

STATE OF CONNECTICUT

CONNECTICUT SITING COUNCIL

Ten Franklin Square, New Britain, CT 06051

Phone: (860) 827-2935 Fax: (860) 827-2950

E-Mail: siting.council@po.state.ct.us

www.ct.gov/csc

April 20, 2005

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

RE: **EM-VER-032-129-050316** -Cellco Partnership d/b/a Verizon Wireless notice of intent to modify an existing telecommunications facility located at 400 Riley Mountain Road, Coventry and 400 Main Street, Somers, Connecticut.

Dear Attorney Baldwin:

At a public meeting held on April 19, 2005, the Connecticut Siting Council (Council) acknowledged your notice to modify these existing telecommunications facilities, pursuant to Section 16-50j-73 of the Regulations of Connecticut State Agencies.

The proposed modifications are to be implemented as specified here and in your notice dated March 16, 2005, including the placement of all necessary equipment and shelters within the tower compounds. The modifications are in compliance with the exception criteria in Section 16-50j-72 (b) of the Regulations of Connecticut State Agencies as changes to existing facility sites that would not increase tower heights, extend the boundaries of the tower sites, increase noise levels at the tower site boundaries by six decibels, and increase the total radio frequencies electromagnetic radiation power densities measured at the tower site boundaries to or above the standard adopted by the State Department of Environmental Protection pursuant to General Statutes § 22a-162. These facilities have also been carefully modeled to ensure that radio frequency emissions are conservatively below State and federal standards applicable to the frequencies now used on these towers.

This decision is under the exclusive jurisdiction of the Council. Any additional change to any of these facilities will require explicit notice to this agency pursuant to Regulations of Connecticut State Agencies Section 16-50j-73. Such 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.

Thank you for your attention and cooperation.

Very truly yours,

Pamela B. Katz, P.E.

Chairman

PBK/laf

- c: The Honorable James E. Clark, Chairman Town Council, Town of Coventry
Eric M. Trott, Director of Planning & Development, Town of Coventry
The Honorable David A. Pinney, First Selectman, Town of Somers
Patrice Carson, Town Planner, Town of Somers
Jeffrey W. Barbadora, Crown Atlantic Company LLC
Thomas J. Regan, Brown Rudnick Berlack Israels, LLP
Stephen J. Humes, Esq., McCarter & English LLP
Christopher B. Fisher, Esq., Cuddy & Feder, LLP

Trumbull Street
Hartford, CT 06103-3597
Main (860) 275-8200
Fax (860) 275-8299
kbaldwin@rc.com
Direct (860) 275-8345

March 16, 2005

Via Hand Delivery

S. Derek Phelps
Executive Director
Connecticut Siting Council
10 Franklin Square
New Britain, CT 06051

Re: **Notice of Exempt Modification**
400 Riley Mountain Road, Coventry, Connecticut
400 Main Street, Somers, Connecticut

Dear Mr. Phelps:

Cellco Partnership d/b/a Verizon Wireless ("Cellco") intends to install antennas on each of the existing tower sites referenced above. 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 the chief elected or appointed official in each affected municipality.

Coventry Facility- 400 Riley Mountain Road

The existing Coventry facility consists of a 152-foot self-supporting monopole tower capable of supporting multiple carriers within a fenced site compound at 400 Riley Mountains Road in Coventry. The tower is owned by SprintSites, USA and is currently shared by Sprint at the 147-foot level; T-Mobile at the 137-foot level; Cingular at the 117-foot level and AT&T at the 107-foot level of the tower. Cellco proposes to install twelve (12) panel-type antennas at the 127-foot level on the tower and a 12' x 30' single-story equipment shelter near the base of the tower within the fenced site compound. Please note that in order to accommodate the proposed equipment shelter the existing fenced compound will be extended slightly. All improvements will occur, however, within the existing leased area. Attached behind Tab 1 are Project Plans, a general power density table for Cellco antennas and structural analysis confirming that the existing tower can support the existing and proposed Cellco antennas.



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HART1-1242098-1

S. Derek Phelps
March 8, 2005
Page 2

Somers Facility- 400 Main Street

The existing Somers facility consists of a 189-foot self-supporting monopole tower capable of supporting multiple carriers within a fenced site compound at 400 Main Street in Somers. The tower is owned by Crown Atlantic Company, LLC and is currently shared by Sprint at the 188-foot level; T-Mobile at the 168-foot level; and AT&T at the 158-foot level of the tower. Cellco proposes to install twelve (12) panel-type antennas at the 178-foot level on the tower and a 12' x 30' single-story equipment shelter near the base of the tower within the existing fenced compound. Attached behind Tab 1 are Project Plans, a general power density table and structural analysis confirming that the existing tower can support the existing and Cellco proposed antennas.

The planned modifications to the each of these facilities fall squarely within those activities explicitly provided for in R.C.S.A. § 16-50j-72(b)(2).

1. The proposed modification will not increase the overall height of either existing tower.
2. The proposed installation of a 12' x 30' equipment shelter at the Coventry facility will require a minor extension of the fenced compound but will remain within the existing leased area. The proposed installation of a 12' x 30' equipment shelter at the Somers facility will not require an extension of the fenced compound or leased area.
3. The proposed antenna modification will not increase the noise levels at the facility by six decibels or more.
4. The operation of the antennas will not increase radio frequency (RF) power density levels at the facility to a level at or above the Federal Communications Commission (FCC) adopted safety standard.

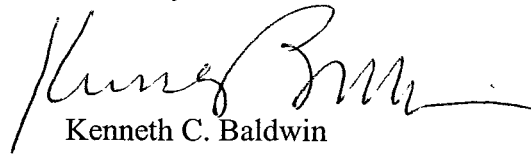


ROBINSON & COLE^{LLP}

S. Derek Phelps
March 8, 2005
Page 3

For the foregoing reasons, Cellco respectfully submits that the proposed antenna installation at each of the proposed facilities constitute an exempt modification under R.C.S.A. § 16-50j-72(b)(2).

Sincerely,



Kenneth C. Baldwin

Attachments

cc: John A. Elsesser, Coventry Town Manager
David A. Pinney, Somers First Selectman
Sandy M. Carter



Cellco Partnership

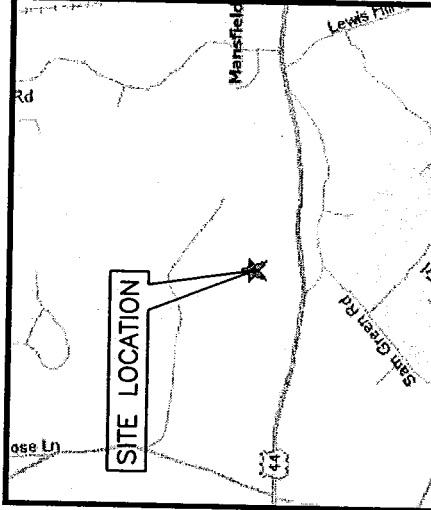
d.b.a. **verizon** wireless

COVENTRY NORTH

RILEY MOUNTAIN ROAD COVENTRY, CONNECTICUT 06238

NOTE:
1. THIS DOCUMENT WAS DEVELOPED TO REFLECT A SPECIFIC SITE AND ITS SITE CONDITIONS AND IS NOT TO BE USED FOR ANOTHER SITE OR WHEN OTHER CONDITIONS PERTAIN. REUSE OF THIS DOCUMENT IS AT THE SOLE RISK OF THE USER.

STRUCTURAL NOTE:
1. NEW CONSTRUCTION REPRESENTED ON THESE PLANS IS PROPOSED PREDICATED ON THE REQUIREMENT THAT A STRUCTURAL ANALYSIS BE PERFORMED BY A LICENSED CONNECTICUT PROFESSIONAL STRUCTURAL ENGINEER AND CERTIFICATION IS GIVEN BY THE ENGINEER THAT THE EXISTING TOWER AND ALL EXISTING AND PROPOSED ANTENNAS AND APPURTENANCES SUPPORTED BY THE TOWER AND ANY REQUIRED IMPROVEMENTS AND REINFORCEMENTS HAVE SUFFICIENT STRUCTURAL CAPACITY AND COMPLY WITHOUT THE CONNECTICUT BUILDING CODE AND ALL APPLICABLE EIA/TIA CRITERIA. NO WORK PROPOSED HEREON SHALL BE PROGRESSSED WITHOUT CONFIRMATION OF THIS CERTIFICATION.



LOCATION MAP
COVENTRY, CT

SCALE: 1" = 4,000' ±

DIRECTIONS (FROM HARTFORD, CT):
TAKE I-84E TO I-384E TO ROUTE 44E. TURN NORTH ONTO NORTH RIVER RD. TURN RIGHT ONTO RILEY MOUNTAIN RD. FOLLOW TO END, SITE IS ON RIGHT WITH GATED ENTRANCE.

PROJECT SUMMARY

SITE NAME: COVENTRY NORTH

SITE ADDRESS: RILEY MOUNTAIN ROAD
COVENTRY, CT 06238

OWNER: JAMES L. & CONCETTA M. WALLBEOFF
679 OLD HUNT WAY
HERDON, VA 20178-3156
(703) 709-0970

LESSEE: CELCO PARTNERSHIP
d.b.a. VERIZON WIRELESS
99 EAST RIVER DRIVE
EAST HARTFORD, CT 06108

APPLICANT: CELCO PARTNERSHIP
d.b.a. VERIZON WIRELESS
99 EAST RIVER DRIVE
EAST HARTFORD, CT 06108

CONTACT PERSON: SANDY CARTER
CELLCO PARTNERSHIP
(860) 803-8219

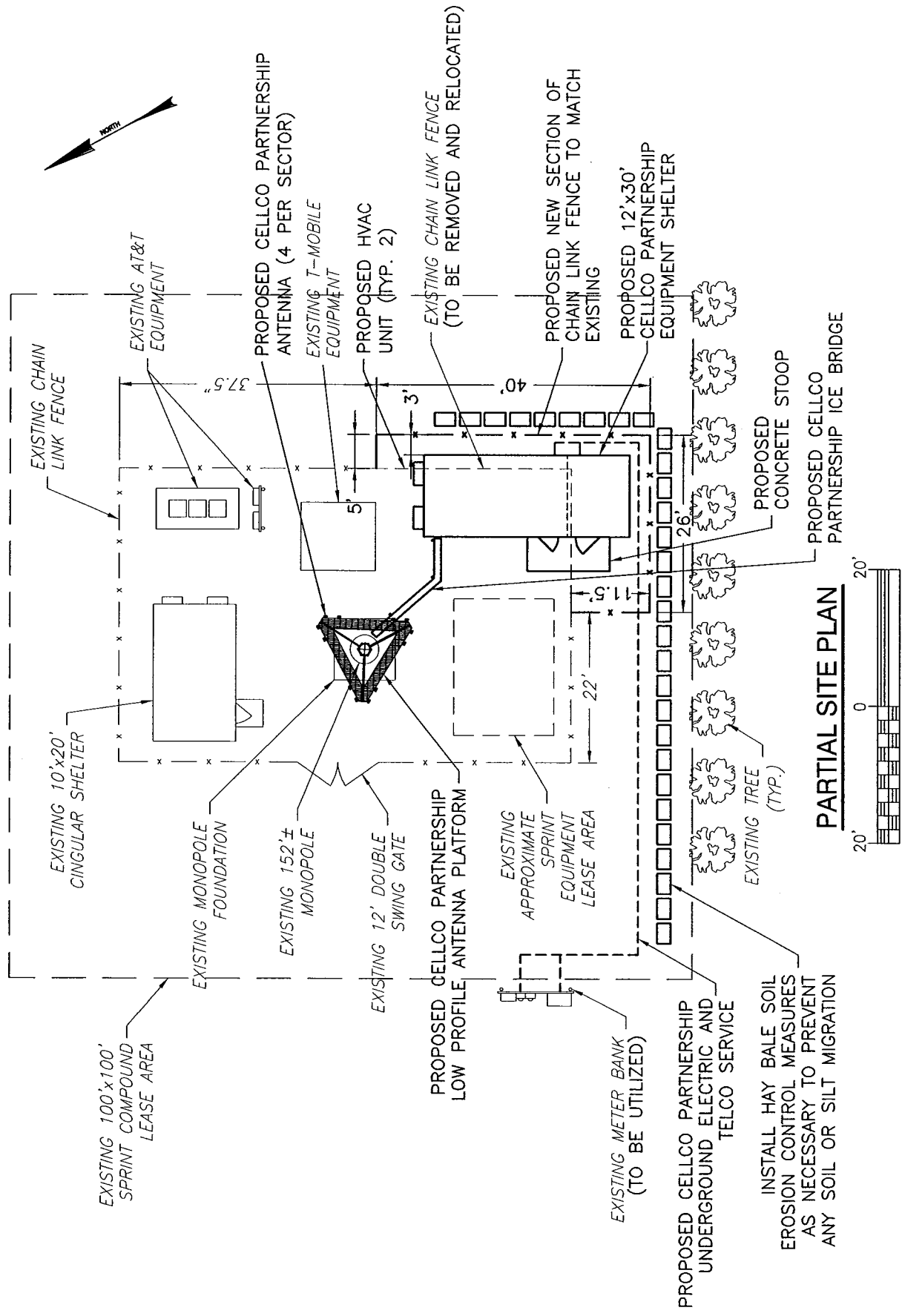
COORDINATES: LATITUDE: 41°-48'-05" N (NAD 83)
LONGITUDE: 72°-19'-42" W (NAD 83)
COORDINATES TAKEN FROM
RF ENGINEER.

