Distributed Loads (BLC 71 : Structure Wm (180 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
58	MP3C	Z	.563	.563	0	%100
59	MP4C	X	0	0	0	%100
60	MP4C	Z	.563	.563	0	%100
61	MP5C	X	0	0	0	%100
62	MP5C	Z	.563	.563	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	.021	.021	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	.021	.021	0	%100
67	M69	X	0	0	0	%100
68	M69	Z	.373	.373	0	%100
69	M70	X	0	0	0	%100
70	M70	Z	.663	.663	0	%100
71	M71	X	0	0	0	%100
72	M71	Z	1.048	1.048	0	%100
73	M72	X	0	0	0	%100
74	M72	Z	1.048	1.048	0	%100

**Member Distributed Loads (BLC 72 : Structure Wm (210 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-.123	-.123	0	%100
2	M40	Z	.214	.214	0	%100
3	M13	X	-.123	-.123	0	%100
4	M13	Z	.214	.214	0	%100
5	M14	X	-.494	-.494	0	%100
6	M14	Z	.855	.855	0	%100
7	M21	X	-.37	-.37	0	%100
8	M21	Z	.641	.641	0	%100
9	M19	X	0	0	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	-.37	-.37	0	%100
12	M20A	Z	.641	.641	0	%100
13	M21A	X	-.067	-.067	0	%100
14	M21A	Z	.116	.116	0	%100
15	M15A	X	-.067	-.067	0	%100
16	M15A	Z	.116	.116	0	%100
17	M17A	X	-.067	-.067	0	%100
18	M17A	Z	.116	.116	0	%100
19	M19A	X	-.067	-.067	0	%100
20	M19A	Z	.116	.116	0	%100
21	M21B	X	-.067	-.067	0	%100
22	M21B	Z	.116	.116	0	%100
23	M23	X	-.067	-.067	0	%100
24	M23	Z	.116	.116	0	%100
25	M25	X	-.067	-.067	0	%100
26	M25	Z	.116	.116	0	%100
27	M27	X	-.067	-.067	0	%100
28	M27	Z	.116	.116	0	%100
29	M29	X	-.268	-.268	0	%100
30	M29	Z	.464	.464	0	%100
31	M31	X	-.268	-.268	0	%100
32	M31	Z	.464	.464	0	%100
33	M33	X	-.268	-.268	0	%100
34	M33	Z	.464	.464	0	%100
35	M35	X	-.268	-.268	0	%100
36	M35	Z	.464	.464	0	%100





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**Member Distributed Loads (BLC 72 : Structure Wm (210 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
37	MP1A	X	-.281	-.281	0	%100
38	MP1A	Z	.487	.487	0	%100
39	MP2A	X	-.281	-.281	0	%100
40	MP2A	Z	.487	.487	0	%100
41	MP3A	X	-.281	-.281	0	%100
42	MP3A	Z	.487	.487	0	%100
43	MP4A	X	-.281	-.281	0	%100
44	MP4A	Z	.487	.487	0	%100
45	MP1B	X	-.281	-.281	0	%100
46	MP1B	Z	.487	.487	0	%100
47	MP2B	X	-.281	-.281	0	%100
48	MP2B	Z	.487	.487	0	%100
49	MP3B	X	-.281	-.281	0	%100
50	MP3B	Z	.487	.487	0	%100
51	MP4B	X	-.281	-.281	0	%100
52	MP4B	Z	.487	.487	0	%100
53	MP1C	X	-.281	-.281	0	%100
54	MP1C	Z	.487	.487	0	%100
55	MP2C	X	-.281	-.281	0	%100
56	MP2C	Z	.487	.487	0	%100
57	MP3C	X	-.281	-.281	0	%100
58	MP3C	Z	.487	.487	0	%100
59	MP4C	X	-.281	-.281	0	%100
60	MP4C	Z	.487	.487	0	%100
61	MP5C	X	-.281	-.281	0	%100
62	MP5C	Z	.487	.487	0	%100
63	M67	X	-.032	-.032	0	%100
64	M67	Z	.056	.056	0	%100
65	M68	X	-.032	-.032	0	%100
66	M68	Z	.056	.056	0	%100
67	M69	X	-.187	-.187	0	%100
68	M69	Z	.323	.323	0	%100
69	M70	X	-.396	-.396	0	%100
70	M70	Z	.685	.685	0	%100
71	M71	X	-.396	-.396	0	%100
72	M71	Z	.685	.685	0	%100
73	M72	X	-.588	-.588	0	%100
74	M72	Z	1.018	1.018	0	%100

**Member Distributed Loads (BLC 73 : Structure Wm (240 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-.641	-.641	0	%100
2	M40	Z	.37	.37	0	%100
3	M13	X	0	0	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	-.641	-.641	0	%100
6	M14	Z	.37	.37	0	%100
7	M21	X	-.855	-.855	0	%100
8	M21	Z	.494	.494	0	%100
9	M19	X	-.214	-.214	0	%100
10	M19	Z	.123	.123	0	%100
11	M20A	X	-.214	-.214	0	%100
12	M20A	Z	.123	.123	0	%100
13	M21A	X	-.348	-.348	0	%100
14	M21A	Z	.201	.201	0	%100
15	M15A	X	-.348	-.348	0	%100



**Member Distributed Loads (BLC 73 : Structure Wm (240 Deg)) (Continued)**

Member Label	Direction	Start Magnitude[lb/ft]	End Magnitude[lb/ft]	Start Location[ft]	End Location[ft]	%
16	M15A	Z	.201	.201	0	%100
17	M17A	X	-.348	-.348	0	%100
18	M17A	Z	.201	.201	0	%100
19	M19A	X	-.348	-.348	0	%100
20	M19A	Z	.201	.201	0	%100
21	M21B	X	0	0	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	0	0	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	0	0	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	0	0	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	-.348	-.348	0	%100
30	M29	Z	.201	.201	0	%100
31	M31	X	-.348	-.348	0	%100
32	M31	Z	.201	.201	0	%100
33	M33	X	-.348	-.348	0	%100
34	M33	Z	.201	.201	0	%100
35	M35	X	-.348	-.348	0	%100
36	M35	Z	.201	.201	0	%100
37	MP1A	X	-.487	-.487	0	%100
38	MP1A	Z	.281	.281	0	%100
39	MP2A	X	-.487	-.487	0	%100
40	MP2A	Z	.281	.281	0	%100
41	MP3A	X	-.487	-.487	0	%100
42	MP3A	Z	.281	.281	0	%100
43	MP4A	X	-.487	-.487	0	%100
44	MP4A	Z	.281	.281	0	%100
45	MP1B	X	-.487	-.487	0	%100
46	MP1B	Z	.281	.281	0	%100
47	MP2B	X	-.487	-.487	0	%100
48	MP2B	Z	.281	.281	0	%100
49	MP3B	X	-.487	-.487	0	%100
50	MP3B	Z	.281	.281	0	%100
51	MP4B	X	-.487	-.487	0	%100
52	MP4B	Z	.281	.281	0	%100
53	MP1C	X	-.487	-.487	0	%100
54	MP1C	Z	.281	.281	0	%100
55	MP2C	X	-.487	-.487	0	%100
56	MP2C	Z	.281	.281	0	%100
57	MP3C	X	-.487	-.487	0	%100
58	MP3C	Z	.281	.281	0	%100
59	MP4C	X	-.487	-.487	0	%100
60	MP4C	Z	.281	.281	0	%100
61	MP5C	X	-.487	-.487	0	%100
62	MP5C	Z	.281	.281	0	%100
63	M67	X	-.074	-.074	0	%100
64	M67	Z	.043	.043	0	%100
65	M68	X	-.074	-.074	0	%100
66	M68	Z	.043	.043	0	%100
67	M69	X	-.323	-.323	0	%100
68	M69	Z	.187	.187	0	%100
69	M70	X	-.907	-.907	0	%100
70	M70	Z	.524	.524	0	%100
71	M71	X	-.574	-.574	0	%100
72	M71	Z	.332	.332	0	%100



