

**From:** Barbadora, Jeff <Jeff.Barbadora@crowncastle.com>

**Sent:** Tuesday, December 17, 2024 1:09 PM

**To:** CSC-DL Siting Council <Siting.Council@ct.gov>

**Subject:** EM-VER-089-240604 - 115 North Mountain Road, New Britain - 876331

Good Afternoon,

Construction Commenced on 10/14/24 and was completed on 12/2/24.

Thanks,

**Jeffrey Barbadora**

Permitting Specialist

781-970-0053

**Crown Castle**

1800 W. Park Drive, Suite 250

Westborough, MA 01581



December 12, 2024

Mr. Michael Roraback  
City of New Britain Building Department  
27 West Main Street, Room 404  
New Britain, CT 06051

**Re: Letter of Professional Opinion**

**Project:** New Britain NW CT (Verizon)  
115 North Mountain Road  
New Britain, CT 06053

**Owner:** Crown Castle

**Engineer:** Tower Engineering Professionals  
326 Tyron Road, Raleigh, NC 27603

**Contractor:** NEC Group  
21 Marion Drive, Kingston, MA 02364

**Centek Project No.:** 24140.47

**Building Permit No.:** B-24-857

Dear Mr. Roraback,

We are providing this "Letter of Professional Opinion" with regard to the structural components at the above referenced project.

The following are the basis for substantiating compliance with construction documents prepared by Tower Engineering Professionals dated 05/29/2024 Rev.1 and Post-Modification Mount Analysis Report prepared by Colliers Engineering & Design dated 02/13/2024 Rev.1 and Mount Modification Drawings prepared by Colliers Engineering & Design dated 02/13/2024 Rev.1:

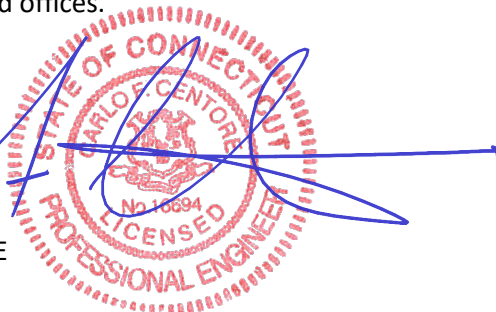
- Field observations of completed construction on 12/10/2024.

Please note that discrepancies in the tower mounted equipment between the Structural Analysis Report prepared by Telamon Tower Engineering (dated 05/14/2024 Rev.1) and the Mount Analysis Report prepared by Colliers Engineering & Design (dated 02/02/2024) have been identified. The inconsistencies in models used have been highlighted in red on the attached pages: page 3 of the Post Modification Mount Analysis and page 3 of the Structural Analysis.

The work under this Contract has been reviewed and found, to the Engineer's best knowledge, information, and belief, to be completed in general compliance with the documents prepared by the aforementioned offices.

Sincerely,

Carlo F. Centore, PE  
Principal



### **Final Loading Configuration:**

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

Mount Elevation (ft)	Equipment Elevation (ft)	Quantity	Manufacturer	Model	Status
89.00	90.00	6	Commscope	NHH-65B-R2B	Added
		3	Samsung	MT6413-77A	
		3	Samsung	RF4439d-25A	
		3	Samsung	RF4461d-13A	
		1	Raycap	RVZDC-6627-PF-48	
		1	Amphenol Antel	BXA-70040-4CF-EDIN-0	Retained
		1	Antel	BXA-70063-4CF	
		1	Antel	BXA-70063-4CF-4	

The recent mount mapping reported existing OVP units. 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.

## 1) INTRODUCTION

This tower is a 118 ft Monopole tower designed by Rohn. The tower has been modified multiple times to accommodate additional loading.

## 2) ANALYSIS CRITERIA

**TIA-222 Revision:** TIA-222-H  
**Risk Category:** II  
**Wind Speed:** 117 mph  
**Exposure Category:** C  
**Topographic Factor:** 1  
**Ice Thickness:** 1.5 in  
**Wind Speed with Ice:** 50 mph  
**Service Wind Speed:** 60 mph

**Table 1 - Proposed Equipment Configuration**

Mounting Level (ft)	Center Line Elevation (ft)	Number of Antennas	Antenna Manufacturer	Antenna Model	Number of Feed Lines	Feed Line Size (in)
85.0	90.0	1	antel	BXA-70040-6CF-EDIN-2 w/ Mount Pipe	6 2	1-5/8 1-1/4
		2	antel	BXA-70063-6CF-2 w/ Mount Pipe		
		6	commscope	NHH-65B-R2B w/ Mount Pipe		
		3	samsung telecommunications	MT6413-77A w/ Mount Pipe		
		3	samsung telecommunications	RF4439D-25A		
		3	samsung telecommunications	RF4461D-13A		
		1	raycap	RVZDC-6627-PF-48		
	85.0	1	tower mounts	Platform Mount [LP 303-1_KCKR-HR-1]		





Network: Nov 22, 2024 at 3:45:57 PM EST  
Local: Nov 22, 2024 at 3:45:57 PM EST  
41.6767° N, 72.8214° W



Network: Nov 22, 2024 at 3:44:44 PM EST  
Local: Nov 22, 2024 at 3:44:44 PM EST  
41.6765° N, 72.8216° W