SHEET INDEX	
SHEET NO.	DESCRIPTION
T-1	TITLE SHEET
S-1	PARTIAL SITE PLAN
S-2	MONOPOLE ELEVATION

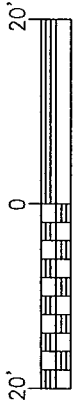
NOTE:
DRAWINGS FOR SITING COUNCIL ONLY.
ONLY TO BE USED FOR CONSTRUCTION

NO.		DATE	BY	DESCRIPTION
A	03/07/05	JRF		PRELIMINARY SITING COUNCIL

Dewberry-Goodkind, Inc. A Dewberry Company 59 Elm Street, Suite 101 New Haven, CT 06510 P: (203) 776-2277 F: (203) 776-2238		SCALE: AS SHOWN	DESIGNED BY: CKD	DATE: 03/07/05
Engineers Planners Surveyors		TITLE SHEET		
Cellco Partnership		d.b.a. verizon wireless		
PROJECT: 2003009800		SHEET NO. T-1		
LOCATION CODE: 118000		SITING COUNCIL: COVENTRY NORTH		
COVENTRY, CONNECTICUT 06238		RILEY MOUNTAIN ROAD		



PARTIAL SITE PLAN



SCALE: 1" = 20'

<p>PARTIAL SITE PLAN</p>		<p>Cellco Partnership d.b.a. verizon wireless</p>	
<p>SCALE: AS SHOWN</p>		<p>SHEET NO. S - 1</p>	
<p>DESIGNED BY: CKD</p>		<p>PROJECT: 2003009800</p>	
<p>DATE: 03/07/05</p>		<p>LOCATION CODE: 118000</p>	
<p>Dewberry-Goodkind, Inc. A Dewberry Company 59 Elm Street, Suite 101 New Haven, CT 06510 P. (203) 776-2277 F. (203) 776-2288</p>		<p>SITE NAME: COVENTRY NORTH RILEY MOUNTAIN ROAD COVENTRY, CONNECTICUT 06238</p>	
NO.	DATE	BY	DESCRIPTION
A	03/07/05	JRF	PRELIMINARY SITING COUNCIL

INSTALL HAY BALE SOIL EROSION CONTROL MEASURES AS NECESSARY TO PREVENT ANY SOIL OR SILT MIGRATION

PROPOSED CELLCO PARTNERSHIP UNDERGROUND ELECTRIC AND TELCO SERVICE

EXISTING METER BANK (TO BE UTILIZED)

PROPOSED CELLCO PARTNERSHIP LOW PROFILE ANTENNA PLATFORM

EXISTING APPROXIMATE SPRINT EQUIPMENT LEASE AREA

EXISTING 12' DOUBLE SWING GATE

EXISTING 152'± MONOPOLE

EXISTING MONOPOLE FOUNDATION

EXISTING 10'x20' CINGULAR SHELTER

EXISTING 100'x100' SPRINT COMPOUND LEASE AREA

EXISTING AT&T EQUIPMENT

PROPOSED CELLCO PARTNERSHIP ANTENNA (4 PER SECTOR)

EXISTING T-MOBILE EQUIPMENT

PROPOSED HVAC UNIT (TYP. 2)

EXISTING CHAIN LINK FENCE (TO BE REMOVED AND RELOCATED)

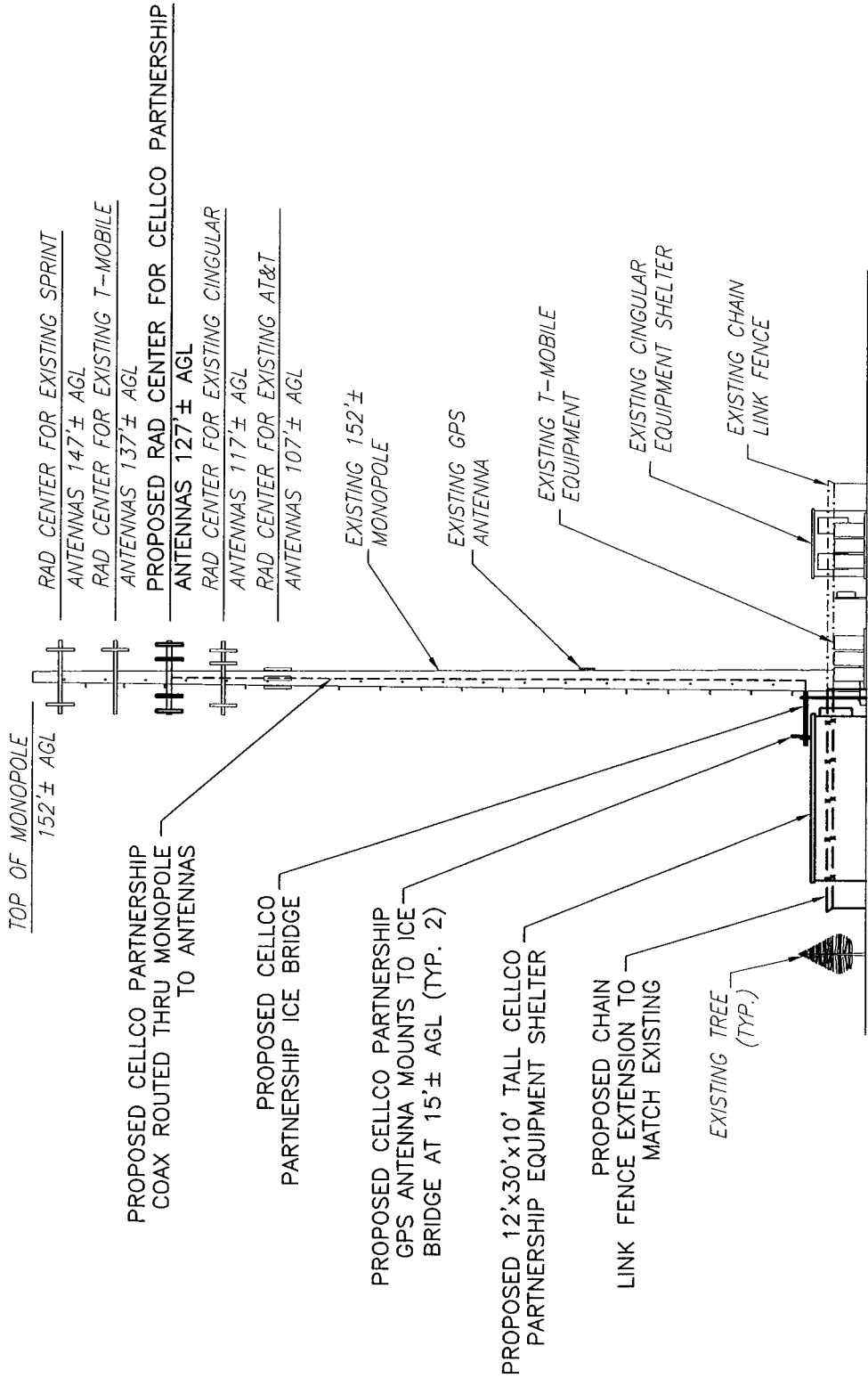
PROPOSED NEW SECTION OF CHAIN LINK FENCE TO MATCH EXISTING

PROPOSED 12'x30' CELLCO PARTNERSHIP EQUIPMENT SHELTER

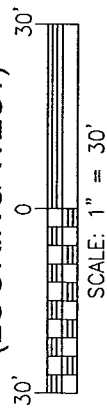
PROPOSED CONCRETE STOOP

PROPOSED CELLCO PARTNERSHIP ICE BRIDGE

EXISTING TREE (TYP.)



**MONOPOLE ELEVATION
(LOOKING WEST)**



		Dewberry-Goodkind, Inc. A Dewberry Company 59 Elm Street, Suite 101 New Haven, CT 06510 P. (203) 776-2277 F. (203) 776-2288		SCALE: AS SHOWN		Cellco Partnership d.b.a. verizon wireless	
		Engineers Planners Surveyors		DESIGNED BY: CKD		PROJECT: 2003009800	
		PRELIMINARY SITING COUNCIL		DATE: 03/07/05		LOCATION CODE: 118000	
A		03/07/05		JRF		SITE NAME: COVENTRY NORTH RILEY MOUNTAIN ROAD COVENTRY, CONNECTICUT 06238	
NO.		DATE		BY		SHEET NO. S - 2	
						DESCRIPTION	

General Power Density

Site Name: Coventry North, CT
 Tower Height: 127 ft rad center

Operator	Operating Frequency (MHz)	Number of Trans	ERP Per Trans (watts)	Total ERP (watts)	Distance to Target (feet)	Calculated Power Density (mW/cm ²)	Maximum Permissible Exposure (mW/cm ²)	Fraction of MPE (%)
Verizon	880	9	200	1800	127	0.0401	0.56733	7.07%
Verizon	1900	3	200	600	127	0.0134	1	1.34%
Total Percentage of Maximum Permissible Exposure								8.41%

*Guidelines adopted by the FCC on August 1, 1996, 47 CFR Part 1 based on NCRP Report 86, 1986 and generally on ANSI/IEEE C95.1-1992

MHz = Megahertz

mW/cm² = milliwatts per square centimeter

ERP = Effective Radiated Power

Absolute worst case scenario, maximum values used.



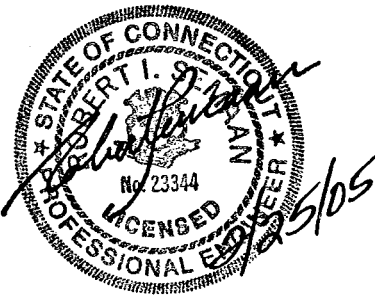
1079 N. 204th Avenue
Elkhorn, NE 68022
Ph: 402-289-1888
Fax: 402-289-1861

SEMAAN ENGINEERING SOLUTIONS

152 ft EEI Monopole Structural Analysis

Prepared for:
Sprint Sites USA
1 International Blvd
Mahwah, NJ 07645

Site: CT33XC551
Verizon
Riley Mountain Rd.
Coventry, CT



February 25, 2005

Ms. Kim Cornelisse
Sprint Sites USA
1 International Blvd
Mahwah, NJ 07645

Re: Site Number CT33XC551 – Riley Mountain Rd, Coventry, CT.

Dear Ms. Cornelisse:

We have completed the structural analysis for the existing monopole, located at the above referenced site. The purpose of this analysis is to determine that the existing monopole design is in conformance with the EIA/TIA-222-F standard and local building codes for the proposed antennae loads installation. Refer to the Review and Recommendations section at the end of this report for the analysis results.

Description of Structure:

The structure is a 152 ft EEI Monopole.

Refer to EEI job # 7831 for a detailed description of the structure.

Method of analysis:

The tower was analyzed using Semaan Engineering Solutions' software suite for communication structures. The structural analysis is performed using the SAPS finite element engine. The method is 3D, non-linear, which accounts for the second order geometric effects due to the displacements. The analysis was performed in conformance with **EIA/TIA-222-F and local building codes for a basic wind speed of 85 mph and 1/2" radial ice with reduced wind speed (fastest mile)**. This is in conformance with the IBC 2003: Section 1609.1.1, Exception (5) and Section 3108.4. Wind is applied to the structure, accessories and antennas.

Structure loading:

Per the loading sheet supplied, the analysis was performed using the following loading: (Proposed loading in bold)

Elev. (ft)	Qty	Antennas and Mounts	Coax	Owner
147.0	12	DB980H90 Mounted On a Low Profile platform	(12) 1-5/8	Sprint
137.0	6	RR90-17-02DP Mounted On a Low Profile platform	(12) 1-5/8	T-Mobile
127.0	6	DB846H80E-SX Mounted On a Low Profile platform	(6) 1-5/8	Verizon
127.0	6	DB950F85E-M Mounted On the same Low Profile platform	(6) 1-5/8	Veirzon
117.0	9	DUO4-8670 Mounted On a Low Profile platform	(9) 1-1/4	Cingular
117.0	6	MHA Mounted On a Low Profile platform	-	Cingular
107.0	6	Allgon 7250 Mounted On (3) T-Arms	(12) 1-5/8	AT&T
60.0	1	Kathrein 738 449 Mounted On a Standoff	(1) 1/2	Cingular

All new access holes shall be reinforced with welded rims that are compatible with the pole and to be sized and supplied by pole manufacturer. All transmission lines are assumed running inside of pole shaft.

Results of Analysis:

Refer to the attached Computer Summary sheets for detailed analysis results.

Structure:

The existing monopole is structurally capable of supporting the existing and proposed antennas. The maximum structure usage is: 34.6%.

Foundation:

Pole Reactions	Original Design Reactions	Current Analysis Reactions	% Of Design
Moment (ft-kips)	7,341.00	3,169.23	43.2
Shear (kips)	57.04	31.80	55.7

The analysis reactions are less than the design reactions therefore no foundation modifications are required.