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**Member Distributed Loads (BLC 73 : Structure Wm (240 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
73	M72	X	-.907	-.907	0	%100
74	M72	Z	.524	.524	0	%100

**Member Distributed Loads (BLC 74 : Structure Wm (270 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-.987	-.987	0	%100
2	M40	Z	0	0	0	%100
3	M13	X	-.247	-.247	0	%100
4	M13	Z	0	0	0	%100
5	M14	X	-.247	-.247	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	-.74	-.74	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	-.74	-.74	0	%100
10	M19	Z	0	0	0	%100
11	M20A	X	0	0	0	%100
12	M20A	Z	0	0	0	%100
13	M21A	X	-.535	-.535	0	%100
14	M21A	Z	0	0	0	%100
15	M15A	X	-.535	-.535	0	%100
16	M15A	Z	0	0	0	%100
17	M17A	X	-.535	-.535	0	%100
18	M17A	Z	0	0	0	%100
19	M19A	X	-.535	-.535	0	%100
20	M19A	Z	0	0	0	%100
21	M21B	X	-.134	-.134	0	%100
22	M21B	Z	0	0	0	%100
23	M23	X	-.134	-.134	0	%100
24	M23	Z	0	0	0	%100
25	M25	X	-.134	-.134	0	%100
26	M25	Z	0	0	0	%100
27	M27	X	-.134	-.134	0	%100
28	M27	Z	0	0	0	%100
29	M29	X	-.134	-.134	0	%100
30	M29	Z	0	0	0	%100
31	M31	X	-.134	-.134	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	-.134	-.134	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	-.134	-.134	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	-.563	-.563	0	%100
38	MP1A	Z	0	0	0	%100
39	MP2A	X	-.563	-.563	0	%100
40	MP2A	Z	0	0	0	%100
41	MP3A	X	-.563	-.563	0	%100
42	MP3A	Z	0	0	0	%100
43	MP4A	X	-.563	-.563	0	%100
44	MP4A	Z	0	0	0	%100
45	MP1B	X	-.563	-.563	0	%100
46	MP1B	Z	0	0	0	%100
47	MP2B	X	-.563	-.563	0	%100
48	MP2B	Z	0	0	0	%100
49	MP3B	X	-.563	-.563	0	%100
50	MP3B	Z	0	0	0	%100
51	MP4B	X	-.563	-.563	0	%100



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 Job Number :  
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**Member Distributed Loads (BLC 74 : Structure Wm (270 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
52	MP4B	Z	0	0	0	%100
53	MP1C	X	-563	-563	0	%100
54	MP1C	Z	0	0	0	%100
55	MP2C	X	-563	-563	0	%100
56	MP2C	Z	0	0	0	%100
57	MP3C	X	-563	-563	0	%100
58	MP3C	Z	0	0	0	%100
59	MP4C	X	-563	-563	0	%100
60	MP4C	Z	0	0	0	%100
61	MP5C	X	-563	-563	0	%100
62	MP5C	Z	0	0	0	%100
63	M67	X	-064	-064	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	-064	-064	0	%100
66	M68	Z	0	0	0	%100
67	M69	X	-373	-373	0	%100
68	M69	Z	0	0	0	%100
69	M70	X	-1.176	-1.176	0	%100
70	M70	Z	0	0	0	%100
71	M71	X	-791	-791	0	%100
72	M71	Z	0	0	0	%100
73	M72	X	-791	-791	0	%100
74	M72	Z	0	0	0	%100

**Member Distributed Loads (BLC 75 : Structure Wm (300 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-.641	-.641	0	%100
2	M40	Z	-.37	-.37	0	%100
3	M13	X	-.641	-.641	0	%100
4	M13	Z	-.37	-.37	0	%100
5	M14	X	0	0	0	%100
6	M14	Z	0	0	0	%100
7	M21	X	-.214	-.214	0	%100
8	M21	Z	-.123	-.123	0	%100
9	M19	X	-.855	-.855	0	%100
10	M19	Z	-.494	-.494	0	%100
11	M20A	X	-.214	-.214	0	%100
12	M20A	Z	-.123	-.123	0	%100
13	M21A	X	-.348	-.348	0	%100
14	M21A	Z	-.201	-.201	0	%100
15	M15A	X	-.348	-.348	0	%100
16	M15A	Z	-.201	-.201	0	%100
17	M17A	X	-.348	-.348	0	%100
18	M17A	Z	-.201	-.201	0	%100
19	M19A	X	-.348	-.348	0	%100
20	M19A	Z	-.201	-.201	0	%100
21	M21B	X	-.348	-.348	0	%100
22	M21B	Z	-.201	-.201	0	%100
23	M23	X	-.348	-.348	0	%100
24	M23	Z	-.201	-.201	0	%100
25	M25	X	-.348	-.348	0	%100
26	M25	Z	-.201	-.201	0	%100
27	M27	X	-.348	-.348	0	%100
28	M27	Z	-.201	-.201	0	%100
29	M29	X	0	0	0	%100
30	M29	Z	0	0	0	%100



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

Nov 27, 2023  
 11:30 AM  
 Checked By: \_\_\_\_\_

**Member Distributed Loads (BLC 75 : Structure Wm (300 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
31	M31	X	0	0	0	%100
32	M31	Z	0	0	0	%100
33	M33	X	0	0	0	%100
34	M33	Z	0	0	0	%100
35	M35	X	0	0	0	%100
36	M35	Z	0	0	0	%100
37	MP1A	X	-487	-487	0	%100
38	MP1A	Z	-281	-281	0	%100
39	MP2A	X	-487	-487	0	%100
40	MP2A	Z	-281	-281	0	%100
41	MP3A	X	-487	-487	0	%100
42	MP3A	Z	-281	-281	0	%100
43	MP4A	X	-487	-487	0	%100
44	MP4A	Z	-281	-281	0	%100
45	MP1B	X	-487	-487	0	%100
46	MP1B	Z	-281	-281	0	%100
47	MP2B	X	-487	-487	0	%100
48	MP2B	Z	-281	-281	0	%100
49	MP3B	X	-487	-487	0	%100
50	MP3B	Z	-281	-281	0	%100
51	MP4B	X	-487	-487	0	%100
52	MP4B	Z	-281	-281	0	%100
53	MP1C	X	-487	-487	0	%100
54	MP1C	Z	-281	-281	0	%100
55	MP2C	X	-487	-487	0	%100
56	MP2C	Z	-281	-281	0	%100
57	MP3C	X	-487	-487	0	%100
58	MP3C	Z	-281	-281	0	%100
59	MP4C	X	-487	-487	0	%100
60	MP4C	Z	-281	-281	0	%100
61	MP5C	X	-487	-487	0	%100
62	MP5C	Z	-281	-281	0	%100
63	M67	X	-019	-019	0	%100
64	M67	Z	-011	-011	0	%100
65	M68	X	-019	-019	0	%100
66	M68	Z	-011	-011	0	%100
67	M69	X	-323	-323	0	%100
68	M69	Z	-187	-187	0	%100
69	M70	X	-907	-907	0	%100
70	M70	Z	-524	-524	0	%100
71	M71	X	-907	-907	0	%100
72	M71	Z	-524	-524	0	%100
73	M72	X	-574	-574	0	%100
74	M72	Z	-332	-332	0	%100

**Member Distributed Loads (BLC 76 : Structure Wm (330 Deg))**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M40	X	-123	-123	0	%100
2	M40	Z	-214	-214	0	%100
3	M13	X	-494	-494	0	%100
4	M13	Z	-855	-855	0	%100
5	M14	X	-123	-123	0	%100
6	M14	Z	-214	-214	0	%100
7	M21	X	0	0	0	%100
8	M21	Z	0	0	0	%100
9	M19	X	-37	-37	0	%100



**Member Distributed Loads (BLC 76 : Structure Wm (330 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft,%]	End Location[ft,%]
10	M19	Z	-641	-641	0	%100
11	M20A	X	-.37	-.37	0	%100
12	M20A	Z	-641	-641	0	%100
13	M21A	X	-.067	-.067	0	%100
14	M21A	Z	-.116	-.116	0	%100
15	M15A	X	-.067	-.067	0	%100
16	M15A	Z	-.116	-.116	0	%100
17	M17A	X	-.067	-.067	0	%100
18	M17A	Z	-.116	-.116	0	%100
19	M19A	X	-.067	-.067	0	%100
20	M19A	Z	-.116	-.116	0	%100
21	M21B	X	-.268	-.268	0	%100
22	M21B	Z	-.464	-.464	0	%100
23	M23	X	-.268	-.268	0	%100
24	M23	Z	-.464	-.464	0	%100
25	M25	X	-.268	-.268	0	%100
26	M25	Z	-.464	-.464	0	%100
27	M27	X	-.268	-.268	0	%100
28	M27	Z	-.464	-.464	0	%100
29	M29	X	-.067	-.067	0	%100
30	M29	Z	-.116	-.116	0	%100
31	M31	X	-.067	-.067	0	%100
32	M31	Z	-.116	-.116	0	%100
33	M33	X	-.067	-.067	0	%100
34	M33	Z	-.116	-.116	0	%100
35	M35	X	-.067	-.067	0	%100
36	M35	Z	-.116	-.116	0	%100
37	MP1A	X	-.281	-.281	0	%100
38	MP1A	Z	-.487	-.487	0	%100
39	MP2A	X	-.281	-.281	0	%100
40	MP2A	Z	-.487	-.487	0	%100
41	MP3A	X	-.281	-.281	0	%100
42	MP3A	Z	-.487	-.487	0	%100
43	MP4A	X	-.281	-.281	0	%100
44	MP4A	Z	-.487	-.487	0	%100
45	MP1B	X	-.281	-.281	0	%100
46	MP1B	Z	-.487	-.487	0	%100
47	MP2B	X	-.281	-.281	0	%100
48	MP2B	Z	-.487	-.487	0	%100
49	MP3B	X	-.281	-.281	0	%100
50	MP3B	Z	-.487	-.487	0	%100
51	MP4B	X	-.281	-.281	0	%100
52	MP4B	Z	-.487	-.487	0	%100
53	MP1C	X	-.281	-.281	0	%100
54	MP1C	Z	-.487	-.487	0	%100
55	MP2C	X	-.281	-.281	0	%100
56	MP2C	Z	-.487	-.487	0	%100
57	MP3C	X	-.281	-.281	0	%100
58	MP3C	Z	-.487	-.487	0	%100
59	MP4C	X	-.281	-.281	0	%100
60	MP4C	Z	-.487	-.487	0	%100
61	MP5C	X	-.281	-.281	0	%100
62	MP5C	Z	-.487	-.487	0	%100
63	M67	X	0	0	0	%100
64	M67	Z	0	0	0	%100
65	M68	X	0	0	0	%100
66	M68	Z	0	0	0	%100



**Member Distributed Loads (BLC 76 : Structure Wm (330 Deg)) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
67	M69	X	-187	-187	0	%100
68	M69	Z	-323	-323	0	%100
69	M70	X	-396	-396	0	%100
70	M70	Z	-685	-685	0	%100
71	M71	X	-588	-588	0	%100
72	M71	Z	-1.018	-1.018	0	%100
73	M72	X	-396	-396	0	%100
74	M72	Z	-685	-685	0	%100

**Member Distributed Loads (BLC 87 : BLC 39 Transient Area Loads)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M21A	Y	-18	-18	1.089e-13	1
2	M15A	Y	-36	-36	2.549e-13	1
3	M17A	Y	-36	-36	0	1
4	M19A	Y	-18	-18	0	1
5	M29	Y	-18	-18	0	1
6	M31	Y	-36	-36	2.779e-13	1
7	M33	Y	-36	-36	5.131e-13	1
8	M35	Y	-18	-18	1.425e-13	1
9	M21B	Y	-18	-18	0	1
10	M23	Y	-36	-36	0	1
11	M25	Y	-36	-36	1.435e-12	1
12	M27	Y	-18	-18	5.571e-14	1

**Member Distributed Loads (BLC 88 : BLC 40 Transient Area Loads)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M21A	Y	-30	-30	1.089e-13	1
2	M15A	Y	-60	-60	2.549e-13	1
3	M17A	Y	-60	-60	0	1
4	M19A	Y	-30	-30	0	1
5	M29	Y	-30	-30	0	1
6	M31	Y	-60	-60	2.779e-13	1
7	M33	Y	-60	-60	5.131e-13	1
8	M35	Y	-30	-30	1.425e-13	1
9	M21B	Y	-30	-30	0	1
10	M23	Y	-60	-60	0	1
11	M25	Y	-60	-60	1.435e-12	1
12	M27	Y	-30	-30	5.571e-14	1