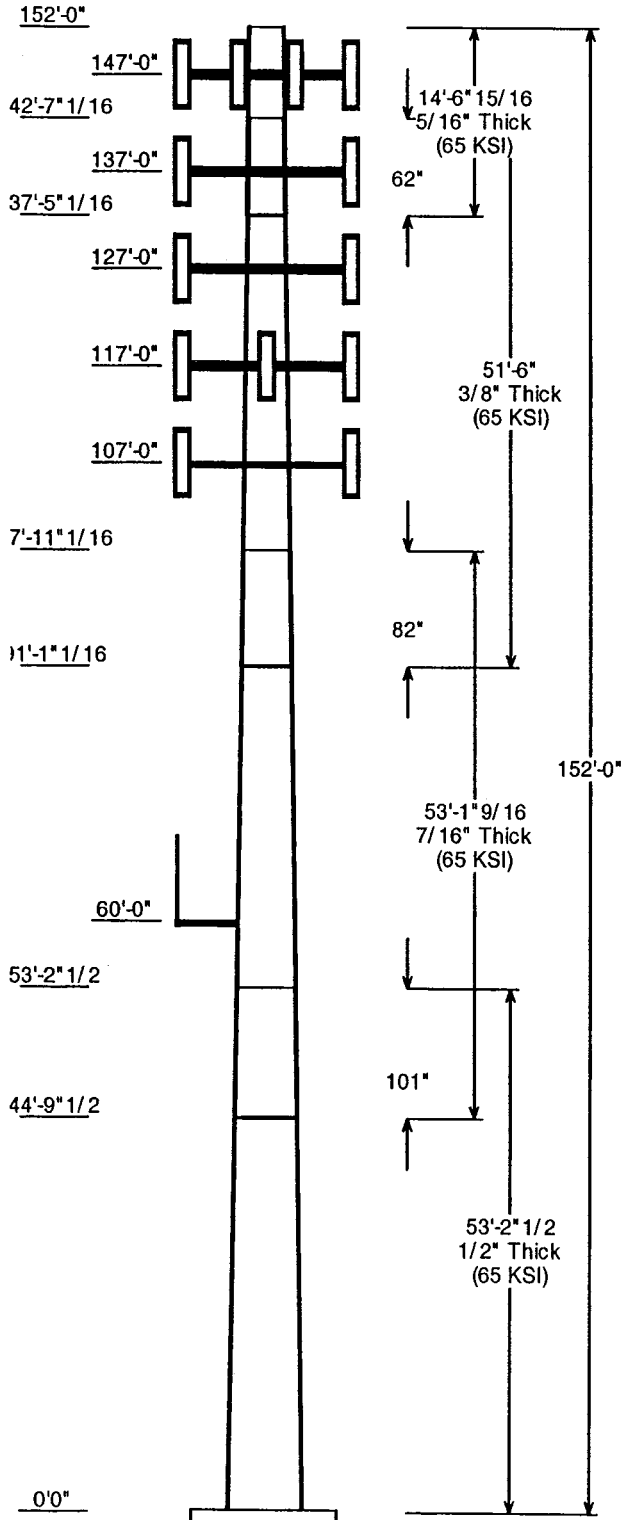
Review and Recommendations:

Based on the analysis results, the existing structure meets the requirements per the EIA/TIA-222-F standards for a basic wind speed of 85 mph and 1/2" radial ice with reduced wind speed.

SEMAAN ENGINEERING SOLUTIONS

1079 N.204th Avenue
 Elkhorn, NE 68022
 Phone: 402-289-1888
 Fax: 402-289-1861

Copyright Semaan Engineering Solutions, Inc



Job Information	
Pole :	CT33XC551
Description :	
Client :	Sprint Sites USA - NJ
Location :	Riley Mountain Rd, Coventry, CT
Type :	18 Sides Base Elev (ft): 0.00
Height :(ft)	152.00 Taper: 0.290923 (in/ft)

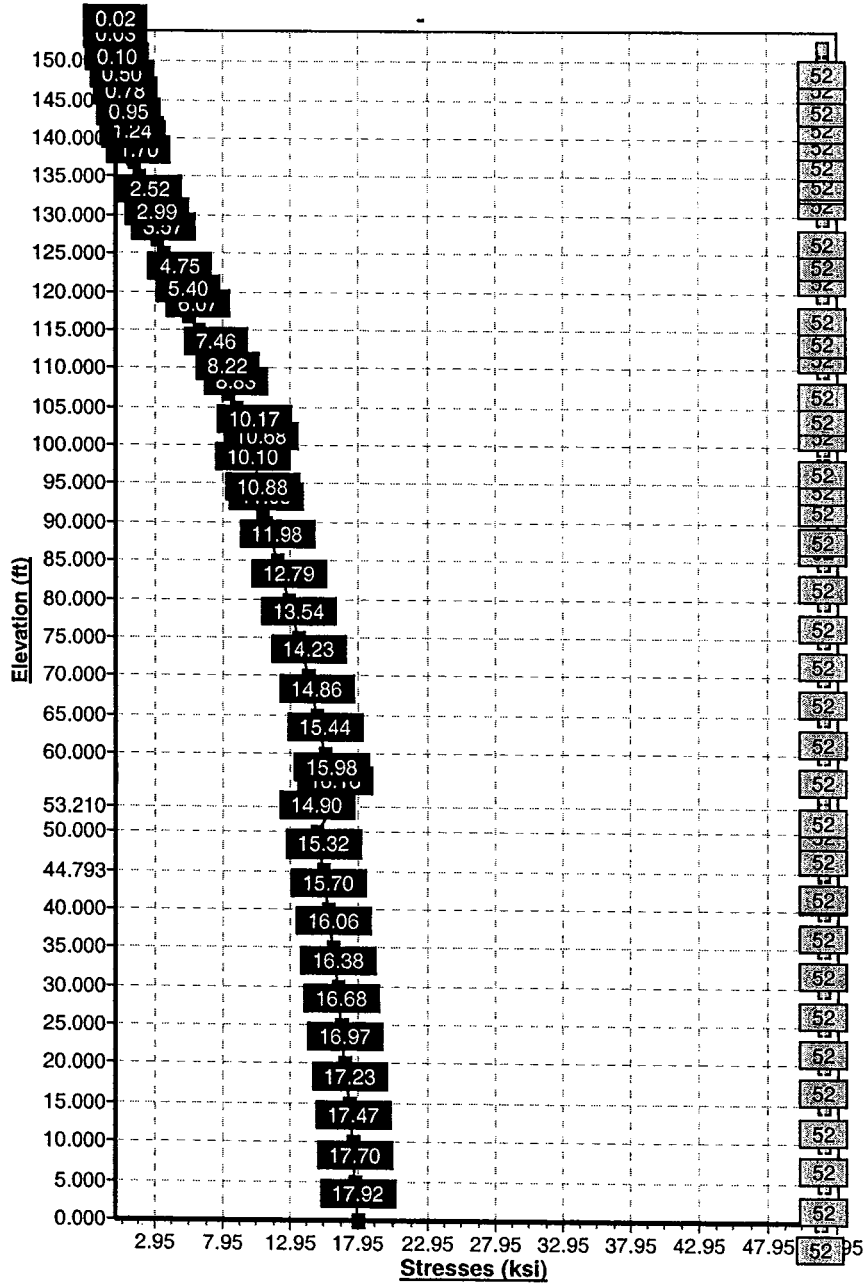
Sections Properties							
Shaft Section	Length (ft)	Diameter (in)		Thick Joint (in) Type	Overlap Length (in)	Taper (in/ft)	Steel Grade (ksi)
		Across Top	Flats Bottom				
1	53.210	59.52	75.00	0.500	0.000	0.290923	65
2	53.130	47.38	62.84	0.438 Slip Joint	101.000	0.290923	65
3	51.500	35.14	50.12	0.375 Slip Joint	82.000	0.290923	65
4	14.577	33.03	37.27	0.313 Slip Joint	62.000	0.290923	65

Discrete Appurtenance				
Attach Elev (ft)	Force Elev (ft)	Type	Qty	Description
147.000	147.000	Platform	1	Low Profile platform
147.000	147.000	Panel	12	DB980H90
137.000	137.000	Platform	1	Low Profile platform
137.000	137.000	Panel	6	RR90-17-02DP
127.000	127.000	Panel	6	DB950F85E-M
127.000	127.000	Platform	1	Low Profile platform
127.000	127.000	Panel	6	DB846H80E-SX
117.000	117.000	Panel	6	MHA
117.000	117.000	Platform	1	Low Profile platform
117.000	117.000	Panel	9	DUO4-8670
107.000	107.000	Straight	3	T-Arms
107.000	107.000	Panel	6	Allgon 7250
60.000	60.000	Straight	1	Standoff
60.000	60.355	Whip	1	Kathrein 738 449

Load Cases / Deflections			
Load Case	Attach Elev (ft)	Translation (in)	Rotation (deg)
No Ice			
No Ice Wind Speed = 85.00 mph w/ No Ice			
	147.000	23.33	-1.274
	137.000	20.67	-1.266
	127.000	18.04	-1.243
	117.000	15.48	-1.199
	107.000	13.03	-1.132
	60.000	4.08	-0.654
Ice			
Ice Wind Speed = 73.61 mph w/ Ice 0.50 in Thick			
	147.000	19.14	-1.046
	137.000	16.96	-1.039
	127.000	14.80	-1.020
	117.000	12.69	-0.984
	107.000	10.68	-0.929
	60.000	3.34	-0.536

Reactions			
Load Case	Moment (Kip-ft)	Shear (Kips)	Axial (Kips)
No Ice	3,169.233	31.796	-50.258
Ice	2,585.575	25.561	-60.028

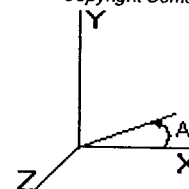
Load Case : No Ice



Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ

Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)



Shaft Section Properties

Sect Num	Length (ft)	Thick (in)	Fy (ksi)	Joint Type	Slip Joint Len (in)	Weight (lb)	Bottom						Top						
							Dia (in)	Elev (ft)	Area (sqin)	Ix (in^4)	W/t Ratio	D/t Ratio	Dia (in)	Elev (ft)	Area (sqin)	Ix (in^4)	W/t Ratio	D/t Ratio	Taper (in/ft)
1	53.210	0.5000	65		0.00	19,182	75.00	0.000	118.	82905.5	25.04	150.0	59.52	53.21	93.66	41220.4	19.58	119.04	0.29092
2	53.130	0.4375	65	Slip Joint	101.0	13,726	62.84	44.79	86.66	42638.6	23.92	143.6	47.38	97.92	65.19	18155.6	17.69	108.31	0.29092
3	51.500	0.3750	65	Slip Joint	82.00	8,814	50.12	91.09	59.21	18516.1	22.16	133.6	35.14	142.5	41.38	6319.6	15.11	93.71	0.29092
4	14.577	0.3125	65	Slip Joint	62.00	1,714	37.27	137.4	36.66	6325.8	19.62	119.2	33.03	152.0	32.45	4388.6	17.23	105.70	0.29092
Shaft Weight						43,437													

Discrete Appurtenance Properties

Attach Elev (ft)	Description	Qty	Weight (lb)	No Ice CaAa (sf)	CaAa Factor	Weight (lb)	Ice CaAa (sf)	CaAa Factor	Distance From Face (ft)	X Angle (deg)	Vert Ecc (ft)
147.0	Low Profile platform	1	1300.00	25.550	1.00	2100.00	27.320	1.00	0.000	0.00	0.000
147.0	DB980H90	12	9.00	3.280	0.67	28.00	3.850	0.67	0.000	0.00	0.000
137.0	Low Profile platform	1	1300.00	25.550	1.00	2100.00	27.320	1.00	0.000	0.00	0.000
137.0	RR90-17-02DP	6	12.00	5.230	0.67	35.00	5.800	0.67	0.000	0.00	0.000
127.0	DB950F85E-M	6	11.50	4.236	1.00	33.93	4.815	1.00	0.000	0.00	0.000
127.0	Low Profile platform	1	1300.00	25.550	1.00	2100.00	27.320	1.00	0.000	0.00	0.000
127.0	DB846H80E-SX	6	21.00	5.870	1.00	59.40	6.560	1.00	0.000	0.00	0.000
117.0	MHA	6	12.40	0.870	1.00	18.10	1.060	1.00	0.000	0.00	0.000
117.0	Low Profile platform	1	1300.00	25.550	1.00	2100.00	27.320	1.00	0.000	0.00	0.000
117.0	DUO4-8670	9	30.80	6.533	1.00	73.00	7.150	1.00	0.000	0.00	0.000
107.0	T-Arms	3	258.00	10.670	1.00	336.00	14.200	1.00	0.000	0.00	0.000
107.0	Allgon 7250	6	16.00	4.300	0.67	36.00	5.000	0.67	0.000	0.00	0.000
60.00	Standoff	1	40.00	2.630	1.00	63.00	4.340	1.00	0.000	0.00	0.000
60.00	Kathrein 738 449	1	0.56	0.050	1.00	1.19	0.100	1.00	0.000	0.00	0.355
Totals		60	6837.16			11559.77			Number of Loadings : 14		

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

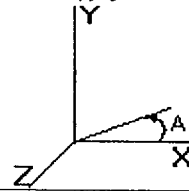
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Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)

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Page: 2



Segment Properties (Max Len : 5 ft)