**Member Distributed Loads (BLC 89 : BLC 84 Transient Area Loads)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M20A	Y	-.055	-.161	3.237	3.737
2	M20A	Y	-.161	-.214	3.737	4.237
3	M20A	Y	-.214	-.214	4.237	4.737
4	M20A	Y	-.214	-.214	4.737	5.237
5	M20A	Y	-.214	-.161	5.237	5.737
6	M20A	Y	-.161	-.055	5.737	6.237
7	M20A	Y	-.055	-.002	6.237	6.737
8	M20A	Y	-.002	-.055	6.737	7.237
9	M20A	Y	-.055	-.161	7.237	7.737
10	M20A	Y	-.161	-.214	7.737	8.237
11	M20A	Y	-.214	-.214	8.237	8.737
12	M20A	Y	-.214	-.214	8.737	9.237
13	M20A	Y	-.214	-.161	9.237	9.737
14	M20A	Y	-.161	-.055	9.737	10.237



**Member Distributed Loads (BLC 89 : BLC 84 Transient Area Loads) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft...	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
15	M20A	Y	-055	-002	10.237	10.737
16	M20A	Y	-002	-055	10.737	11.237
17	M20A	Y	-055	-161	11.237	11.737
18	M20A	Y	-161	-214	11.737	12.237
19	M20A	Y	-214	-214	12.237	12.737
20	M20A	Y	-214	-214	12.737	13.237
21	M20A	Y	-214	-161	13.237	13.737
22	M20A	Y	-161	-055	13.737	14.237
23	M21A	Y	-159	-159	1.443e-14	1
24	M15A	Y	-318	-318	3.482e-13	1
25	M17A	Y	-318	-318	0	1
26	M19A	Y	-159	-159	0	1
27	M19	Y	-055	-161	3.237	3.737
28	M19	Y	-161	-214	3.737	4.237
29	M19	Y	-214	-214	4.237	4.737
30	M19	Y	-214	-214	4.737	5.237
31	M19	Y	-214	-161	5.237	5.737
32	M19	Y	-161	-055	5.737	6.237
33	M19	Y	-055	-002	6.237	6.737
34	M19	Y	-002	-055	6.737	7.237
35	M19	Y	-055	-161	7.237	7.737
36	M19	Y	-161	-214	7.737	8.237
37	M19	Y	-214	-214	8.237	8.737
38	M19	Y	-214	-214	8.737	9.237
39	M19	Y	-214	-161	9.237	9.737
40	M19	Y	-161	-055	9.737	10.237
41	M19	Y	-055	-002	10.237	10.737
42	M19	Y	-002	-055	10.737	11.237
43	M19	Y	-055	-161	11.237	11.737
44	M19	Y	-161	-214	11.737	12.237
45	M19	Y	-214	-214	12.237	12.737
46	M19	Y	-214	-214	12.737	13.237
47	M19	Y	-214	-161	13.237	13.737
48	M19	Y	-161	-055	13.737	14.237
49	M29	Y	-159	-159	7.216e-16	1
50	M31	Y	-318	-318	5.723e-14	1
51	M33	Y	-318	-318	2.912e-13	1
52	M35	Y	-159	-159	7.1e-14	1
53	M21	Y	-055	-161	3.237	3.737
54	M21	Y	-161	-214	3.737	4.237
55	M21	Y	-214	-214	4.237	4.737
56	M21	Y	-214	-214	4.737	5.237
57	M21	Y	-214	-161	5.237	5.737
58	M21	Y	-161	-055	5.737	6.237
59	M21	Y	-055	-002	6.237	6.737
60	M21	Y	-002	-055	6.737	7.237
61	M21	Y	-055	-161	7.237	7.737
62	M21	Y	-161	-214	7.737	8.237
63	M21	Y	-214	-214	8.237	8.737
64	M21	Y	-214	-214	8.737	9.237
65	M21	Y	-214	-161	9.237	9.737
66	M21	Y	-161	-055	9.737	10.237
67	M21	Y	-055	-002	10.237	10.737
68	M21	Y	-002	-055	10.737	11.237
69	M21	Y	-055	-161	11.237	11.737
70	M21	Y	-161	-214	11.737	12.237
71	M21	Y	-214	-214	12.237	12.737





**Member Distributed Loads (BLC 89 : BLC 84 Transient Area Loads) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
72	M21	Y	-214	-214	12.737	13.237
73	M21	Y	-214	-161	13.237	13.737
74	M21	Y	-161	-055	13.737	14.237
75	M21B	Y	-159	-159	0	1
76	M23	Y	-318	-318	0	1
77	M25	Y	-318	-318	6.331e-13	1
78	M27	Y	-159	-159	2.656e-14	1

**Member Distributed Loads (BLC 90 : BLC 85 Transient Area Loads)**

	Member Label	Direction	Start Magnitude[lb/ft....]	End Magnitude[lb/ft.F...]	Start Location[ft.%]	End Location[ft.%]
1	M20A	Z	-139	-404	3.237	3.737
2	M20A	Z	-404	-536	3.737	4.237
3	M20A	Z	-536	-536	4.237	4.737
4	M20A	Z	-536	-536	4.737	5.237
5	M20A	Z	-536	-404	5.237	5.737
6	M20A	Z	-404	-139	5.737	6.237
7	M20A	Z	-139	-006	6.237	6.737
8	M20A	Z	-006	-139	6.737	7.237
9	M20A	Z	-139	-404	7.237	7.737
10	M20A	Z	-404	-536	7.737	8.237
11	M20A	Z	-536	-536	8.237	8.737
12	M20A	Z	-536	-536	8.737	9.237
13	M20A	Z	-536	-404	9.237	9.737
14	M20A	Z	-404	-139	9.737	10.237
15	M20A	Z	-139	-006	10.237	10.737
16	M20A	Z	-006	-139	10.737	11.237
17	M20A	Z	-139	-404	11.237	11.737
18	M20A	Z	-404	-536	11.737	12.237
19	M20A	Z	-536	-536	12.237	12.737
20	M20A	Z	-536	-536	12.737	13.237
21	M20A	Z	-536	-404	13.237	13.737
22	M20A	Z	-404	-139	13.737	14.237
23	M21A	Z	-398	-398	1.443e-14	1
24	M15A	Z	-795	-795	3.482e-13	1
25	M17A	Z	-795	-795	0	1
26	M19A	Z	-397	-397	0	1
27	M19	Z	-139	-404	3.237	3.737
28	M19	Z	-404	-536	3.737	4.237
29	M19	Z	-536	-536	4.237	4.737
30	M19	Z	-536	-536	4.737	5.237
31	M19	Z	-536	-404	5.237	5.737
32	M19	Z	-404	-139	5.737	6.237
33	M19	Z	-139	-006	6.237	6.737
34	M19	Z	-006	-139	6.737	7.237
35	M19	Z	-139	-404	7.237	7.737
36	M19	Z	-404	-536	7.737	8.237
37	M19	Z	-536	-536	8.237	8.737
38	M19	Z	-536	-536	8.737	9.237
39	M19	Z	-536	-404	9.237	9.737
40	M19	Z	-404	-139	9.737	10.237
41	M19	Z	-139	-006	10.237	10.737
42	M19	Z	-006	-139	10.737	11.237
43	M19	Z	-139	-404	11.237	11.737
44	M19	Z	-404	-536	11.737	12.237
45	M19	Z	-536	-536	12.237	12.737
46	M19	Z	-536	-536	12.737	13.237