Seg Elev (ft)	Description	Thick (in)	Dia (in)	Area (in^2)	Ix (in^4)	W/t Ratio	D/t Ratio	Fy (ksi)	Fb (ksi)	Weight (lb)
0.00		0.5000	75.000	118.227	82,905.5	25.04	150.00	65	52	0.0
5.00		0.5000	73.545	115.919	78,143.5	24.53	147.09	65	52	1,991.9
10.00		0.5000	72.091	113.610	73,567.4	24.01	144.18	65	52	1,952.6
15.00		0.5000	70.636	111.302	69,173.6	23.50	141.27	65	52	1,913.3
20.00		0.5000	69.182	108.994	64,958.3	22.99	138.36	65	52	1,874.0
25.00		0.5000	67.727	106.685	60,917.8	22.47	135.45	65	52	1,834.8
30.00		0.5000	66.272	104.377	57,048.4	21.96	132.54	65	52	1,795.5
35.00		0.5000	64.818	102.069	53,346.5	21.45	129.64	65	52	1,756.2
40.00		0.5000	63.363	99.760	49,808.3	20.93	126.73	65	52	1,716.9
44.79	Bot - Section 2	0.5000	61.969	97.547	46,566.6	20.44	123.94	65	52	1,609.1
45.00		0.5000	61.908	97.452	46,430.0	20.42	123.82	65	52	129.5
50.00		0.5000	60.454	95.143	43,208.1	19.91	120.91	65	52	3,094.1
53.21	Top - Section 1	0.4375	60.395	83.255	37,814.0	22.93	138.05	65	52	1,947.6
55.00		0.4375	59.874	82.532	36,837.3	22.72	136.86	65	52	504.9
60.00		0.4375	58.420	80.513	34,198.3	22.13	133.53	65	52	1,387.0
65.00		0.4375	56.965	78.493	31,688.5	21.55	130.21	65	52	1,352.6
70.00		0.4375	55.510	76.473	29,304.6	20.96	126.88	65	52	1,318.3
75.00		0.4375	54.056	74.453	27,043.4	20.38	123.56	65	52	1,283.9
80.00		0.4375	52.601	72.433	24,901.6	19.79	120.23	65	52	1,249.6
85.00		0.4375	51.147	70.413	22,875.9	19.20	116.91	65	52	1,215.2
90.00		0.4375	49.692	68.393	20,963.2	18.62	113.58	65	52	1,180.8
91.09	Bot - Section 3	0.4375	49.375	67.953	20,560.9	18.49	112.86	65	52	252.9
95.00		0.4375	48.237	66.374	19,160.2	18.03	110.26	65	52	1,672.4
97.92	Top - Section 2	0.3750	48.137	56.846	16,384.0	21.22	128.36	65	52	1,224.9
100.00		0.3750	47.533	56.127	15,770.1	20.94	126.75	65	52	399.2
105.00		0.3750	46.078	54.396	14,355.3	20.26	122.87	65	52	940.2
107.00		0.3750	45.496	53.704	13,814.0	19.98	121.32	65	52	367.8
110.00		0.3750	44.623	52.665	13,027.8	19.57	119.00	65	52	542.9
115.00		0.3750	43.169	50.934	11,784.7	18.89	115.12	65	52	881.3
117.00		0.3750	42.587	50.241	11,310.5	18.61	113.57	65	52	344.3
120.00		0.3750	41.714	49.202	10,623.4	18.20	111.24	65	52	507.6
125.00		0.3750	40.260	47.471	9,541.0	17.52	107.36	65	52	822.4
127.00		0.3750	39.678	46.778	9,129.5	17.25	105.81	65	52	320.7
130.00		0.3750	38.805	45.740	8,534.7	16.84	103.48	65	52	472.2
135.00		0.3750	37.350	44.008	7,601.8	16.15	99.60	65	52	763.5
137.00		0.3750	36.769	43.316	7,248.5	15.88	98.05	65	52	297.1
137.42	Bot - Section 4	0.3750	36.645	43.169	7,175.2	15.82	97.72	65	52	62.3
140.00		0.3750	35.896	42.277	6,739.4	15.47	95.72	65	52	692.7
142.59	Top - Section 3	0.3125	35.767	35.165	5,584.9	18.77	114.46	65	52	681.9
145.00		0.3125	35.066	34.470	5,260.1	18.38	112.21	65	52	285.5
147.00		0.3125	34.484	33.893	5,000.3	18.05	110.35	65	52	232.6
150.00		0.3125	33.612	33.027	4,626.9	17.55	107.56	65	52	341.6
152.00		0.3125	33.030	32.450	4,388.6	17.23	105.70	65	52	222.8
										43,436.7

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

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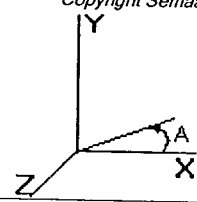
Base Elev : 0.000 (ft)

Top Dia : 33.03 (in)

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Page: 3



Load Case: No Ice 85 mph - No Ice 19 Iterations
Gust Response Factor : 1.69 **Effective Wind Speed :** 85.00 (mph)
Dead Load Factor : 1.00
Wind Load Factor : 1.00

Shaft Forces

Seg Top Elev (ft)	Description	Kz	qz (psf)	qzGh (psf)	C (mph-ft)	Cf	Tributary (ft)	Aa (sf)	CfAa (sf)	Wind Force X (lb)	Wind Force Z (lb)	Weight (lb)
0.00		1.00	18.49	31.25	531.25	0.650	0.00	0.000	0.000	0.00	0.00	0.0
5.00		1.00	18.49	31.25	520.95	0.650	5.00	30.947	20.116	628.78	0.00	1,991.9
10.00		1.00	18.49	31.25	510.64	0.650	5.00	30.341	19.722	616.46	0.00	1,952.6
15.00		1.00	18.49	31.25	500.34	0.650	5.00	29.735	19.328	604.15	0.00	1,913.3
20.00		1.00	18.49	31.25	490.04	0.650	5.00	29.129	18.934	591.83	0.00	1,874.0
25.00		1.00	18.49	31.25	479.73	0.650	5.00	28.523	18.540	579.52	0.00	1,834.8
30.00		1.00	18.49	31.25	469.43	0.650	5.00	27.917	18.146	567.20	0.00	1,795.5
35.00		1.01	18.81	31.78	463.00	0.650	5.00	27.310	17.752	564.30	0.00	1,756.2
40.00		1.05	19.54	33.02	461.33	0.650	5.00	26.704	17.358	573.23	0.00	1,716.9
44.79	Bot - Section 2	1.09	20.18	34.11	458.53	0.650	4.79	25.032	16.270	554.98	0.00	1,609.1
45.00		1.09	20.21	34.15	458.38	0.650	0.21	1.082	0.703	24.02	0.00	129.5
50.00		1.12	20.82	35.19	454.40	0.650	5.00	25.857	16.807	591.58	0.00	3,094.1
53.21	Top - Section 1	1.14	21.20	35.83	451.38	0.650	3.21	16.281	10.582	379.16	0.00	1,947.6
55.00		1.15	21.40	36.17	456.22	0.650	1.79	8.970	5.831	210.89	0.00	504.9
60.00	Appertunance(s)	1.18	21.94	37.08	450.70	0.650	5.00	24.645	16.019	593.99	0.00	1,387.0
65.00		1.21	22.44	37.93	444.53	0.650	5.00	24.038	15.625	592.79	0.00	1,352.6
70.00		1.24	22.92	38.75	437.79	0.650	5.00	23.432	15.231	590.21	0.00	1,318.3
75.00		1.26	23.38	39.52	430.54	0.650	5.00	22.826	14.837	586.39	0.00	1,283.9
80.00		1.28	23.82	40.25	422.84	0.650	5.00	22.220	14.443	581.44	0.00	1,249.6
85.00		1.31	24.23	40.96	414.72	0.650	5.00	21.614	14.049	575.46	0.00	1,215.2
90.00		1.33	24.63	41.63	406.23	0.650	5.00	21.008	13.655	568.53	0.00	1,180.8
91.09	Bot - Section 3	1.33	24.72	41.77	404.33	0.650	1.09	4.499	2.925	122.18	0.00	252.9
95.00		1.35	25.02	42.28	397.39	0.650	3.91	16.147	10.496	443.79	0.00	1,672.4
97.92	Top - Section 2	1.36	25.23	42.65	392.08	0.650	2.92	11.830	7.690	327.97	0.00	1,224.9
100.00		1.37	25.38	42.90	394.47	0.650	2.08	8.278	5.381	230.87	0.00	399.2
105.00		1.39	25.74	43.51	385.07	0.650	5.00	19.502	12.676	551.55	0.00	940.2
107.00	Appertunance(s)	1.39	25.88	43.74	381.24	0.650	2.00	7.631	4.960	216.99	0.00	367.8
110.00		1.41	26.09	44.09	375.40	0.650	3.00	11.265	7.322	322.85	0.00	542.9
115.00		1.42	26.42	44.65	365.48	0.650	5.00	18.290	11.889	530.89	0.00	881.3
117.00	Appertunance(s)	1.43	26.55	44.87	361.44	0.650	2.00	7.146	4.645	208.45	0.00	344.3
120.00		1.44	26.74	45.20	355.32	0.650	3.00	10.538	6.849	309.61	0.00	507.6
125.00		1.46	27.06	45.73	344.93	0.650	5.00	17.078	11.101	507.65	0.00	822.4
127.00	Appertunance(s)	1.47	27.18	45.94	340.72	0.650	2.00	6.661	4.330	198.92	0.00	320.7
130.00		1.48	27.36	46.24	334.34	0.650	3.00	9.810	6.377	294.91	0.00	472.2
135.00		1.49	27.66	46.74	323.55	0.650	5.00	15.866	10.313	482.11	0.00	763.5
137.00	Appertunance(s)	1.50	27.77	46.94	319.18	0.650	2.00	6.177	4.015	188.48	0.00	297.1
137.42	Bot - Section 4	1.50	27.80	46.98	318.25	0.650	0.42	1.295	0.842	39.55	0.00	62.3
140.00		1.51	27.95	47.23	312.56	0.650	2.58	7.922	5.150	243.25	0.00	692.7
142.59	Top - Section 3	1.51	28.09	47.48	306.81	0.650	2.59	7.801	5.071	240.78	0.00	681.9
145.00		1.52	28.23	47.71	306.88	0.650	2.41	7.113	4.623	220.59	0.00	285.5
147.00	Appertunance(s)	1.53	28.34	47.90	302.37	0.650	2.00	5.796	3.767	180.46	0.00	232.6
150.00		1.54	28.50	48.17	295.57	0.650	3.00	8.512	5.533	266.56	0.00	341.6
152.00		1.54	28.61	48.36	291.01	0.650	2.00	5.553	3.610	174.57	0.00	222.8
Totals:							152.00			16,877.87	0.00	43,436.7

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

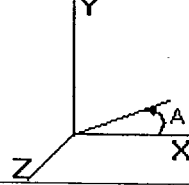
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Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)

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Page: 4



Load Case: No Ice 85 mph - No Ice 19 Iterations
 Gust Response Factor : 1.69 Effective Wind Speed : 85.00 (mph)
 Dead Load Factor : 1.00
 Wind Load Factor : 1.00

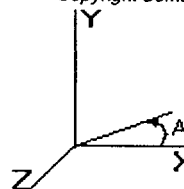
Discrete Appurtenance Forces

Elev (ft)	Description	Qty	qz (psf)	qzGh (psf)	Total CaAa (sf)	CaAa Factor	Horiz Ecc (ft)	Vert Ecc (ft)	X Angle (deg)	Wind Force X (lb)	Wind Force Z (lb)	Mom X (lb-ft)	Mom Y (lb-ft)	Mom Z (lb-ft)	Weight (lb)
60.00	Standoff	1	21.94	37.08	2.630	1.000	0.000	0.0	0.0	97.52	0.00	0.00	0.00	0.00	40.0
60.00	Kathrein 738 449	1	21.97	37.14	0.050	1.000	0.000	0.4	0.0	1.86	0.00	0.00	0.00	0.66	0.6
107.00	T-Arms	3	25.88	43.74	32.010	1.000	0.000	0.0	0.0	1400.27	0.00	0.00	0.00	0.00	774.0
107.00	Allgon 7250	6	25.88	43.74	17.209	0.667	0.000	0.0	0.0	752.79	0.00	0.00	0.00	0.00	96.0
117.00	MHA	6	26.55	44.87	5.220	1.000	0.000	0.0	0.0	234.25	0.00	0.00	0.00	0.00	74.4
117.00	Low Profile platform	1	26.55	44.87	25.550	1.000	0.000	0.0	0.0	1146.58	0.00	0.00	0.00	0.00	1300.0
117.00	DUO4-8670	9	26.55	44.87	58.797	1.000	0.000	0.0	0.0	2638.57	0.00	0.00	0.00	0.00	277.2
127.00	DB950F85E-M	6	27.18	45.94	25.416	1.000	0.000	0.0	0.0	1167.61	0.00	0.00	0.00	0.00	69.0
127.00	Low Profile platform	1	27.18	45.94	25.550	1.000	0.000	0.0	0.0	1173.76	0.00	0.00	0.00	0.00	1300.0
127.00	DB846H80E-SX	6	27.18	45.94	35.220	1.000	0.000	0.0	0.0	1618.00	0.00	0.00	0.00	0.00	126.0
137.00	Low Profile platform	1	27.77	46.94	25.550	1.000	0.000	0.0	0.0	1199.46	0.00	0.00	0.00	0.00	1300.0
137.00	RR90-17-02DP	6	27.77	46.94	20.930	0.667	0.000	0.0	0.0	982.59	0.00	0.00	0.00	0.00	72.0
147.00	Low Profile platform	1	28.34	47.90	25.550	1.000	0.000	0.0	0.0	1223.85	0.00	0.00	0.00	0.00	1300.0
147.00	DB980H90	12	28.34	47.90	26.253	0.667	0.000	0.0	0.0	1257.53	0.00	0.00	0.00	0.00	108.0
										14,894.6	0.00				6,837.2

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ

Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)



Load Case: No Ice 85 mph - No Ice 19 Iterations

Gust Response Factor : 1.69 Effective Wind Speed : 85.00 (mph)

Dead Load Factor : 1.00

Wind Load Factor : 1.00

Applied Forces Summary

Seg Elev (ft)	X Coord (ft)	Z Coord (ft)	Lateral FX (-) (lb)	Axial FY (-) (lb)	Lateral FZ (lb)	Moment MX (lb-ft)	Torsion MY (lb-ft)	Moment MZ (lb-ft)
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
5.00	0.00	0.00	628.78	1,991.87	0.00	0.00	0.00	0.00
10.00	0.00	0.00	616.46	1,952.59	0.00	0.00	0.00	0.00
15.00	0.00	0.00	604.15	1,913.32	0.00	0.00	0.00	0.00
20.00	0.00	0.00	591.83	1,874.04	0.00	0.00	0.00	0.00
25.00	0.00	0.00	579.52	1,834.77	0.00	0.00	0.00	0.00
30.00	0.00	0.00	567.20	1,795.49	0.00	0.00	0.00	0.00
35.00	0.00	0.00	564.30	1,756.22	0.00	0.00	0.00	0.00
40.00	0.00	0.00	573.23	1,716.94	0.00	0.00	0.00	0.00
44.79	0.00	0.00	554.98	1,609.10	0.00	0.00	0.00	0.00
45.00	0.00	0.00	24.02	129.48	0.00	0.00	0.00	0.00
50.00	0.00	0.00	591.58	3,094.14	0.00	0.00	0.00	0.00
53.21	0.00	0.00	379.16	1,947.62	0.00	0.00	0.00	0.00
55.00	0.00	0.00	210.89	504.90	0.00	0.00	0.00	0.00
60.00	0.00	0.00	693.37	1,427.57	0.00	0.00	0.00	0.00
65.00	0.00	0.00	592.79	1,352.65	0.00	0.00	0.00	0.66
70.00	0.00	0.00	590.21	1,318.28	0.00	0.00	0.00	0.00
75.00	0.00	0.00	586.39	1,283.92	0.00	0.00	0.00	0.00
80.00	0.00	0.00	581.44	1,249.55	0.00	0.00	0.00	0.00
85.00	0.00	0.00	575.46	1,215.19	0.00	0.00	0.00	0.00
90.00	0.00	0.00	568.53	1,180.82	0.00	0.00	0.00	0.00
91.09	0.00	0.00	122.18	252.86	0.00	0.00	0.00	0.00
95.00	0.00	0.00	443.79	1,672.41	0.00	0.00	0.00	0.00
97.92	0.00	0.00	327.97	1,224.89	0.00	0.00	0.00	0.00
100.00	0.00	0.00	230.87	399.16	0.00	0.00	0.00	0.00
105.00	0.00	0.00	551.55	940.22	0.00	0.00	0.00	0.00
107.00	0.00	0.00	2,370.05	1,237.84	0.00	0.00	0.00	0.00
110.00	0.00	0.00	322.85	542.92	0.00	0.00	0.00	0.00
115.00	0.00	0.00	530.89	881.31	0.00	0.00	0.00	0.00
117.00	0.00	0.00	4,227.85	1,995.87	0.00	0.00	0.00	0.00
120.00	0.00	0.00	309.61	507.58	0.00	0.00	0.00	0.00
125.00	0.00	0.00	507.65	822.39	0.00	0.00	0.00	0.00
127.00	0.00	0.00	4,158.29	1,815.71	0.00	0.00	0.00	0.00
130.00	0.00	0.00	294.91	472.23	0.00	0.00	0.00	0.00
135.00	0.00	0.00	482.11	763.48	0.00	0.00	0.00	0.00
137.00	0.00	0.00	2,370.53	1,669.15	0.00	0.00	0.00	0.00
137.42	0.00	0.00	39.55	62.29	0.00	0.00	0.00	0.00
140.00	0.00	0.00	243.25	692.73	0.00	0.00	0.00	0.00
142.59	0.00	0.00	240.78	681.86	0.00	0.00	0.00	0.00
145.00	0.00	0.00	220.59	285.53	0.00	0.00	0.00	0.00
147.00	0.00	0.00	2,661.83	1,640.62	0.00	0.00	0.00	0.00
150.00	0.00	0.00	266.56	341.57	0.00	0.00	0.00	0.00
152.00	0.00	0.00	174.57	222.81	0.00	0.00	0.00	0.00
Totals:			31,772.51	50,273.90	0.00	0.00	0.00	0.66

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
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 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ

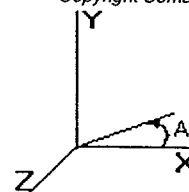
Base Elev : 0.000 (ft)

Top Dia : 33.03 (in)

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Page: 6



Load Case: No Ice 85 mph - No Ice 19 Iterations
 Gust Response Factor : 1.69 Effective Wind Speed : 85.00 (mph)
 Dead Load Factor : 1.00
 Wind Load Factor : 1.00

Calculated Forces and Deflections

Seg Elev (ft)	Lateral FX (-) (kips)	Axial FY (-) (kips)	Lateral FZ (kips)	Moment MX (ft-kips)	Torsion MY (ft-kips)	Moment MZ (ft-kips)	X Deflect (in)	Z Deflect (in)	Total Deflect (in)	Rotation (deg)
0.00	31.796	50.258	0.000	0.000	0.000	3,169.233	0.000	0.000	0.000	0.000
5.00	31.211	48.238	0.000	0.000	0.000	3,010.255	-0.029	0.000	0.029	-0.053
10.00	30.635	46.258	0.000	0.000	0.000	2,854.202	-0.114	0.000	0.114	-0.106
15.00	30.068	44.317	0.000	0.000	0.000	2,701.028	-0.255	0.000	0.255	-0.160
20.00	29.510	42.418	0.000	0.000	0.000	2,550.689	-0.452	0.000	0.452	-0.214
25.00	28.962	40.558	0.000	0.000	0.000	2,403.139	-0.706	0.000	0.706	-0.268
30.00	28.422	38.738	0.000	0.000	0.000	2,258.334	-1.017	0.000	1.017	-0.323
35.00	27.882	36.959	0.000	0.000	0.000	2,116.226	-1.385	0.000	1.385	-0.377
40.00	27.330	35.221	0.000	0.000	0.000	1,976.818	-1.810	0.000	1.810	-0.432
44.79	26.778	33.603	0.000	0.000	0.000	1,845.820	-2.271	0.000	2.271	-0.484
45.00	26.769	33.461	0.000	0.000	0.000	1,840.286	-2.292	0.000	2.292	-0.487
50.00	26.173	30.352	0.000	0.000	0.000	1,706.442	-2.832	0.000	2.832	-0.541
53.21	25.789	28.396	0.000	0.000	0.000	1,622.426	-3.208	0.000	3.208	-0.576
55.00	25.592	27.875	0.000	0.000	0.000	1,576.264	-3.428	0.000	3.428	-0.596
60.00	24.910	26.430	0.000	0.000	0.000	1,448.305	-4.084	0.000	4.084	-0.654
65.00	24.326	25.060	0.000	0.000	0.000	1,323.757	-4.801	0.000	4.801	-0.712
70.00	23.742	23.727	0.000	0.000	0.000	1,202.128	-5.578	0.000	5.578	-0.769
75.00	23.159	22.429	0.000	0.000	0.000	1,083.419	-6.414	0.000	6.414	-0.824
80.00	22.579	21.167	0.000	0.000	0.000	967.624	-7.307	0.000	7.307	-0.878
85.00	22.002	19.942	0.000	0.000	0.000	854.731	-8.255	0.000	8.255	-0.930
90.00	21.424	18.759	0.000	0.000	0.000	744.722	-9.257	0.000	9.257	-0.980
91.09	21.305	18.500	0.000	0.000	0.000	721.370	-9.482	0.000	9.482	-0.991
95.00	20.841	16.824	0.000	0.000	0.000	638.068	-10.310	0.000	10.310	-1.027
97.92	20.497	15.597	0.000	0.000	0.000	577.144	-10.948	0.000	10.948	-1.054
100.00	20.267	15.191	0.000	0.000	0.000	534.579	-11.411	0.000	11.411	-1.072
105.00	19.705	14.252	0.000	0.000	0.000	433.245	-12.558	0.000	12.558	-1.115
107.00	17.316	13.055	0.000	0.000	0.000	393.835	-13.029	0.000	13.029	-1.132
110.00	16.988	12.510	0.000	0.000	0.000	341.889	-13.749	0.000	13.749	-1.155
115.00	16.444	11.634	0.000	0.000	0.000	256.950	-14.977	0.000	14.977	-1.187
117.00	12.177	9.723	0.000	0.000	0.000	224.063	-15.477	0.000	15.477	-1.199
120.00	11.860	9.219	0.000	0.000	0.000	187.531	-16.236	0.000	16.236	-1.214
125.00	11.337	8.405	0.000	0.000	0.000	128.230	-17.521	0.000	17.521	-1.236
127.00	7.141	6.678	0.000	0.000	0.000	105.556	-18.040	0.000	18.040	-1.243
130.00	6.837	6.211	0.000	0.000	0.000	84.132	-18.824	0.000	18.824	-1.251
135.00	6.339	5.458	0.000	0.000	0.000	49.945	-20.141	0.000	20.141	-1.263
137.00	3.933	3.841	0.000	0.000	0.000	37.266	-20.671	0.000	20.671	-1.266
137.42	3.892	3.780	0.000	0.000	0.000	35.601	-20.783	0.000	20.783	-1.266
140.00	3.634	3.093	0.000	0.000	0.000	25.573	-21.468	0.000	21.468	-1.270
142.59	3.378	2.416	0.000	0.000	0.000	16.162	-22.157	0.000	22.157	-1.272
145.00	3.151	2.135	0.000	0.000	0.000	8.021	-22.800	0.000	22.800	-1.273
147.00	0.453	0.554	0.000	0.000	0.000	1.719	-23.333	0.000	23.333	-1.274
150.00	0.179	0.219	0.000	0.000	0.000	0.359	-24.134	0.000	24.134	-1.274
152.00	0.175	0.000	0.000	0.000	0.000	0.000	-24.667	0.000	24.667	-1.274

Pole : CT33XC551
Location: Riley Mountain Rd, Coventry, CT
Height : 152.0 (ft)
Shape : 18 Sides
Base Dia : 75.00 (in)
Taper : 0.290923 (in/ft)

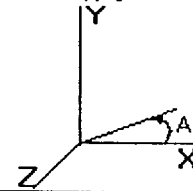
Sprint Sites USA - NJ

Base Elev : 0.000 (ft)
Top Dia : 33.03 (in)

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Page: 7



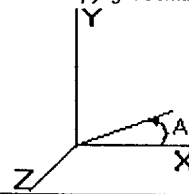
Load Case: No Ice	85 mph - No Ice	19 Iterations
Gust Response Factor : 1.69	Effective Wind Speed : 85.00 (mph)	
Dead Load Factor : 1.00		
Wind Load Factor : 1.00		

Calculated Stresses

Seg Elev (ft)	Applied Stresses							Allowable Stress (Fb) (ksi)	Stress Ratio
	Axial (Y) (ksi)	Shear (X) (ksi)	Shear (Z) (ksi)	Torsion (ksi)	Bending (X) (ksi)	Bending (Z) (ksi)	Combined (ksi)		
0.00	0.425	0.542	0.000	0.000	0.000	17.468	17.917	51.8	0.346
5.00	0.416	0.543	0.000	0.000	0.000	17.261	17.702	52.0	0.341
10.00	0.407	0.543	0.000	0.000	0.000	17.040	17.473	52.0	0.336
15.00	0.398	0.544	0.000	0.000	0.000	16.804	17.228	52.0	0.331
20.00	0.389	0.546	0.000	0.000	0.000	16.551	16.966	52.0	0.326
25.00	0.380	0.547	0.000	0.000	0.000	16.278	16.685	52.0	0.321
30.00	0.371	0.549	0.000	0.000	0.000	15.984	16.382	52.0	0.315
35.00	0.362	0.551	0.000	0.000	0.000	15.666	16.056	52.0	0.309
40.00	0.353	0.552	0.000	0.000	0.000	15.322	15.704	52.0	0.302
44.79	0.344	0.553	0.000	0.000	0.000	14.965	15.340	52.0	0.295
45.00	0.343	0.554	0.000	0.000	0.000	14.950	15.323	52.0	0.295
50.00	0.319	0.554	0.000	0.000	0.000	14.546	14.896	52.0	0.287
53.21	0.341	0.624	0.000	0.000	0.000	15.787	16.165	52.0	0.311
55.00	0.338	0.625	0.000	0.000	0.000	15.609	15.984	52.0	0.308
60.00	0.328	0.624	0.000	0.000	0.000	15.073	15.440	52.0	0.297
65.00	0.319	0.625	0.000	0.000	0.000	14.498	14.857	52.0	0.286
70.00	0.310	0.626	0.000	0.000	0.000	13.874	14.225	52.0	0.274
75.00	0.301	0.627	0.000	0.000	0.000	13.194	13.539	52.0	0.260
80.00	0.292	0.628	0.000	0.000	0.000	12.453	12.792	52.0	0.246
85.00	0.283	0.630	0.000	0.000	0.000	11.643	11.976	52.0	0.230
90.00	0.274	0.631	0.000	0.000	0.000	10.755	11.084	52.0	0.213
91.09	0.272	0.632	0.000	0.000	0.000	10.554	10.882	52.0	0.209
95.00	0.253	0.633	0.000	0.000	0.000	9.787	10.100	52.0	0.194
97.92	0.274	0.727	0.000	0.000	0.000	10.331	10.680	52.0	0.205
100.00	0.271	0.728	0.000	0.000	0.000	9.817	10.166	52.0	0.196
105.00	0.262	0.730	0.000	0.000	0.000	8.473	8.826	52.0	0.170
107.00	0.243	0.650	0.000	0.000	0.000	7.903	8.223	52.0	0.158
110.00	0.238	0.650	0.000	0.000	0.000	7.135	7.458	52.0	0.143
115.00	0.228	0.651	0.000	0.000	0.000	5.735	6.069	52.0	0.117
117.00	0.194	0.488	0.000	0.000	0.000	5.140	5.400	52.0	0.104
120.00	0.187	0.486	0.000	0.000	0.000	4.486	4.749	52.0	0.091
125.00	0.177	0.481	0.000	0.000	0.000	3.297	3.572	52.0	0.069
127.00	0.143	0.308	0.000	0.000	0.000	2.795	2.986	52.0	0.057
130.00	0.136	0.301	0.000	0.000	0.000	2.331	2.521	52.0	0.049
135.00	0.124	0.290	0.000	0.000	0.000	1.495	1.695	52.0	0.033
137.00	0.089	0.183	0.000	0.000	0.000	1.152	1.280	52.0	0.025
137.42	0.088	0.182	0.000	0.000	0.000	1.108	1.236	52.0	0.024
140.00	0.073	0.173	0.000	0.000	0.000	0.830	0.952	52.0	0.018
142.59	0.069	0.194	0.000	0.000	0.000	0.631	0.776	52.0	0.015
145.00	0.062	0.184	0.000	0.000	0.000	0.326	0.502	52.0	0.010
147.00	0.016	0.027	0.000	0.000	0.000	0.072	0.100	52.0	0.002
150.00	0.007	0.011	0.000	0.000	0.000	0.016	0.029	52.0	0.001
152.00	0.000	0.011	0.000	0.000	0.000	0.000	0.019	52.0	0.000

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ
 Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)



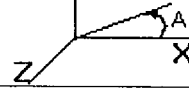
Load Case: Ice	85 mph - With Ice - Ice Thickness = 0.5 in	19 Iterations
Gust Response Factor : 1.69	Effective Wind Speed : 73.61 (mph)	
Dead Load Factor : 1.00		
Wind Load Factor : 1.00		