**Member Distributed Loads (BLC 90 : BLC 85 Transient Area Loads) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
47	M19	Z	-536	-404	13.237	13.737
48	M19	Z	-404	-139	13.737	14.237
49	M29	Z	-398	-398	7.216e-16	1
50	M31	Z	-795	-795	5.723e-14	1
51	M33	Z	-795	-795	2.912e-13	1
52	M35	Z	-398	-398	7.1e-14	1
53	M21	Z	-139	-404	3.237	3.737
54	M21	Z	-404	-536	3.737	4.237
55	M21	Z	-536	-536	4.237	4.737
56	M21	Z	-536	-536	4.737	5.237
57	M21	Z	-536	-404	5.237	5.737
58	M21	Z	-404	-139	5.737	6.237
59	M21	Z	-139	-006	6.237	6.737
60	M21	Z	-006	-139	6.737	7.237
61	M21	Z	-139	-404	7.237	7.737
62	M21	Z	-404	-536	7.737	8.237
63	M21	Z	-536	-536	8.237	8.737
64	M21	Z	-536	-536	8.737	9.237
65	M21	Z	-536	-404	9.237	9.737
66	M21	Z	-404	-139	9.737	10.237
67	M21	Z	-139	-006	10.237	10.737
68	M21	Z	-006	-139	10.737	11.237
69	M21	Z	-139	-404	11.237	11.737
70	M21	Z	-404	-536	11.737	12.237
71	M21	Z	-536	-536	12.237	12.737
72	M21	Z	-536	-536	12.737	13.237
73	M21	Z	-536	-404	13.237	13.737
74	M21	Z	-404	-139	13.737	14.237
75	M21B	Z	-398	-398	0	1
76	M23	Z	-795	-795	0	1
77	M25	Z	-795	-795	6.331e-13	1
78	M27	Z	-398	-398	2.656e-14	1

**Member Distributed Loads (BLC 91 : BLC 86 Transient Area Loads)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
1	M20A	X	.139	.404	3.237	3.737
2	M20A	X	.404	.536	3.737	4.237
3	M20A	X	.536	.536	4.237	4.737
4	M20A	X	.536	.536	4.737	5.237
5	M20A	X	.536	.404	5.237	5.737
6	M20A	X	.404	.139	5.737	6.237
7	M20A	X	.139	.006	6.237	6.737
8	M20A	X	.006	.139	6.737	7.237
9	M20A	X	.139	.404	7.237	7.737
10	M20A	X	.404	.536	7.737	8.237
11	M20A	X	.536	.536	8.237	8.737
12	M20A	X	.536	.536	8.737	9.237
13	M20A	X	.536	.404	9.237	9.737
14	M20A	X	.404	.139	9.737	10.237
15	M20A	X	.139	.006	10.237	10.737
16	M20A	X	.006	.139	10.737	11.237
17	M20A	X	.139	.404	11.237	11.737
18	M20A	X	.404	.536	11.737	12.237
19	M20A	X	.536	.536	12.237	12.737
20	M20A	X	.536	.536	12.737	13.237
21	M20A	X	.536	.404	13.237	13.737



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

Nov 27, 2023  
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 Checked By: \_\_\_\_\_

**Member Distributed Loads (BLC 91 : BLC 86 Transient Area Loads) (Continued)**

	Member Label	Direction	Start Magnitude[lb/ft....	End Magnitude[lb/ft.F...	Start Location[ft.%]	End Location[ft.%]
22	M20A	X	.404	.139	13.737	14.237
23	M21A	X	.398	.398	1.443e-14	1
24	M15A	X	.795	.795	3.482e-13	1
25	M17A	X	.795	.795	0	1
26	M19A	X	.397	.397	0	1
27	M19	X	.139	.404	3.237	3.737
28	M19	X	.404	.536	3.737	4.237
29	M19	X	.536	.536	4.237	4.737
30	M19	X	.536	.536	4.737	5.237
31	M19	X	.536	.404	5.237	5.737
32	M19	X	.404	.139	5.737	6.237
33	M19	X	.139	.006	6.237	6.737
34	M19	X	.006	.139	6.737	7.237
35	M19	X	.139	.404	7.237	7.737
36	M19	X	.404	.536	7.737	8.237
37	M19	X	.536	.536	8.237	8.737
38	M19	X	.536	.536	8.737	9.237
39	M19	X	.536	.404	9.237	9.737
40	M19	X	.404	.139	9.737	10.237
41	M19	X	.139	.006	10.237	10.737
42	M19	X	.006	.139	10.737	11.237
43	M19	X	.139	.404	11.237	11.737
44	M19	X	.404	.536	11.737	12.237
45	M19	X	.536	.536	12.237	12.737
46	M19	X	.536	.536	12.737	13.237
47	M19	X	.536	.404	13.237	13.737
48	M19	X	.404	.139	13.737	14.237
49	M29	X	.398	.398	7.216e-16	1
50	M31	X	.795	.795	5.723e-14	1
51	M33	X	.795	.795	2.912e-13	1
52	M35	X	.398	.398	7.1e-14	1
53	M21	X	.139	.404	3.237	3.737
54	M21	X	.404	.536	3.737	4.237
55	M21	X	.536	.536	4.237	4.737
56	M21	X	.536	.536	4.737	5.237
57	M21	X	.536	.404	5.237	5.737
58	M21	X	.404	.139	5.737	6.237
59	M21	X	.139	.006	6.237	6.737
60	M21	X	.006	.139	6.737	7.237
61	M21	X	.139	.404	7.237	7.737
62	M21	X	.404	.536	7.737	8.237
63	M21	X	.536	.536	8.237	8.737
64	M21	X	.536	.536	8.737	9.237
65	M21	X	.536	.404	9.237	9.737
66	M21	X	.404	.139	9.737	10.237
67	M21	X	.139	.006	10.237	10.737
68	M21	X	.006	.139	10.737	11.237
69	M21	X	.139	.404	11.237	11.737
70	M21	X	.404	.536	11.737	12.237
71	M21	X	.536	.536	12.237	12.737
72	M21	X	.536	.536	12.737	13.237
73	M21	X	.536	.404	13.237	13.737
74	M21	X	.404	.139	13.737	14.237
75	M21B	X	.398	.398	0	1
76	M23	X	.795	.795	0	1
77	M25	X	.795	.795	6.331e-13	1
78	M27	X	.398	.398	2.656e-14	1



**Member Area Loads (BLC 39 : Structure D)**

	Joint A	Joint B	Joint C	Joint D	Direction	Distribution	Magnitude[ksf]
1	N34	N35	N31A	N30B	Y	B-C	-0.009
2	N52	N51	N45	N46	Y	B-C	-0.009
3	N40	N39	N33B	N34A	Y	B-C	-0.009

**Member Area Loads (BLC 40 : Structure Di)**

	Joint A	Joint B	Joint C	Joint D	Direction	Distribution	Magnitude[ksf]
1	N34	N35	N31A	N30B	Y	B-C	-0.015
2	N52	N51	N45	N46	Y	B-C	-0.015
3	N40	N39	N33B	N34A	Y	B-C	-0.015

**Member Area Loads (BLC 84 : Structure Ev)**

	Joint A	Joint B	Joint C	Joint D	Direction	Distribution	Magnitude[ksf]
1	N34	N35	N31A	N30B	Y	Two Way	-0.000212
2	N52	N51	N45	N46	Y	Two Way	-0.000212
3	N40	N39	N33B	N34A	Y	Two Way	-0.000212

**Member Area Loads (BLC 85 : Structure Eh (0 Deg))**

	Joint A	Joint B	Joint C	Joint D	Direction	Distribution	Magnitude[ksf]
1	N34	N35	N31A	N30B	Z	Two Way	-0.00053
2	N52	N51	N45	N46	Z	Two Way	-0.00053
3	N40	N39	N33B	N34A	Z	Two Way	-0.00053

**Member Area Loads (BLC 86 : Structure Eh (90 Deg))**

	Joint A	Joint B	Joint C	Joint D	Direction	Distribution	Magnitude[ksf]
1	N34	N35	N31A	N30B	X	Two Way	.00053
2	N52	N51	N45	N46	X	Two Way	.00053
3	N40	N39	N33B	N34A	X	Two Way	.00053

**Envelope Joint Reactions**

Joint		X [lb]	LC	Y [lb]	LC	Z [lb]	LC	MX [k-ft]	LC	MY [k-ft]	LC	MZ [k-ft]	LC	
1	N47A	max	471.801	10	-4.928	7	4178.489	1	-0.021	8	1.361	4	.57	3
2		min	-471.94	4	-591.402	13	-1639.028	7	-0.872	13	-1.36	10	-0.597	9
3	N20	max	3432.459	9	-15.622	3	916.636	3	.572	11	1.058	11	.836	19
4		min	-1401.25	3	-563.993	21	-2094.092	9	-0.378	5	-1.056	5	.018	1
5	N22	max	1380.398	11	-18.105	11	747.31	12	.801	2	1.435	7	.151	12
6		min	-3551.718	5	-598.643	29	-2001.742	6	-0.292	8	-1.437	1	-0.805	30
7	N114	max	55.283	10	3618.241	13	-1276.516	7	0	75	0	75	0	75
8		min	-55.286	4	890.864	7	-5093.311	13	0	1	0	1	0	1
9	N116	max	-1056.748	3	3465.099	21	2436.863	21	0	75	0	75	0	75
10		min	-4219.322	21	851.491	3	609.243	3	0	1	0	1	0	1
11	N118	max	4319.486	17	3544.922	17	2493.588	17	0	75	0	75	0	75
12		min	1125.568	11	907.168	11	650.478	11	0	1	0	1	0	1
13	Totals:	max	3978.414	10	8639.968	21	4005.109	1						
14		min	-3978.426	4	2507.907	66	-4005.069	7						

**Envelope AISC 15th(360-16): LRFD Steel Code Checks**

Member	Shape	Code Check	Loc[ft]	LC Shear ...	Loc[ft]	Dir	LC phi*Pnc ...	phi*Pnt [...]	phi*Mn y ...	phi*Mn z ...	Cb	Eqn		
1	M40	HSS4X4X4	.384	8.021	22	.087	5.104	y	22	91806.5...	139518	16.181	16.181	1...H1-1b
2	M13	HSS4X4X4	.359	8.021	24	.089	5.104	y	18	91806.5...	139518	16.181	16.181	1...H1-1b
3	M14	HSS4X4X4	.377	8.021	20	.098	5.104	y	14	91806.5...	139518	16.181	16.181	1...H1-1b
4	M21	HSS4X4X4	.259	0	21	.107	0	z	2	40074.0...	139518	16.181	16.181	2...H1-1b



Company : Colliers Engineering & Design  
 Designer :  
 Job Number :  
 Model Name : 5000176778-VZW\_MT\_LO\_H

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 Checked By: \_\_\_\_\_

**Envelope AISC 15th(360-16): LRFD Steel Code Checks (Continued)**

Member	Shape	Code Check	Loc[ft]	LC Shear	Loc[ft]	Dir	LC	phi*Pnc	phi*Pnt	phi*Mn y	phi*Mn z	Cb	Eqn	
5	M19	HSS4X4X4	.247	0	17 .082	0	z	10	40074.0...	139518	16.181	16.181	2...	H1-1b
6	M20A	HSS4X4X4	.240	0	13 .082	0	z	12	40074.0...	139518	16.181	16.181	2...	H1-1b
7	M21A	L2x2x3	.059	0	22 .009	0	y	22	22249.7...	23392.8	.558	1.239	2...	H2-1
8	M15A	L2x2x3	.107	0	22 .016	0	y	22	22249.7...	23392.8	.558	1.239	2...	H2-1
9	M17A	L2x2x3	.107	0	16 .016	0	z	17	22249.7...	23392.8	.558	1.239	2...	H2-1
10	M19A	L2x2x3	.059	0	16 .009	0	z	17	22249.7...	23392.8	.558	1.239	2...	H2-1
11	M21B	L2x2x3	.059	0	18 .009	0	y	24	22249.7...	23392.8	.558	1.239	2...	H2-1
12	M23	L2x2x3	.107	0	18 .016	0	y	24	22249.7...	23392.8	.558	1.239	2...	H2-1
13	M25	L2x2x3	.107	0	24 .016	0	z	24	22249.7...	23392.8	.558	1.239	2...	H2-1
14	M27	L2x2x3	.059	0	24 .009	0	z	13	22249.7...	23392.8	.558	1.239	2...	H2-1
15	M29	L2x2x3	.059	0	14 .009	0	y	23	22249.7...	23392.8	.558	1.239	2...	H2-1
16	M31	L2x2x3	.107	0	14 .016	0	y	13	22249.7...	23392.8	.558	1.239	2...	H2-1
17	M33	L2x2x3	.107	0	20 .016	0	z	21	22249.7...	23392.8	.558	1.239	2...	H2-1
18	M35	L2x2x3	.059	0	20 .009	0	z	21	22249.7...	23392.8	.558	1.239	2...	H2-1
19	MP1A	PIPE 2.0	.248	4.516	11 .044	4.516	12	13511.2...	32130	1.872	1.872	1...	H1-1b	
20	MP2A	PIPE 2.0	.453	4.516	11 .052	4.516	12	13511.2...	32130	1.872	1.872	1...	H1-1b	
21	MP3A	PIPE 2.0	.299	4.74	5 .036	4.74	3	17855.0...	32130	1.872	1.872	2...	H1-1b	
22	MP4A	PIPE 2.0	.315	4.604	11 .048	4.604	3	13511.2...	32130	1.872	1.872	1...	H1-1b	
23	MP1B	PIPE 2.0	.248	4.516	3 .044	4.516	4	13511.2...	32130	1.872	1.872	1...	H1-1b	
24	MP2B	PIPE 2.0	.453	4.516	3 .052	4.516	4	13511.2...	32130	1.872	1.872	1...	H1-1b	
25	MP3B	PIPE 2.0	.299	4.74	9 .036	4.74	7	17855.0...	32130	1.872	1.872	2...	H1-1b	
26	MP4B	PIPE 2.0	.315	4.604	3 .048	4.604	7	13511.2...	32130	1.872	1.872	1...	H1-1b	
27	MP1C	PIPE 2.0	.272	4.693	7 .043	4.693	8	13511.2...	32130	1.872	1.872	1...	H1-1b	
28	MP2C	PIPE 2.0	.110	4.693	4 .011	4.693	3	13511.2...	32130	1.872	1.872	1...	H1-1b	
29	MP3C	PIPE 2.0	.588	4.693	1 .049	4.781	2	13511.2...	32130	1.872	1.872	1...	H1-1b	
30	MP4C	PIPE 2.0	.301	4.74	1 .036	4.74	11	17855.0...	32130	1.872	1.872	2...	H1-1b	
31	MP5C	PIPE 2.0	.318	4.604	7 .047	4.604	3	13511.2...	32130	1.872	1.872	1...	H1-1b	
32	M67	SR 0.5	.421	0	6 .536	.417	9	5827.173	6350.4	.052	.052	1...	H1-1b	
33	M68	SR 0.5	.315	.417	7 .136	.417	7	5827.173	6350.4	.052	.052	1...	H1-1b	
34	M69	PIPE 1.5	.022	2.24	4 .003	2.24	4	20972.6...	23593.5	1.105	1.105	1...	H1-1b	
35	M70	LL3x3x3x6	.136	6.137	13 .003	6.137	y	24	46068.0...	70632	6.362	3.751	1	H1-1b*
36	M71	LL3x3x3x6	.130	6.137	21 .003	0	y	22	46068.0...	70632	6.362	3.751	1	H1-1b*
37	M72	LL3x3x3x6	.133	6.137	17 .003	0	y	18	46068.0...	70632	6.362	3.751	1	H1-1b*