Shaft Forces

Seg Top Elev (ft)	Description	Kz	qz (psf)	qzGh (psf)	C (mph-ft)	Cf	Tributary (ft)	Aa (sf)	CfAa (sf)	Wind Force X (lb)	Wind Force Z (lb)	Weight (lb)
0.00		1.00	13.87	23.44	460.06	0.650	0.00	0.000	0.000	0.00	0.00	0.0
5.00		1.00	13.87	23.44	451.14	0.650	5.00	31.364	20.386	477.90	0.00	2,220.4
10.00		1.00	13.87	23.44	442.22	0.650	5.00	30.758	19.992	468.67	0.00	2,176.6
15.00		1.00	13.87	23.44	433.29	0.650	5.00	30.151	19.598	459.43	0.00	2,132.8
20.00		1.00	13.87	23.44	424.37	0.650	5.00	29.545	19.204	450.20	0.00	2,089.1
25.00		1.00	13.87	23.44	415.45	0.650	5.00	28.939	18.811	440.96	0.00	2,045.3
30.00		1.00	13.87	23.44	406.52	0.650	5.00	28.333	18.417	431.73	0.00	2,001.5
35.00		1.01	14.10	23.84	400.96	0.650	5.00	27.727	18.023	429.65	0.00	1,957.8
40.00		1.05	14.65	24.76	399.51	0.650	5.00	27.121	17.629	436.60	0.00	1,914.0
44.79	Bot - Section 2	1.09	15.13	25.58	397.09	0.650	4.79	25.431	16.530	422.85	0.00	1,793.9
45.00		1.09	15.15	25.61	396.96	0.650	0.21	1.099	0.714	18.30	0.00	137.5
50.00		1.12	15.62	26.39	393.51	0.650	5.00	26.273	17.078	450.80	0.00	3,284.9
53.21	Top - Section 1	1.14	15.90	26.87	390.89	0.650	3.21	16.548	10.756	289.03	0.00	2,068.3
55.00		1.15	16.05	27.12	395.08	0.650	1.79	9.119	5.928	160.79	0.00	571.6
60.00	Appertunance(s)	1.18	16.45	27.80	390.31	0.650	5.00	25.061	16.290	453.00	0.00	1,568.8
65.00		1.21	16.83	28.45	384.96	0.650	5.00	24.455	15.896	452.27	0.00	1,530.0
70.00		1.24	17.19	29.06	379.13	0.650	5.00	23.849	15.502	450.50	0.00	1,491.1
75.00		1.26	17.53	29.63	372.85	0.650	5.00	23.243	15.108	447.79	0.00	1,452.3
80.00		1.28	17.86	30.19	366.18	0.650	5.00	22.637	14.714	444.23	0.00	1,413.4
85.00		1.31	18.17	30.71	359.15	0.650	5.00	22.031	14.320	439.89	0.00	1,374.6
90.00		1.33	18.47	31.22	351.79	0.650	5.00	21.425	13.926	434.83	0.00	1,335.7
91.09	Bot - Section 3	1.33	18.54	31.33	350.15	0.650	1.09	4.590	2.984	93.48	0.00	286.4
95.00		1.35	18.76	31.71	344.14	0.650	3.91	16.473	10.707	339.53	0.00	1,791.8
97.92	Top - Section 2	1.36	18.92	31.98	339.54	0.650	2.92	12.074	7.848	251.03	0.00	1,312.6
100.00		1.37	19.04	32.17	341.61	0.650	2.08	8.451	5.493	176.76	0.00	460.7
105.00		1.39	19.30	32.63	333.47	0.650	5.00	19.919	12.947	422.47	0.00	1,083.9
107.00	Appertunance(s)	1.39	19.41	32.80	330.15	0.650	2.00	7.798	5.069	166.28	0.00	424.6
110.00		1.41	19.56	33.06	325.10	0.650	3.00	11.515	7.485	247.50	0.00	626.5
115.00		1.42	19.81	33.49	316.50	0.650	5.00	18.707	12.159	407.21	0.00	1,016.1
117.00	Appertunance(s)	1.43	19.91	33.65	313.01	0.650	2.00	7.313	4.753	159.98	0.00	397.5
120.00		1.44	20.05	33.89	307.71	0.650	3.00	10.788	7.012	237.70	0.00	585.7
125.00		1.46	20.29	34.29	298.71	0.650	5.00	17.495	11.371	390.01	0.00	948.2
127.00	Appertunance(s)	1.47	20.38	34.45	295.06	0.650	2.00	6.828	4.438	152.91	0.00	370.3
130.00		1.48	20.52	34.68	289.54	0.650	3.00	10.060	6.539	226.80	0.00	545.0
135.00		1.49	20.74	35.05	280.19	0.650	5.00	16.282	10.584	371.05	0.00	880.3
137.00	Appertunance(s)	1.50	20.83	35.20	276.41	0.650	2.00	6.343	4.123	145.16	0.00	343.1
137.42	Bot - Section 4	1.50	20.85	35.23	275.60	0.650	0.42	1.330	0.865	30.47	0.00	72.0
140.00		1.51	20.96	35.42	270.68	0.650	2.58	8.137	5.289	187.37	0.00	751.6
142.59	Top - Section 3	1.51	21.07	35.61	265.69	0.650	2.59	8.017	5.211	185.57	0.00	739.8
145.00		1.52	21.17	35.78	265.75	0.650	2.41	7.314	4.754	170.11	0.00	338.4
147.00	Appertunance(s)	1.53	21.25	35.92	261.86	0.650	2.00	5.963	3.876	139.22	0.00	275.8
150.00		1.54	21.37	36.13	255.97	0.650	3.00	8.762	5.695	205.78	0.00	404.7
152.00		1.54	21.46	36.26	252.01	0.650	2.00	5.720	3.718	134.85	0.00	264.2
Totals:							152.00			12,900.67	0.00	48,478.8

Pole : CT33XC551 **Sprint Sites USA - NJ**
Location: Riley Mountain Rd, Coventry, CT
Height : 152.0 (ft) **Base Elev :** 0.000 (ft)
Shape : 18 Sides
Base Dia : 75.00 (in) **Top Dia :** 33.03 (in)
Taper : 0.290923 (in/ft)

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 Page: 9



Load Case: Ice **85 mph - With Ice - Ice Thickness = 0.5 in** **19 Iterations**
Gust Response Factor : 1.69 **Effective Wind Speed :** 73.61 (mph)
Dead Load Factor : 1.00
Wind Load Factor : 1.00

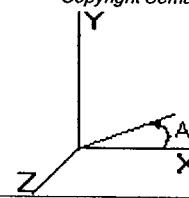
Discrete Appurtenance Forces

Elev (ft)	Description	Qty	qz (psf)	qzGh (psf)	Total CaAa (sf)	CaAa Factor	Horiz Ecc (ft)	Vert Ecc (ft)	X Angle (deg)	Wind Force X (lb)	Wind Force Z (lb)	Mom X (lb-ft)	Mom Y (lb-ft)	Mom Z (lb-ft)	Weight (lb)
60.00	Standoff	1	16.45	27.80	4.340	1.000	0.000	0.0	0.0	120.69	0.00	0.00	0.00	0.00	63.0
60.00	Kathrein 738 449	1	16.48	27.85	0.100	1.000	0.000	0.4	0.0	2.79	0.00	0.00	0.00	0.99	1.2
107.00	T-Arms	3	19.41	32.80	42.600	1.000	0.000	0.0	0.0	1397.55	0.00	0.00	0.00	0.00	1008.0
107.00	Allgon 7250	6	19.41	32.80	20.010	0.667	0.000	0.0	0.0	656.46	0.00	0.00	0.00	0.00	216.0
117.00	MHA	6	19.91	33.65	6.360	1.000	0.000	0.0	0.0	214.05	0.00	0.00	0.00	0.00	108.6
117.00	Low Profile platform	1	19.91	33.65	27.320	1.000	0.000	0.0	0.0	919.45	0.00	0.00	0.00	0.00	2100.0
117.00	DUO4-8670	9	19.91	33.65	64.350	1.000	0.000	0.0	0.0	2165.69	0.00	0.00	0.00	0.00	657.0
127.00	DB950F85E-M	6	20.38	34.45	28.890	1.000	0.000	0.0	0.0	995.34	0.00	0.00	0.00	0.00	203.6
127.00	Low Profile platform	1	20.38	34.45	27.320	1.000	0.000	0.0	0.0	941.25	0.00	0.00	0.00	0.00	2100.0
127.00	DB846H80E-SX	6	20.38	34.45	39.360	1.000	0.000	0.0	0.0	1356.06	0.00	0.00	0.00	0.00	356.4
137.00	Low Profile platform	1	20.83	35.20	27.320	1.000	0.000	0.0	0.0	961.86	0.00	0.00	0.00	0.00	2100.0
137.00	RR90-17-02DP	6	20.83	35.20	23.212	0.667	0.000	0.0	0.0	817.21	0.00	0.00	0.00	0.00	210.0
147.00	Low Profile platform	1	21.25	35.92	27.320	1.000	0.000	0.0	0.0	981.41	0.00	0.00	0.00	0.00	2100.0
147.00	DB980H90	12	21.25	35.92	30.815	0.667	0.000	0.0	0.0	1106.98	0.00	0.00	0.00	0.00	336.0
										12,636.7	0.00				11,559.8

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ

Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)



Load Case: Ice

85 mph - With Ice - Ice Thickness = 0.5 in

19 Iterations

Gust Response Factor : 1.69
 Dead Load Factor : 1.00
 Wind Load Factor : 1.00

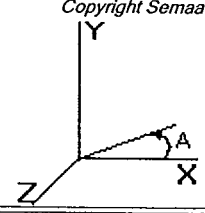
Effective Wind Speed : 73.61 (mph)

Applied Forces Summary

Seg Elev (ft)	X Coord (ft)	Z Coord (ft)	Lateral FX (-) (lb)	Axial FY (-) (lb)	Lateral FZ (lb)	Moment MX (lb-ft)	Torsion MY (lb-ft)	Moment MZ (lb-ft)
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
5.00	0.00	0.00	477.90	2,220.35	0.00	0.00	0.00	0.00
10.00	0.00	0.00	468.67	2,176.59	0.00	0.00	0.00	0.00
15.00	0.00	0.00	459.43	2,132.82	0.00	0.00	0.00	0.00
20.00	0.00	0.00	450.20	2,089.06	0.00	0.00	0.00	0.00
25.00	0.00	0.00	440.96	2,045.30	0.00	0.00	0.00	0.00
30.00	0.00	0.00	431.73	2,001.54	0.00	0.00	0.00	0.00
35.00	0.00	0.00	429.65	1,957.77	0.00	0.00	0.00	0.00
40.00	0.00	0.00	436.60	1,914.01	0.00	0.00	0.00	0.00
44.79	0.00	0.00	422.85	1,793.90	0.00	0.00	0.00	0.00
45.00	0.00	0.00	18.30	137.55	0.00	0.00	0.00	0.00
50.00	0.00	0.00	450.80	3,284.93	0.00	0.00	0.00	0.00
53.21	0.00	0.00	289.03	2,068.26	0.00	0.00	0.00	0.00
55.00	0.00	0.00	160.79	571.60	0.00	0.00	0.00	0.00
60.00	0.00	0.00	576.47	1,633.01	0.00	0.00	0.00	0.00
65.00	0.00	0.00	452.27	1,529.97	0.00	0.00	0.00	0.99
70.00	0.00	0.00	450.50	1,491.12	0.00	0.00	0.00	0.00
75.00	0.00	0.00	447.79	1,452.26	0.00	0.00	0.00	0.00
80.00	0.00	0.00	444.23	1,413.41	0.00	0.00	0.00	0.00
85.00	0.00	0.00	439.89	1,374.55	0.00	0.00	0.00	0.00
90.00	0.00	0.00	434.83	1,335.70	0.00	0.00	0.00	0.00
91.09	0.00	0.00	93.48	286.41	0.00	0.00	0.00	0.00
95.00	0.00	0.00	339.53	1,791.82	0.00	0.00	0.00	0.00
97.92	0.00	0.00	251.03	1,312.63	0.00	0.00	0.00	0.00
100.00	0.00	0.00	176.76	460.72	0.00	0.00	0.00	0.00
105.00	0.00	0.00	422.47	1,083.94	0.00	0.00	0.00	0.00
107.00	0.00	0.00	2,220.30	1,648.61	0.00	0.00	0.00	0.00
110.00	0.00	0.00	247.50	626.47	0.00	0.00	0.00	0.00
115.00	0.00	0.00	407.21	1,016.06	0.00	0.00	0.00	0.00
117.00	0.00	0.00	3,459.16	3,263.06	0.00	0.00	0.00	0.00
120.00	0.00	0.00	237.70	585.73	0.00	0.00	0.00	0.00
125.00	0.00	0.00	390.01	948.17	0.00	0.00	0.00	0.00
127.00	0.00	0.00	3,445.56	3,030.28	0.00	0.00	0.00	0.00
130.00	0.00	0.00	226.80	545.00	0.00	0.00	0.00	0.00
135.00	0.00	0.00	371.05	880.28	0.00	0.00	0.00	0.00
137.00	0.00	0.00	1,924.23	2,653.15	0.00	0.00	0.00	0.00
137.42	0.00	0.00	30.47	71.99	0.00	0.00	0.00	0.00
140.00	0.00	0.00	187.37	751.60	0.00	0.00	0.00	0.00
142.59	0.00	0.00	185.57	739.83	0.00	0.00	0.00	0.00
145.00	0.00	0.00	170.11	338.43	0.00	0.00	0.00	0.00
147.00	0.00	0.00	2,227.62	2,711.80	0.00	0.00	0.00	0.00
150.00	0.00	0.00	205.78	404.73	0.00	0.00	0.00	0.00
152.00	0.00	0.00	134.85	264.19	0.00	0.00	0.00	0.00
Totals:			25,537.46	60,038.58	0.00	0.00	0.00	0.99

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ
 Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)



Load Case: Ice 85 mph - With Ice - Ice Thickness = 0.5 in 19 Iterations

Gust Response Factor : 1.69 Effective Wind Speed : 73.61 (mph)

Dead Load Factor : 1.00

Wind Load Factor : 1.00

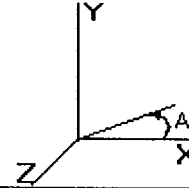
Calculated Forces and Deflections

Seg Elev (ft)	Lateral FX (-) (kips)	Axial FY (-) (kips)	Lateral FZ (kips)	Moment MX (ft-kips)	Torsion MY (ft-kips)	Moment MZ (ft-kips)	X Deflect (in)	Z Deflect (in)	Total Deflect (in)	Rotation (deg)
0.00	25.561	60.028	0.000	0.000	0.000	2,585.575	0.000	0.000	0.000	0.000
5.00	25.126	57.789	0.000	0.000	0.000	2,457.775	-0.024	0.000	0.024	-0.043
10.00	24.697	55.594	0.000	0.000	0.000	2,332.149	-0.093	0.000	0.093	-0.087
15.00	24.274	53.444	0.000	0.000	0.000	2,208.667	-0.208	0.000	0.208	-0.131
20.00	23.858	51.338	0.000	0.000	0.000	2,087.297	-0.369	0.000	0.369	-0.175
25.00	23.449	49.276	0.000	0.000	0.000	1,968.007	-0.577	0.000	0.577	-0.219
30.00	23.045	47.258	0.000	0.000	0.000	1,850.766	-0.831	0.000	0.831	-0.264
35.00	22.641	45.285	0.000	0.000	0.000	1,735.542	-1.132	0.000	1.132	-0.309
40.00	22.227	43.356	0.000	0.000	0.000	1,622.338	-1.480	0.000	1.480	-0.353
44.79	21.808	41.557	0.000	0.000	0.000	1,515.800	-1.857	0.000	1.857	-0.396
45.00	21.806	41.410	0.000	0.000	0.000	1,511.293	-1.874	0.000	1.874	-0.398
50.00	21.355	38.115	0.000	0.000	0.000	1,402.265	-2.316	0.000	2.316	-0.443
53.21	21.064	36.041	0.000	0.000	0.000	1,333.716	-2.624	0.000	2.624	-0.472
55.00	20.918	35.459	0.000	0.000	0.000	1,296.012	-2.805	0.000	2.805	-0.488
60.00	20.356	33.814	0.000	0.000	0.000	1,191.420	-3.342	0.000	3.342	-0.536
65.00	19.915	32.272	0.000	0.000	0.000	1,089.644	-3.930	0.000	3.930	-0.584
70.00	19.473	30.770	0.000	0.000	0.000	990.071	-4.567	0.000	4.567	-0.630
75.00	19.032	29.308	0.000	0.000	0.000	892.705	-5.252	0.000	5.252	-0.676
80.00	18.592	27.886	0.000	0.000	0.000	797.546	-5.985	0.000	5.985	-0.720
85.00	18.154	26.504	0.000	0.000	0.000	704.587	-6.763	0.000	6.763	-0.763
90.00	17.711	25.167	0.000	0.000	0.000	613.819	-7.585	0.000	7.585	-0.804
91.09	17.623	24.876	0.000	0.000	0.000	594.514	-7.770	0.000	7.770	-0.813
95.00	17.268	23.081	0.000	0.000	0.000	525.611	-8.450	0.000	8.450	-0.844
97.92	17.004	21.767	0.000	0.000	0.000	475.133	-8.973	0.000	8.973	-0.865
100.00	16.830	21.302	0.000	0.000	0.000	439.822	-9.353	0.000	9.353	-0.880
105.00	16.399	20.218	0.000	0.000	0.000	355.674	-10.296	0.000	10.296	-0.916
107.00	14.158	18.601	0.000	0.000	0.000	322.876	-10.683	0.000	10.683	-0.929
110.00	13.907	17.973	0.000	0.000	0.000	280.404	-11.273	0.000	11.273	-0.948
115.00	13.488	16.960	0.000	0.000	0.000	210.869	-12.282	0.000	12.282	-0.975
117.00	9.976	13.755	0.000	0.000	0.000	183.893	-12.693	0.000	12.693	-0.984
120.00	9.732	13.170	0.000	0.000	0.000	153.965	-13.316	0.000	13.316	-0.997
125.00	9.328	12.227	0.000	0.000	0.000	105.305	-14.371	0.000	14.371	-1.015
127.00	5.830	9.258	0.000	0.000	0.000	86.649	-14.797	0.000	14.797	-1.020
130.00	5.595	8.717	0.000	0.000	0.000	69.160	-15.441	0.000	15.441	-1.028
135.00	5.209	7.843	0.000	0.000	0.000	41.186	-16.522	0.000	16.522	-1.037
137.00	3.237	5.225	0.000	0.000	0.000	30.768	-16.957	0.000	16.957	-1.039
137.42	3.205	5.153	0.000	0.000	0.000	29.398	-17.050	0.000	17.050	-1.040
140.00	3.004	4.405	0.000	0.000	0.000	21.139	-17.612	0.000	17.612	-1.043
142.59	2.806	3.669	0.000	0.000	0.000	13.358	-18.178	0.000	18.178	-1.044
145.00	2.629	3.333	0.000	0.000	0.000	6.596	-18.705	0.000	18.705	-1.045
147.00	0.353	0.663	0.000	0.000	0.000	1.337	-19.144	0.000	19.144	-1.046
150.00	0.140	0.262	0.000	0.000	0.000	0.279	-19.801	0.000	19.801	-1.046
152.00	0.135	0.000	0.000	0.000	0.000	0.000	-20.239	0.000	20.239	-1.046

Pole : CT33XC551
 Location: Riley Mountain Rd, Coventry, CT
 Height : 152.0 (ft)
 Shape : 18 Sides
 Base Dia : 75.00 (in)
 Taper : 0.290923 (in/ft)

Sprint Sites USA - NJ

Base Elev : 0.000 (ft)
 Top Dia : 33.03 (in)



Load Case: Ice

85 mph - With Ice - Ice Thickness = 0.5 in

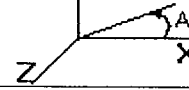
19 Iterations

Gust Response Factor : 1.69 Effective Wind Speed : 73.61 (mph)
 Dead Load Factor : 1.00
 Wind Load Factor : 1.00

Calculated Stresses

Seg Elev (ft)	Applied Stresses							Allowable Stress (Fb) (ksi)	Stress Ratio
	Axial (Y) (ksi)	Shear (X) (ksi)	Shear (Z) (ksi)	Torsion (ksi)	Bending (X) (ksi)	Bending (Z) (ksi)	Combined (ksi)		
0.00	0.508	0.436	0.000	0.000	0.000	14.251	14.778	51.8	0.285
5.00	0.499	0.437	0.000	0.000	0.000	14.093	14.611	52.0	0.281
10.00	0.489	0.438	0.000	0.000	0.000	13.924	14.433	52.0	0.278
15.00	0.480	0.440	0.000	0.000	0.000	13.741	14.241	52.0	0.274
20.00	0.471	0.441	0.000	0.000	0.000	13.544	14.036	52.0	0.270
25.00	0.462	0.443	0.000	0.000	0.000	13.330	13.814	52.0	0.266
30.00	0.453	0.445	0.000	0.000	0.000	13.099	13.574	52.0	0.261
35.00	0.444	0.447	0.000	0.000	0.000	12.848	13.314	52.0	0.256
40.00	0.435	0.449	0.000	0.000	0.000	12.574	13.032	52.0	0.251
44.79	0.426	0.451	0.000	0.000	0.000	12.290	12.740	52.0	0.245
45.00	0.425	0.451	0.000	0.000	0.000	12.277	12.726	52.0	0.245
50.00	0.401	0.452	0.000	0.000	0.000	11.953	12.379	52.0	0.238
53.21	0.433	0.510	0.000	0.000	0.000	12.978	13.440	52.0	0.259
55.00	0.430	0.511	0.000	0.000	0.000	12.834	13.293	52.0	0.256
60.00	0.420	0.510	0.000	0.000	0.000	12.400	12.850	52.0	0.247
65.00	0.411	0.511	0.000	0.000	0.000	11.934	12.377	52.0	0.238
70.00	0.402	0.513	0.000	0.000	0.000	11.426	11.862	52.0	0.228
75.00	0.394	0.515	0.000	0.000	0.000	10.871	11.300	52.0	0.217
80.00	0.385	0.517	0.000	0.000	0.000	10.264	10.687	52.0	0.206
85.00	0.376	0.520	0.000	0.000	0.000	9.598	10.015	52.0	0.193
90.00	0.368	0.522	0.000	0.000	0.000	8.865	9.277	52.0	0.178
91.09	0.366	0.523	0.000	0.000	0.000	8.698	9.109	52.0	0.175
95.00	0.348	0.524	0.000	0.000	0.000	8.062	8.459	52.0	0.163
97.92	0.383	0.603	0.000	0.000	0.000	8.505	8.949	52.0	0.172
100.00	0.380	0.604	0.000	0.000	0.000	8.077	8.521	52.0	0.164
105.00	0.372	0.608	0.000	0.000	0.000	6.956	7.402	52.0	0.142
107.00	0.346	0.531	0.000	0.000	0.000	6.479	6.887	52.0	0.133
110.00	0.341	0.532	0.000	0.000	0.000	5.852	6.261	52.0	0.120
115.00	0.333	0.534	0.000	0.000	0.000	4.706	5.123	52.0	0.099
117.00	0.274	0.400	0.000	0.000	0.000	4.219	4.545	52.0	0.087
120.00	0.268	0.399	0.000	0.000	0.000	3.683	4.011	52.0	0.077
125.00	0.258	0.396	0.000	0.000	0.000	2.707	3.043	52.0	0.059
127.00	0.198	0.251	0.000	0.000	0.000	2.294	2.530	52.0	0.049
130.00	0.191	0.247	0.000	0.000	0.000	1.916	2.149	52.0	0.041
135.00	0.178	0.239	0.000	0.000	0.000	1.233	1.470	52.0	0.028
137.00	0.121	0.151	0.000	0.000	0.000	0.951	1.103	52.0	0.021
137.42	0.119	0.150	0.000	0.000	0.000	0.915	1.066	52.0	0.021
140.00	0.104	0.143	0.000	0.000	0.000	0.686	0.828	52.0	0.016
142.59	0.104	0.161	0.000	0.000	0.000	0.521	0.685	52.0	0.013
145.00	0.097	0.154	0.000	0.000	0.000	0.268	0.451	52.0	0.009
147.00	0.020	0.021	0.000	0.000	0.000	0.056	0.084	52.0	0.002
150.00	0.008	0.009	0.000	0.000	0.000	0.012	0.025	52.0	0.000
152.00	0.000	0.008	0.000	0.000	0.000	0.000	0.015	52.0	0.000

Pole : CT33XC551 **Sprint Sites USA - NJ**
Location: Riley Mountain Rd, Coventry, CT
Height : 152.0 (ft) **Base Elev :** 0.000 (ft)
Shape : 18 Sides
Base Dia : 75.00 (in) **Top Dia :** 33.03 (in)
Taper : 0.290923 (in/ft)



Load Case: No Ice	85 mph - No Ice	19 Iterations
Gust Response Factor : 1.69	Effective Wind Speed : 85.00 (mph)	
Dead Load Factor : 1.00		
Wind Load Factor : 1.00		

Analysis Summary

Load Case	Reactions						Max Stresses			
	Shear FX (kips)	Shear FZ (kips)	Axial FY (kips)	Moment MX (ft-kips)	Moment MY (ft-kips)	Moment MZ (ft-kips)	Combined Stress (ksi)	Allowable Stress (ksi)	Elev (ft)	Stress Ratio
No Ice	31.796	0.000	50.258	0.000	0.000	3,169.233	17.917	51.8	0.000	0.346
Ice	25.561	0.000	60.028	0.000	0.000	2,585.575	14.778	51.8	0.000	0.285

Cellco Partnership

d.b.a. **verizon** wireless

SOMERS II

400 MAIN STREET
SOMERS, CONNECTICUT 06071

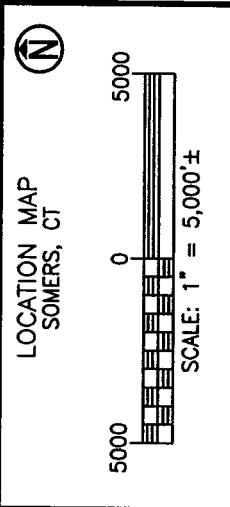
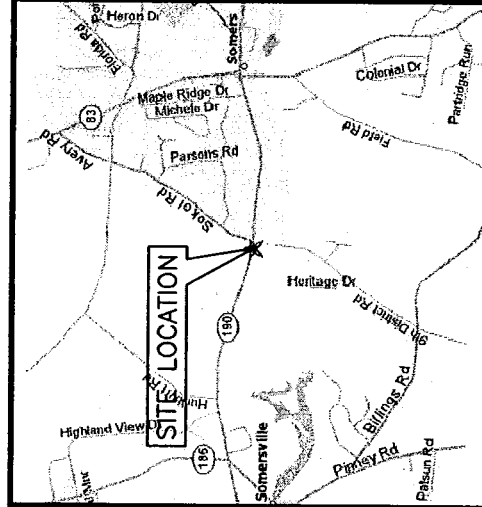
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1. THIS DOCUMENT WAS DEVELOPED TO REFLECT A SPECIFIC SITE AND ITS SITE CONDITIONS AND IS NOT TO BE USED FOR ANOTHER SITE OR WHEN OTHER CONDITIONS PERTAIN. REUSE OF THIS DOCUMENT IS AT THE SOLE RISK OF THE USER.