**I. Mount-to-Tower Connection Check**

Custom Orientation Required

No

Tower Connection Bolt Checks

Yes

Bolt Orientation

Parallel

Bolt Quantity per Reaction:

4

$d_x$  (in) (Delta X of typ. bolt config. sketch):

3

$d_y$  (in) (Delta Y of typ. bolt config. sketch):

8

Bolt Type:

A307

Bolt Diameter (in):

0.75

Required Tensile Strength / bolt (kips):

3.9

Required Shear Strength / bolt (kips):

0.4

Tensile Capacity / bolt (kips):

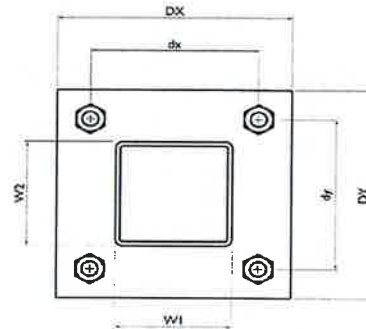
14.9

Shear Capacity / bolt (kips):

8.9

Bolt Overall Utilization:

**26.0%**



Tower Connection Baseplate Checks

Yes

Connecting Standoff Member Shape:

Rect Tube

Weld Stiffener Configuration:

No Stiffeners

Plate Width,  $D_x$  (in):

6

Plate Height,  $D_y$  (in):

10

$W_1$  (in):

4

$W_2$  (in):

4

Member Thickness (in):

0.25

Stiffener location  $a_1$  (in):

Stiffener location  $b_1$  (in):

Stiffener location  $a_2$  (in):

Stiffener location  $b_2$  (in):

$F_y$  (ksi, plate):

36

Plate Thickness (in):

0.5

Length of Yield Line,  $L_y$  (in):

4.90

Bolt Eccentricity,  $e$  (in):

1.86

$M_u$  (kip-in):

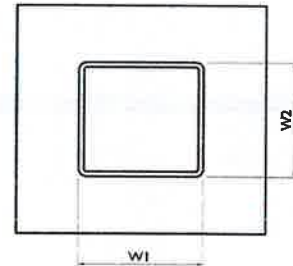
7.21

$\Phi * M_n$  (kip-in):

9.92

Plate Bending Utilization:

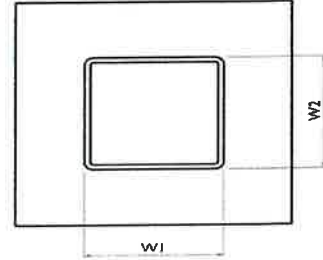
**72.7%**



Tower Connection Weld Checks

Weld Shape:  
Weld Stiffener Configuration:  
Stiffener Notch Length, n (in):  
Weld Size (1/16 in):  
W1 (in):  
W2 (in):  
Weld Total Length (in):  
 $Z_x$  (in<sup>3</sup>/in):  
 $Z_y$  (in<sup>3</sup>/in):  
 $J_p$  (in<sup>4</sup>/in):  
 $c_x$  (in)  
 $c_y$  (in)  
Required combined strength (kip/in):  
Weld Capacity (kip/in):  
Weld Utilization:

Yes
Rectangle
None
4
4
4
16.00
21.33
21.33
85.33
2.25
2.25
0.84
5.57
<b>15.0%</b>