STRUCTURAL NOTE:

1. NEW CONSTRUCTION REPRESENTED ON THESE PLANS IS PROPOSED PREDICATED ON THE REQUIREMENT THAT A STRUCTURAL ANALYSIS BE PERFORMED BY A LICENSED CONNECTICUT PROFESSIONAL STRUCTURAL ENGINEER AND CERTIFICATION IS GIVEN BY THE ENGINEER THAT THE EXISTING TOWER AND ALL EXISTING AND PROPOSED ANTENNAS AND APPURTENANCES SUPPORTED BY THE TOWER AND ANY REQUIRED IMPROVEMENTS AND REINFORCEMENTS HAVE SUFFICIENT STRUCTURAL CAPACITY AND COMPLY WITH THE CONNECTICUT BUILDING CODE AND ALL APPLICABLE EIA/TIA CRITERIA. NO WORK PROPOSED HEREON SHALL BE PROGRESSED WITHOUT CONFIRMATION OF THIS CERTIFICATION.

DIRECTIONS:

191-NORTH TO EXIT 47E. FOLLOW APPROXIMATE 6.25 MILES TO SITE



PROJECT SUMMARY

SITE NAME: SOMERS II
SITE ADDRESS: 400 MAIN STREET
SOMERS, CT 06071
OWNER: CROWN CASTLE INTERNATIONAL
TEL (877) 486-9377
LESSEE: CELCO PARTNERSHIP
d.b.a. VERIZON WIRELESS
99 EAST RIVER DRIVE
EAST HARTFORD, CT 06108
APPLICANT: CELCO PARTNERSHIP
d.b.a. VERIZON WIRELESS
99 EAST RIVER DRIVE
EAST HARTFORD, CT 06108
CONTACT PERSON: SANDY CARTER
CELCO PARTNERSHIP
(860) 830-8279

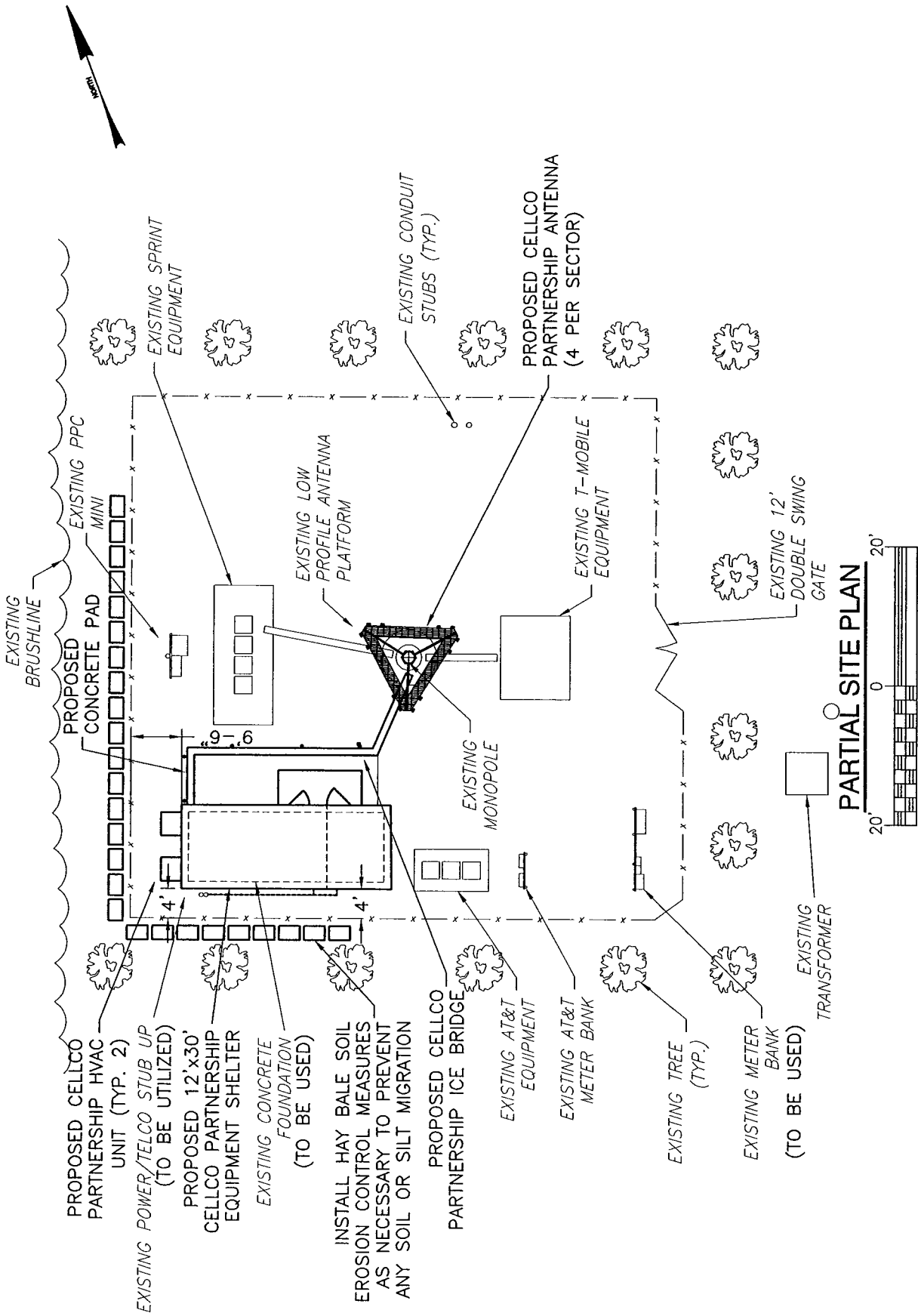
COORDINATES: LATITUDE: 41°-59'-01.47" N (NAD 83)
LONGITUDE: 72°-27'-55.85" W (NAD 83)

SHEET INDEX	
SHEET NO.	DESCRIPTION
T-1	TITLE SHEET
S-1	PARTIAL SITE PLAN
S-2	MONOPOLE ELEVATION

NOTE:
DRAWINGS FOR SITING COUNCIL ONLY. NOT TO BE USED FOR CONSTRUCTION.

1		03/04/05		RPG	FINAL SITING COUNCIL
0		03/04/05		RPG	FINAL SITING COUNCIL
B		03/01/05		JRF	PRELIMINARY SITING COUNCIL
A		02/25/05		JRF	PRELIMINARY SITING COUNCIL
NO.	NO.	DATE	BY	DESCRIPTION	

SCALE: AS SHOWN		DESIGNED BY: CKD		DATE: 02/25/05	
Dewberry-Goodkind, Inc. A Dewberry Company 59 Elm Street, Suite 101 New Haven, CT 06510 P. (203) 776-2277 F. (203) 776-2288		Engineers Planners Surveyors		SOMERS II 400 MAIN STREET SOMERS, CT 06071	
CELLCO Partnership		d.b.a. verizon wireless		PROJECT: 2000018052 LOCATION CODE: 117988	
				SHEET NO. T-1	



Celco Partnership
 d.b.a. **verizon** wireless

PARTIAL SITE PLAN
 SITE NAME: SOMERS II
 400 MAIN STREET
 SOMERS, CT 06071

SCALE: 1" = 20'
 AS SHOWN
 DESIGNED BY: CKD
 DATE: 02/25/05

Dewberry-Goodkind, Inc.
 A Dewberry Company
 Engineers
 Planners
 Surveyors
 59 Elm Street, Suite 101
 New Haven, CT 06510
 P. (203) 776-2277
 F. (203) 776-2388

NO.	DATE	BY	DESCRIPTION
1	03/04/05	IRPG	FINAL SITING COUNCIL
0	03/04/05	IRPG	FINAL SITING COUNCIL
B	03/01/05	JRF	PRELIMINARY SITING COUNCIL
A	02/25/05	JRF	PRELIMINARY SITING COUNCIL

PROJECT: 2000018052
 LOCATION CODE: 117988
 SHEET NO. S-1

PROPOSED RAD CENTER FOR CELCO PARTNERSHIP ANTENNAS 178' AGL
 APPROX. RAD CENTER FOR COLOCATOR (AT&T) ANTENNAS 158' AGL
 TOP OF MONOPOLE 189' AGL
 RAD CENTER FOR COLOCATOR (SPRINT) ANTENNAS 188' AGL
 RAD CENTER FOR COLOCATOR (T-MOBILE) ANTENNAS 167' AGL

PROPOSED CELCO PARTNERSHIP COAX ROUTED INSIDE MONOPOLE TO ANTENNAS

PROPOSED CELCO PARTNERSHIP GPS ANTENNA APPROX. 15' AGL MOUNTED TO ICE BRIDGE POST (TYP OF 2)

PROPOSED CELCO PARTNERSHIP ICE BRIDGE

PROPOSED 12'x30' CELCO PARTNERSHIP EQUIPMENT SHELTER

EXISTING CHAIN LINK FENCE

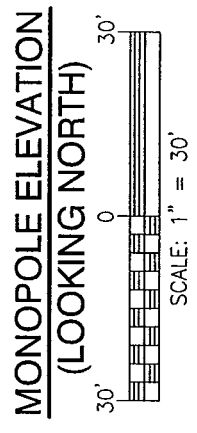
EXISTING TREE (TYP.)

EXISTING MONOPOLE
 EXISTING GPS ANTENNA

EXISTING AT&T EQUIPMENT SHELTER

EXISTING T-MOBILE EQUIPMENT

EXISTING CHAIN LINK FENCE



NO.	DATE	BY	DESCRIPTION
1	03/04/05	RPG	FINAL SITING COUNCIL
0	03/04/05	RPG	FINAL SITING COUNCIL
B	03/01/05	JRF	PRELIMINARY SITING COUNCIL
A	02/25/05	JRF	PRELIMINARY SITING COUNCIL

Dewberry-Goodkind, Inc. <small>A Dewberry Company</small> 59 Elm Street, Suite 101 New Haven, CT 06510 P. (203) 775-2277 F. (203) 776-2888		SCALE: AS SHOWN DESIGNED BY: CKD DATE: 02/25/05	CELLCO PARTNERSHIP d.b.a. verizon wireless
PROPOSED RAD CENTER FOR CELCO PARTNERSHIP ANTENNAS 178' AGL APPROX. RAD CENTER FOR COLOCATOR (AT&T) ANTENNAS 158' AGL TOP OF MONOPOLE 189' AGL RAD CENTER FOR COLOCATOR (SPRINT) ANTENNAS 188' AGL RAD CENTER FOR COLOCATOR (T-MOBILE) ANTENNAS 167' AGL		MONOPOLE ELEVATION	
PROPOSED CELCO PARTNERSHIP COAX ROUTED INSIDE MONOPOLE TO ANTENNAS PROPOSED CELCO PARTNERSHIP GPS ANTENNA APPROX. 15' AGL MOUNTED TO ICE BRIDGE POST (TYP OF 2) PROPOSED CELCO PARTNERSHIP ICE BRIDGE PROPOSED 12'x30' CELCO PARTNERSHIP EQUIPMENT SHELTER EXISTING CHAIN LINK FENCE EXISTING TREE (TYP.)		SITE NAME: SOMERS II 400 MAIN STREET SOMERS, CT 06071	
PROJECT: 2000018052 LOCATION CODE: 117988		SHEET NO. S - 2	

General Power Density

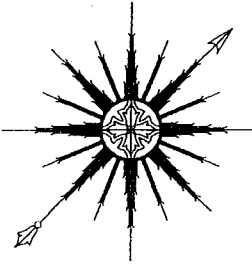
Site Name: Somers 2, CT
 Tower Height: 178 ft rad center

Operator	Operating Frequency (MHz)	Number of Trans	ERP Per Trans (watts)	Total ERP (watts)	Distance to Target (feet)	Calculated Power Density (mW/cm ²)	Maximum Permissible Exposure (mW/cm ²)	Fraction of MPE (%)
Verizon	880	9	200	1800	178	0.0204	0.56733	3.60%
Verizon	1900	3	200	600	178	0.0068	1	0.68%
Total Percentage of Maximum Permissible Exposure								4.28%

*Guidelines adopted by the FCC on August 1, 1996, 47 CFR Part 1 based on NCRP Report 86, 1986 and generally on ANSI/IEEE C95.1-1992

MHz = Megahertz
 mW/cm² = milliwatts per square centimeter
 ERP = Effective Radiated Power
 Absolute worst case scenario, maximum values used.





ALL-POINTS TECHNOLOGY CORPORATION, P.C.

March 2, 2005

Verizon Wireless
99 East River Drive, 9th Floor
East Hartford, CT 06108

Attn: Wayne Lukachek
Re: 190' Summit Monopole Tower
Somers II, Connecticut
Crown Castle BU #803934
Verizon Wireless Site: Somers 2

Dear Wayne,

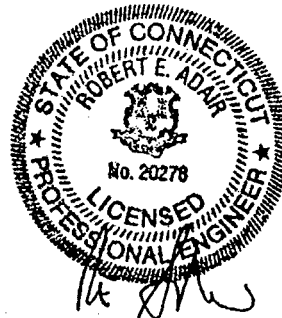
I am writing with regard to Verizon Wireless' proposed antennas to be installed on the 190' Summit monopole tower located in Somers, Connecticut. I evaluated the monopole tower (Summit project #29201-0371) in accordance with EIA/TIA-222-F, Structural Standards for Steel Antenna Towers and Antenna Supporting Structures. My evaluation consisted of comparing design loads shown on Summit drawings with existing and proposed antennas, waveguide, and mounts. Verizon proposes to install six Antel LPD-7905/4 and six Antel LPA-185090/8CF2 panel antennas on a platform at 178', fed by twelve 1-5/8" waveguide cables.

My evaluation indicates the tower and foundation are capable of supporting Verizon Wireless' proposed antennas. The anticipated stress levels in the monopole and foundation are within the limits of the original design and meet requirements set by EIA/TIA-222-F.

We appreciate this opportunity to provide our services to you. Please call if you have any questions.

Sincerely,
All-Points Technology Corporation, P.C.

Robert E. Adair, P.E.
Principal



CT141540 Somers II ltr 3-2-05.doc