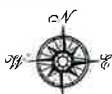
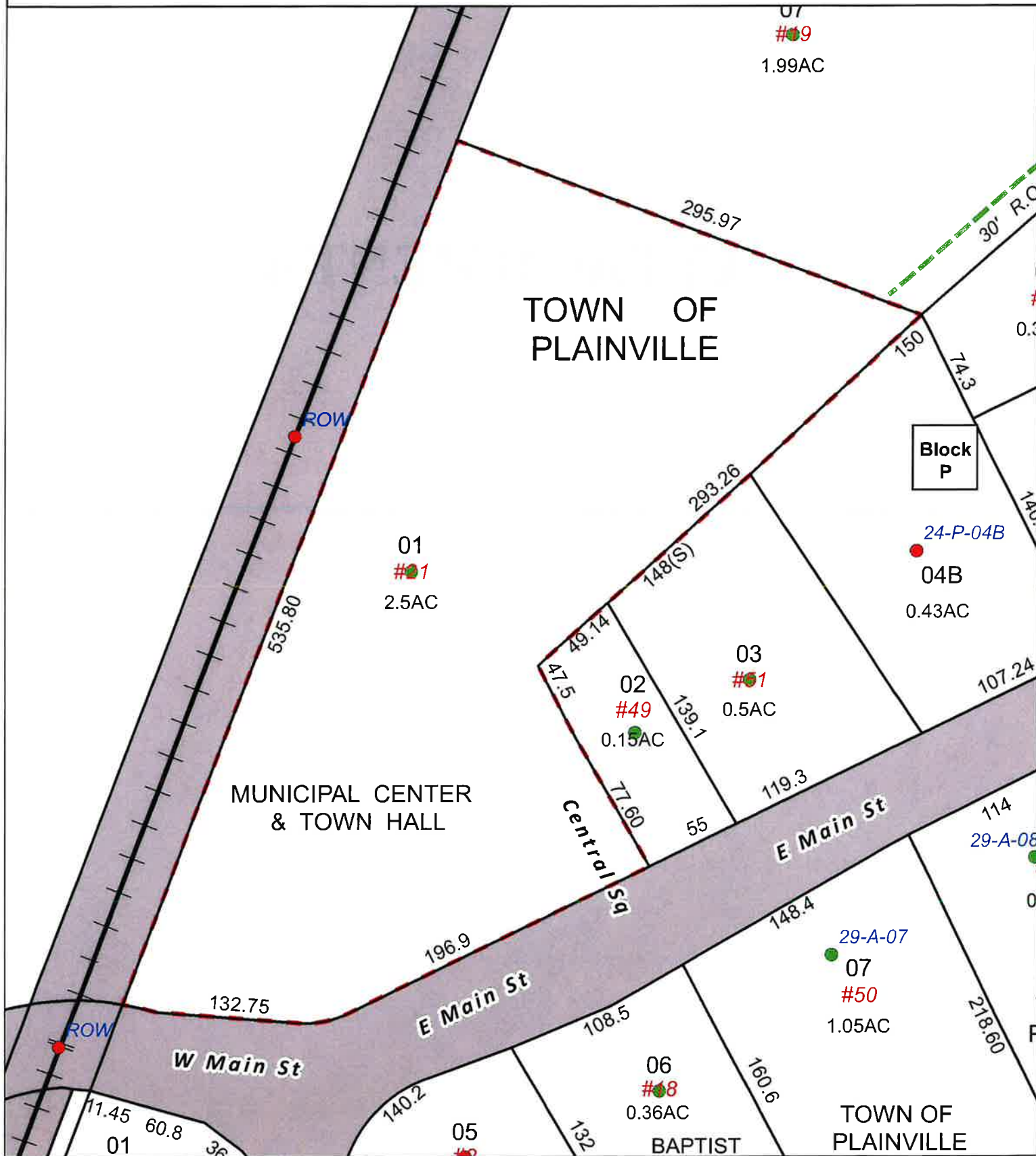
# **ATTACHMENT 4**



# Town of Plainville, Connecticut - Assessment Parcel Map

Parcel: 24-P-01

Address: 21 EAST MAIN ST



Approximate Scale:  
1 inch = 75 feet

Map Produced May 2023

Disclaimer: This map is for informational purposes only. All information is subject to verification by any user. The Town of Plainville and its mapping contractors assume no legal responsibility for the information contained herein.



# Town of Plainville, CT

## Property Listing Report

Map Block Lot 24-P-01

Developer Map

Unique Identifier R07119

Developer Lot

Building # 1

### Property Information

Property Location	21 EAST MAIN ST
Mailing Address	1 CENTRAL SQ PLAINVILLE CT 06062
Land Use	Town Owned
Zoning Code	CC
Neighborhood	810

Owner	PLAINVILLE TOWN OF
Co-Owner	
Book / Page	0173/0633
Land Class	Commercial
Census Tract	4202
Acreage	2.5

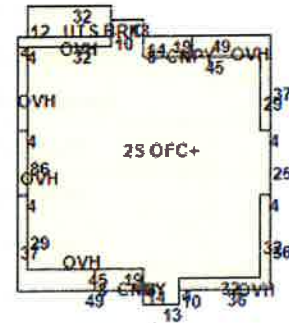
### Valuation Summary

(Assessed value = 70% of Appraised Value)

Item	Appraised	Assessed
Buildings	3371700	2360190
Outbuildings	1357400	950180
Land	384000	268800
<b>Total</b>	<b>5113100</b>	<b>3579170</b>

### Utility Information

Electric	No
Gas	No
Sewer	Yes
Public Water	Yes
Well	No



### Primary Construction Details

Year Built	1973
Building Desc.	Commercial
Building Style	
Stories	2
Exterior Walls	Brick Veneer
Exterior Walls 2	
Interior Walls	Normal
Interior Walls 2	
Interior Floors 1	
Interior Floors 2	

Heating Fuel	
Heating Type	Hot Air No
AC Type	Central
Bedrooms	0
Full Bathrooms	0
Half Bathrooms	0
Extra Fixtures	0
Total Rooms	0
Bath Style	NA
Kitchen Style	
Occupancy	0

Livable Area (ft)	17584
Building Use	Office Low
Building Condition	Average
Frame Type	A
Building Grade	-25
Fireplaces	0
Wood Stoves	0
Attic Access	
Roof Style	
Roof Cover	

Bsmt Area	0
Fin Bsmt Area	0
Fin Bsmt Quality	
Bsmt Access	
Bsmt Gar	0
Bsmt Sump Pump	No



# Town of Plainville, CT

## Property Listing Report

Map Block Lot **24-P-01**

Developer Map

Unique Identifier **R07119**

Developer Lot

Building # **1**

### Detached Outbuildings

Type	Description	Area (sq ft)	Condition	Year Built
Canopy	Canopy SS-Economy	304	Good	1973
Tower	Cell Tower	1190	Average	2003
Paving	Paving	50000	Good	1973

### Attached Extra Features

Type	Description	Area (sq ft)	Condition	Year Built
Canopy	Canopy Rf-Economy	152	Average	1973
Canopy	Overhang	272	Average	1973
Utility	Utility Bldg-Brk/Stn	384	Average	1973
Canopy	Overhang	508	Average	1973
Canopy	Canopy Rf-Economy	152	Average	1973
Canopy	Canopy Rf-Good	304	Average	1973
Canopy	Overhang	100	Average	1973
Canopy	Overhang	508	Average	1973
Canopy	Overhang	128	Average	1973
Canopy	Overhang	144	Average	1973

### Sales History

Owner of Record	Book/ Page	Sale Date	Sale Price
PLAINVILLE TOWN OF	0173_0633	11/19/1971	0
CENTRAL SQUARE REALTY CO INC	0158_0641	2/5/1968	0

# **ATTACHMENT 5**



Name and Address of Sender

Kenneth C. Baldwin, Esq.  
Robinson & Cole LLP  
280 Trumbull Street  
Hartford, CT 06103

TOTAL NO.  
of Pieces Listed by Sender

2

TOTAL NO.  
of Pieces Received at Post Office™

2

Affix Stamp Here  
Postmark with Date of Receipt.

quadrant  
CORRECTION  
IMI  
\$003.34<sup>0</sup>  
04/01/2024 ZIP 06101  
043M52206619



US POSTAGE

Postmaster, per (name of receiving employee)

[Signature]

USPS® Tracking Number  
Firm-specific Identifier

Address  
(Name, Street, City, State, and ZIP Code™)

1. Michael Paulhus, Town Manager  
Town of Plainville - Municipal Center  
One Central Square  
Plainville, CT 06062  
2. Mark DeVoe, Town Planner  
Town of Plainville - Municipal Center  
One Central Square  
Plainville, CT 06062

Postage

Fee

Special Handling

Parcel Airlift

1.

2.

3.

4.

5.

6.